Knox County Comprehensive Plan
2012 Update
Adopted: September, 2012
Recommended: July 31, 2012

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The Steering Committee expresses its appreciation to James Gabriel for his services in editing this document.

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Knox County Regional Planning Commission

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1.1 Introduction

Comprehensive planning began in Knox County with completion of the 1998 Comprehensive Plan, which served as a beginning, a launching pad toward higher levels of planning. Knox County's leaders and residents still have high expectations for the future and a desire to make good choices about development that are consistent with a carefully crafted vision of the future.

Comprehensive plans reflect community conditions, values and expectations at a point in time. At the same time, change is constant both within and without the county. To be effective working documents, plans must be regularly updated to reflect those changes.

The leaders in Knox County recognize the need to regularly update the Comprehensive Plan and generally intend to undertake such updates on a five-year basis as required by the State of Ohio. The 2006 update was such an effort. This document is the next step.

The Comprehensive Plan is used by several local government agencies as a component of grant requests.

1.2 - 1998 Comprehensive Plan

The 1998 Plan was spearheaded by the Knox County Chamber of Commerce. The Chamber was among the first local organizations to appreciate that pressures for development were increasing and that change might not occur in desirable ways without local planning. It was noted in 1998 that while the population of Knox County had increased by 16,500 in the previous 50 years, the projected rate of growth would add that number in less than 25 years. Thus, the foundation of the 1998 Plan was drawing attention to impending growth, the resulting planning issues and the need for action on many levels.

The 1998 Knox County Comprehensive Plan had four fundamental purposes:

1. To develop a plan that would help direct future development and redevelopment in a way that would enhance the physical, social and economic environment of Knox County;
2. To serve as the beginning of an ongoing planning process that would define a long-term community vision;
3. To view the completion of this Comprehensive Plan as the beginning of dedicated implementation efforts; and
4. To define both countywide and local planning perspectives.

1.3 - 2006 Update

This Update of the Knox County Comprehensive Plan (1998) affirmed and sustained the local desire for managing growth and development in Knox County. This Update was the product of dedicated efforts by residents, volunteers, community leaders and planners who assisted the Knox
County Regional Planning Commission (RPC). Participants in this process shared the belief that logical, well-thought-out community planning is vital for shaping the future of Knox County.

While some of the initiatives and recommendations for action in the 1998 Plan had not been fully achieved by 2006, progress was evident on many fronts. Chief among these was the development of the RPC as a much more effective and relevant voice in local planning. Compelling evidence of this is found in the fact that the 2006 Update was prepared by the staff and members of the RPC, whereas the 1998 plan was not.


As with the 1998 Plan, the RPC recognized the importance of maintaining a high level of community participation throughout the updating process. Perhaps even more than during the “Focus 2100” process that resulted in the 1998 Plan, the process that produced this Update provided many and varied opportunities for citizens to participate, to contribute and to build consensus.

1.4 - 2012 Update Process

In 2010, the RPC recognized the need for another update of the Comprehensive Plan and established a Steering Committee to prepare the update recommendations. The Steering Committee was composed of RPC members, elected officials and community leaders representing a broad spectrum of community services, business and industry.

Due to budgetary restraints, the Steering Committee determined that it was not feasible to hire a consultant to produce the update and decided to do the work itself. The Steering Committee in turn established a series of subcommittees to address the broad variety of subjects covered in the Comprehensive Plan. The Steering Committee members served as chairs of the subcommittees and drew from expertise within the community for the subcommittees’ work.

Public input to the update process was solicited through directed surveys, internet surveys and personal interviews. The draft document was available for public review at a number of locations as well as being posted on the Internet. The various subcommittee reports and recommendations, as well as the public comments, were discussed and reviewed by the Steering Committee and incorporated into this document as deemed appropriate.
Chapter 2– History and Organization of Knox County

2.1 County Historical Setting

As the 19th century began, individual settlers and pioneering families were moving into “the Ohio Country,” the easternmost of the lands that made up our Nation’s newly acquired Northwest Territory. Soon the population had passed the 60,000 mark required to be eligible for statehood, and in March, 1803, Ohio became the 17th of the United States of America.

Within a few years, communities were springing up throughout the interior of the state, especially where promising farmland and convenient waterways were located. By 1805, the town of Mount Vernon had been laid out and soon several other communities were established nearby in what was then the northern part of Fairfield County. By 1808 these communities had grown sufficiently to allow the establishment of two new counties, Knox and Licking, carved out of Fairfield.

By the 1830s the county’s present 22 townships had been established. During the 1890s more than 35 post offices were in operation here, and in the years since, many of those communities have prospered while others have since declined or disappeared. The political subdivisions of Knox County at present include one city, Mount Vernon, and the seven villages of Centerburg, Danville, Fredericktown, Gambier, Gann and Martinsburg, plus Utica, which is located in both Knox and Licking counties.

2.2 Political Subdivisions

Mount Vernon

The city of Mount Vernon is located in central Knox County and has served as the county seat since the county’s formation in 1808. In more recent years, it has been recognized as an “All American City” by both Look Magazine and the National Municipal League, and by Ohio Magazine as “Ohio’s Most Livable Community.”

In the more than 200 years since the establishment of Mount Vernon, its residents have seen growth and change in many areas - progress in agriculture, expansion of business and industry, economic ups and downs, military encounters, immigration issues, improvements in education, religious issues and many others.

In 1805, the original proprietors of the town saw fit to name it after the estate of the country’s beloved first President, and three years later the new county was named for Washington’s friend and fellow general, Henry Knox. John Chapman, better known as Johnny Appleseed, voted in the first election, owned property and spent considerable time coming and going through Mount Vernon. Daniel Decatur Emmett, musician and traveling minstrel, was born in Mount Vernon in 1815. And soon the town’s growing population would include more than a few men who had fought with Washington for America’s independence.
These new residents came from a wide area, not just Pennsylvania, New York, Maryland and the New England states, but also Virginia, Kentucky and Louisiana, bringing a wide range of attitudes on the topics of the day.

Within the first 25 years, new churches, schools and businesses were established, newspapers were published, political offices were created and filled and young people would leave nearby farms to work at the new Cooper brothers foundry, build homes and create businesses of their own. Before long, residents were debating the issues that led to the Civil War and young men were eagerly signing on for military duty, later to be honored with a monument on the Public Square. The 20th century brought both economic expansion and turmoil, requiring adaptation and change. But the town has preserved the beauty and charm that has attracted so many newcomers over the years. Its architecture, business opportunities and educational, religious and entertainment facilities have made Mount Vernon a great place to live.

**Centerburg**

After its founding in the early 1830s as the center of Hilliar Township, some of the Village of Centerburg residents claimed that it was at the geographical center of Ohio in hopes that it would become the state capitol. It is located in Hilliar Township in the far southwest corner of Knox County, 14 miles southwest of Mount Vernon. Even before 1820, its location was on the main road from the Lake Erie and northern Ohio regions to the State Capital in Columbus, a road which would later become the “Wooster, Mount Vernon and Columbus Road,” and then S.R. 3.

For 40 years, the three townships north of Centerburg - South Bloomfield, Chester and Franklin - were also part of Knox County prior to the formation of Morrow County in 1848. Later on, Centerburg benefited from the railroad boom, and it has remained a center of commerce in the southern part of our county.

In more recent years, Centerburg has become known for the highly successful “Oldtime Farming Festival” each September and the “Heart of Ohio USA Days Festival” in June. The residential areas continue to grow as newcomers find the friendly community a convenient commute to Columbus.

**Danville**

Originally known as “Sapp’s Settlement,” after the four brothers who came here in 1806 from western Maryland, the Village of Danville was later named for Daniel Sapp, one of the brothers who first settled in the eastern part of our county. The community, one of the oldest in Knox County, is located in Union Township, one of the original four townships. The Sapps were part of the early Catholic community here and were instrumental in the establishment of St. Luke’s Catholic Church, the second oldest such Parish in Ohio. The founding priest, Father Lamy, later became the Archbishop of the Diocese of Santa Fe, New Mexico, gaining fame through the writings of novelist Willa Cather.

The first post office in the eastern part of the county was established at Danville in 1824. The town flourished during the railroad era and during the 1870s, it shared postal and commercial growth with the adjoining towns of Rossville and Buckeye City. Running right through Danville is route U.S. 62, which stretches from Niagara Falls, New York, to the Mexican border at El Paso, Texas.
In recent years Danville has become known for its annual “Danville-Howard Turkey Festival” and the Raccoon Dinner held each February.

**Fredericktown**

The Village of Fredericktown, located seven miles north of Mount Vernon, was established as a mill site in 1807 by John Kerr out of a large parcel of land first acquired from the government by Lucas Sullivant, founder of Franklinton. It was first known as Frederick in honor of the Maryland hometown and Quaker heritage of many of its early settlers. Through the years it has produced well-known writers and athletes, and is known as the home of the original design of the Future Farmers of America jacket.

The community has prospered from its earliest days, having had a wide variety of merchants, bankers, schools, churches, benevolent societies and social organizations. Fredericktown continues to flourish in business, industry and agriculture, taking great pride in its long heritage and independence in its capacity to meet the needs of its residents.

**Gambier**

It was through the relocation of Kenyon College from Worthington, Ohio, to Knox County that the Village of Gambier came into being. In 1825, Philander Chase, the first Episcopal Church Bishop of Ohio, selected and approved of the new location for the college and seminary at the suggestion of his colleague, Henry B. Curtis, and by the end of 1826 the new college buildings were under construction. Funds for the construction were obtained by Bishop Chase in England, thus the village was named for benefactor Lord Gambier.

Kenyon College, the oldest private liberal arts college in Ohio, is known nationally for its academic excellence as well as its distinctive stone architecture. Noted graduates include President Rutherford B. Hayes, actor Paul Newman and many important figures from President Lincoln’s administration.

Gambier is located four miles east of Mount Vernon in College Township.

**Gann (Brinkhaven)**

The small village of Gann is located along the east side of the scenic Mohican River in Union Township, in the northeastern part of the county. Both the community and its post office have been known by several names over the years, including Nonpariel, Mt. Holly, Brink Haven and Brinkhaven, although the legal name for the village of 200 persons remains “Gann.”

**Martinsburg**

Located in Clay Township in the southeastern part of the county, the Village of Martinsburg was established in 1824 as a consolidation of the two communities previously known as Williamsburgh and Hanover, located on each side of the main street. During the 1830s the area prospered through the business interests of merchant Insley Johnston, who shipped large quantities of wheat, wool, pork, tobacco and produce to eastern markets. His business failure in 1837, however, was devastating to the community. Several major fires in the town have also prevented further growth.
In 1838, the Martinsburg Academy was established, producing many noted ministers and lawyers for over 20 years, including the Hon. William Windom, U.S. Senator and Secretary of the Treasury (1880s), and great-grandfather of the present-day actor of the same name.

**Utica**

Just the northern tip of the Village of Utica is located in southern Knox County, with the remainder at the northern edge of Licking County. The village was established in 1810 as “Wilmington,” but changed the name to Utica in 1817 to obtain a post office.

In the early 1900s the gas boom here created a thriving hand-blown glass industry, making Utica a major national glass producer through the 1950s.

Today, the nearby Velvet Ice Cream Co., established in 1914, with the “Ye Olde Mill” and the Ice Cream Museum, serves as a major tourist attraction to the area. The Utica Historical Society’s “Hufford House Museum” preserves artifacts and stories of Utica’s long history. The annual Ice Cream Festival is held over Memorial Day Weekend.

**Apple Valley**

Apple Valley is a large recreational and residential community in east-central Knox County. Although unincorporated, the area has thousands of residents and with expected growth could easily become an incorporated municipality.

### 2.3 Other Political Units

**Centerburg Joint Recreation District**

The Centerburg Joint Recreation District was created in 2007 by joint action of the Village of Centerburg, the Centerburg School District, and Hilliar, Liberty and Milford Townships. The District is governed by a five-member board of trustees representing each of the five participating governmental units. The District’s mission is to physically and financially assist in the enhancement of recreational facilities and programs within the boundaries of the Centerburg School District.

**DKMM Solid Waste District**

The Delaware, Knox, Marion, Morrow (DKMM) Solid Waste Management District was formed by the county commissioners of the four counties on February 21, 1989. It is a political subdivision of the State of Ohio and provides solid waste disposal through its Ohio EPA-approved Solid Waste Plan. Litter control and recycling have become important components of the Plan, and each of the four counties has an office dedicated to meeting goals in these areas.

**Fredericktown Joint Recreation District**

The Fredericktown Joint Recreation District was organized in 1980 and since that time has seen tremendous growth and expansion in both area and services. The District encompasses the same area as the Fredericktown School District and manages over 100 acres in the form of parks, ball
fields, nature center and nature preserve. The District serves almost nine thousand people and operates on a 1.5-mill levy supported by the residents of the District.

**Knox County Park District**

The Knox County Park District strives to provide excellent outdoor recreation opportunities to families and individuals in Knox County. The park district manages over 1,000 acres of green space for users’ enjoyment and serves as manager and facilitator of the county trail system (Kokosing Gap Trail, Heart of Ohio Trail and Mohican Valley Trail).

**Knox County Regional Airport Authority**

The Knox County Regional Airport Authority was established by the County to administer the county airport. Members of the Authority are appointed by the County Commissioners. Although airport employees are county employees, the Authority is an independent unit of government and all management direction is provided by the Authority board.

**Knox Soil & Water Conservation District**

Established by local referendum in 1947, the Knox Soil and Water Conservation District (KSWCD) is an independent political subdivision established within the boundaries of Knox County. The function of the KSWCD is to provide soil and water resource conservation assistance to local residents and landowners as well as other units of government. The KSWCD is governed by a board of five locally elected supervisors, and is primarily funded by grant appropriations from the Knox County Commissioners which are matched, in part, by funds from the State of Ohio.

Technical staff employed by the KSWCD provides on-site resource conservation consultation as well as conservation practice survey, design and construction supervision services to local land-users. The KSWCD also conducts various resource conservation education events/activities for school age youth in Knox County.
Chapter 3 - Community Setting

3.1 Natural Environment

Knox County is blessed with a beautiful rural landscape including gently rolling hills, river valleys, lakes, cultivated areas, pastures and woodlots. The varied topography is largely the product of glaciation. The major river valleys include those of the Kokosing River, Mohican River and North Fork of the Licking River. Most of the county is farmland.

3.1.1 General Topography

The highest elevation in Knox County is on the western side in Liberty Township and the lowest is on the eastern side, where the Kokosing River leaves the county in northeastern Butler Township. The difference in elevation is approximately 600 feet. General contour elevations are shown on Map 1. The steepest slopes in Knox County are found toward the northeastern parts of the county near the Mohican River. Generally, slopes greater than 15 percent present some limitations for urban development.

3.1.2 Geology

Knox County is on the outer edge of an area once covered by continental glaciers. The latest of the glaciations, the Wisconsin, covered the western part of the County 15,000 to 16,000 years ago, leaving thick deposits. Most of the relief in this part of Knox County was caused by uneven glacial deposition and subsequent erosion of the glacial mantle.

Most of the eastern part of the county was covered by the Illinoion glaciation more than 100,000 years ago. Although it was not strong enough to level the existing bedrock, the ice flowed between the hills, leaving thick glacial deposits in some areas and almost none in others. The northeastern and southeastern corners of the county were not glaciated.

Several valleys in Knox County carried large volumes of glacial melt water, which laid extensive deposits of gravel and sand along ancient riverbeds.

3.1.3 Oil, Natural Gas and other Mineral Resources

Since 1900, Knox County has been an active producer of oil and natural gas resources. In the early 1900s, several glass plants were built in Knox County due to the abundant natural gas supplies available here.

In 2010, Knox County was the second most active county in Ohio with 34 new oil and gas wells drilled with an average depth of 3,182 feet.

Currently, as in much of eastern Ohio, there is anticipation of development of oil and gas resources in the Utica shale. The first Utica shale well permitted in Knox County was drilled in Morgan Township during the first half of 2012. The well had not been completed when this plan was finalized.
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Knox County is fortunate to have several large-capacity natural gas transmission lines as well as extensive lower-pressure natural gas gathering systems. Three public utilities and two cooperatives provide natural gas distribution to the municipalities, Apple Valley and many rural areas in Knox County.

Commercial sand and gravel quarries are in operation near the Kokosing River in Knox County.

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3.1.4 Soil Conditions

A detailed survey describing soils throughout Knox County was completed in 1986 by the U.S. Department of Agriculture (USDA). Because of the interest in farming, the agricultural properties of soil remain of particular interest. The USDA defines prime farmland as the land that is best suited to grow food, feed, forage, fiber and oilseed crops. Such land may be cultivated, pasture or woodland, and can produce the highest yields with minimal inputs of energy and economic resources and with the least damage to the environment. According to the soil survey, more than
half (57 percent) of the total acreage of the county is classified as prime farmland. While prime farmland is found throughout the county, the largest concentrations are found to the south where slopes are more gentle.

3.1.5 Surface Water

According to the Soil Survey of Knox County, Ohio, most of the county is drained by the Kokosing River, North Fork of the Licking River, Mohican River and Wakatomika Creek. These waterways are part of the Muskingum River Watershed. A small part of western Knox County drains to Big Walnut Creek, which is part of the Scioto River Watershed. The surface water features of the county are shown on Map 2.

Kokosing River

The dominant surface water feature in Knox County is the Kokosing River. In September 1997, the Kokosing was designated a Scenic River under the Ohio Wild, Scenic and Recreational Rivers Law, following extensive local effort and the completion of the Kokosing River Study. The Study included a detailed biophysical description of the river, some of which includes the following:

The Kokosing River continues to exist as one of the highest quality rivers in Ohio. According to Ohio EPA, “Populations of blue breast darters dramatically increased in the middle and lower portions of the Kokosing River and have populated further up the middle portion of the river, indicating a significant improvement in water quality.”

Excellent habitat and water quality, combined with the presence of pollution-sensitive invertebrates and fish species, suggest that the Kokosing River is a very high-quality, healthy system, one of Ohio’s best water resources. To maintain its high-quality status, Ohio EPA recommends that storm water be managed, failing home septic systems be fixed, and livestock exclusionary fencing be installed.

In terms of aquatic habitat, the Kokosing River has some of the highest quality aquatic assemblages in Ohio. Segments of the River have been designated either “exceptional warmwater habitat” or “warm water habitat.” “Exceptional warm water habitats” are waters that can support and maintain an unusual community of warm water organisms, comparable to the 75th percentile of sites statewide. “Warm water habitats” are waters that support and maintain a balanced, integrated and adaptive community of warm water organisms with a specific species composition, diversity and organization.

Citation: Ohio Environmental Protection Agency. 2010. Biological and Water Quality Study of the Kokosing River Watershed 2007. 205pp. plus Appendices.

In April 2004, the Ohio Department of Natural Resources, Division of Natural Areas and Preserves (DNAP) released the Kokosing Scenic River Watershed Plan. The purpose of that plan was to “identify and reduce nonpoint sources of pollution and to identify and protect high-quality habitat areas.” The plan is comprised of an analysis of environmental, recreational, socio-economical and historical factors related to the watershed. The plan describes strategies for restoration, enhancement and protection of the watershed’s resources. The plan will help DNAP, nonprofits and local governmental entities with making decisions about the river and its tributaries.

Beyond regulatory considerations that exist by virtue of the Scenic River designation, the presence of the high water quality in the Kokosing River System influences effluent limitation from wastewater treatment plants. Antidegradation regulations adopted by the Ohio EPA have an impact on the operation of wastewater treatment plants.

Source: Kokosing Scenic River Watershed Plan, Ohio Department of Natural Resources, Division of Natural Areas and Preserves, April 2004.

Mohican River

The Mohican River has been designated a State Scenic River. According to the Ohio EPA, “Based on the biological data collected in 2007, the Exceptional Warm water Habitat (EWH) use designation was found to be appropriate for the Mohican River main stem.” The main stem of the Mohican had previously been designated warm water habitat in 1978. This change in designation suggests that the Mohican River contains higher quality habitat components than thought previously. Excellent habitat and water quality, combined with the presence of pollution-sensitive invertebrates and fish species, indicate that the Mohican River is a very high-quality, healthy system, one of Ohio’s best water resources.

Citation: Ohio Environmental Protection Agency. 2009. Biological and Water Quality Study of the Mohican River and Selected Tributaries, 2007. 146 pp. plus Appendices.

Lakes

There are three major lakes in Knox County. All are man-made bodies within the Kokosing River watershed. Apple Valley Lake is a 511-acre private body of water located east of Mount Vernon. Knox Lake, constructed in 1954 northeast of Fredericktown, covers about 500 acres and includes boat launching and related facilities at three locations. Kokosing Lake, approximately 160 acres, is located northwest of Fredericktown and was constructed by the Army Corps of Engineers for flood control and recreation in 1971. It is part of approximately 1300 acres, managed for fish and wildlife, but also containing camping and picnic grounds, latrines, wells and a public launching ramp for boats.

3.1.6 Flood Plains

Flood plains are low, flat areas bordering watercourses that serve as areas for storage and flow of excess water beyond the normal capacity of a river or stream. The general location of the major 100-year flood plains in the county as mapped by FEMA is illustrated on Map 3. The 100-year flood plain refers to the area next to waterways that is expected to flood at least once in a given 100-year period, i.e. the annual risk of flooding is one percent. Detailed flood plain maps are available for all of Knox County through the National Flood Insurance Program. The largest flood plains are associated with the Kokosing and Mohican Rivers, but every watercourse has a flood plain, whether mapped or not.

Regulations addressing limitations on development in the flood plain are adopted and enforced by Knox County (for all unincorporated areas) and by each municipality (in their respective jurisdictions). Adoption of flood plain regulations is a requirement for a local government to remain eligible for disaster relief from the federal government.
3.1.7 Subsurface Water

Knox County has extensive groundwater resources. A large aquifer along most of the Kokosing River provides an excellent source of water for Mount Vernon and Apple Valley. Other areas of the County have less groundwater. Nevertheless, groundwater availability is generally sufficient for most needs. Subsurface water resources will be protected by utilizing the map, “Ground Water Pollution Potential of Knox County,” published in 1991 by the Ohio Department of Natural Resources, Division of Water.

3.1.8 Wetlands

There are numerous wetlands identified in Knox County. Information on wetland sites can be obtained through the Ohio Environmental Protection Agency and the National Wetlands Inventory Maps. Wetlands are protected under federal law and have restricted potential for development.

3.1.9 Green Infrastructure

Apart from a purely descriptive view of Knox County’s natural characteristics, certain elements of the natural environment can be viewed in the context of the public benefits provided by their natural functions. As an example, flood plains are sites for storing periodic floods. Developing these areas, or altering existing topography, may increase the severity of flooding. Similarly, undeveloped land near underground sources of drinking water protects groundwater from potential contamination from urban land uses. Wetlands naturally filter surface water, removing material that can degrade the quality of water in streams and lakes.

3.2 Population Characteristics

The characteristics of an area relative to development are directly related to the area's changing population. Generally, local change in population influences the demand for various types of housing, commercial space and employment opportunities. The changing population in a community also influences the demand for public facilities and infrastructure.

3.2.1 Population Change

Figure 1, shows the population and projected population for Knox County and surrounding counties from 1980 through 2030. This figure shows relatively steady growth for Knox and Ashland Counties over the period. That steady growth is in sharp contrast to the rapid growth in neighboring Delaware and Licking Counties. Coshocton, Morrow and Richland remain little changed. The county grew by 28.3% between 1990 and 2010 while the State of Ohio grew by 6.4%. The Ohio Office of Strategic Research has predicted that the population of Knox County will grow 8.2% from its 2010 population of 60,921 by 2020 while Ohio grows 4.1%. Clearly, much of the growth in Knox County is related to expanding opportunities for employment in the Columbus/Franklin County area.
3.2.2 Age Characteristics

While planning for the future, the aging of the Knox County population must be considered. An increase in persons over the age of 65 is directly linked to increased needs for health care services, community-based home care or nursing home care, transportation services and community resources.
Figure 2, illustrates Knox County’s population by age bracket in 2010. Knox County had a slightly higher percentage of adults over the age of 65 (14.8%) than the State of Ohio (14.1%).

3.2.3 Economic Characteristics

Economy

Knox County has enjoyed a strong, stable and diverse local economy with a healthy mixture of agricultural operations, industrial and manufacturing, and services. Knox County’s proximity to employment centers in adjacent and nearby counties provides opportunities to persons willing to commute. The number of commuters driving out of the county to work dropped from 7,401 in 2000 to approximately 6,500 in 2010. This accounts for approximately 26% of the workforce in the county. Comparatively, approximately 27% of all Ohioans commute to employment outside their counties of residence.

Over 40% of commuters from Knox County travel to Franklin County and almost 18% travel to Licking County. Richland and Delaware Counties each receive over 11% of the commuters from Knox County. Townships and municipalities with more than 50% of workers commuting outside of Knox County in 2000 are Brown, Clay, Hilliar, Jackson, Milford and Morgan Townships, Martinsburg and Centerburg. With the exception of Brown Township, these jurisdictions are in the southern portion of Knox County.
Knox County is also a destination for commuters. Over the past seven years, manufacturing and industrial jobs have grown by over 600 new jobs in Knox County. This is unprecedented for a community of this size during the economic struggles across Ohio and the United States.

Knox County has attractive manufacturing and industrial sites, market proximity, an excellent rail system, skilled workers, quality resources, financial assistance, leisure activities and a local and state government cooperating and assisting with business concerns.

Knox County offers a diverse, well-trained laborforce. Workforce availability can be contributed to the excellent job training network that includes area vocational and technical schools. Employers can utilize local on-the-job and retraining resources. Traditional values such as a strong work ethic lead local employers to say they receive a day's work for a day's pay.

**Major Local Private Sector Employers**

Major employers in Knox County include the following: Ariel Corporation, Rolls-Royce, Jeld-Wen, Kokosing Construction, F.T Precision, Sanoh, Kenyon College, Mount Vernon Nazarene University, Knox Community Hospital, Mount Vernon City Schools, International Paper and AMG.

**Industrial Employment**

The 2010 U.S. Census showed an increase in employment in many sectors. The Census also showed a decrease in the following two sectors: (1) agriculture, forestry and fishery and (2) wholesale and retail trade. Significant areas of employment included manufacturing, services and wholesale and retail trade.

Knox County’s unemployment rate had grown to 9.8% in 2010. However, through April 2012, this rate had fallen to 7.0%.
Figure 3
Unemployment Rate, 2005 - 2010

Unemployment Rate, %

Year

2005 2006 2007 2008 2009 2010

US Ohio Knox Co
Selected Work Force Sectors
Total employment = 28,944
## Tourism Sales (Output) (US$)

<table>
<thead>
<tr>
<th>Sector</th>
<th>Direct*</th>
<th>Indirect</th>
<th>Induced</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture, Fishing, Mining</td>
<td>-</td>
<td>368,693</td>
<td>133,616</td>
<td>502,310</td>
</tr>
<tr>
<td>Construction and Utilities</td>
<td>-</td>
<td>865,531</td>
<td>349,419</td>
<td>1,214,949</td>
</tr>
<tr>
<td>Manufacturing</td>
<td>-</td>
<td>3,131,161</td>
<td>1,430,473</td>
<td>4,561,633</td>
</tr>
<tr>
<td>Wholesale Trade</td>
<td>-</td>
<td>104,266</td>
<td>75,902</td>
<td>180,168</td>
</tr>
<tr>
<td>Transportation</td>
<td>4,449,622</td>
<td>897,370</td>
<td>388,214</td>
<td>5,735,206</td>
</tr>
<tr>
<td>Retail Trade</td>
<td>15,904,698</td>
<td>446,320</td>
<td>1,775,299</td>
<td>18,126,316</td>
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<tr>
<td>Communications</td>
<td>-</td>
<td>888,050</td>
<td>379,642</td>
<td>1,267,692</td>
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<tr>
<td>Finance, Insurance and Real Estate</td>
<td>-</td>
<td>2,570,749</td>
<td>1,739,613</td>
<td>4,310,363</td>
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<tr>
<td>Business Services</td>
<td>-</td>
<td>3,488,686</td>
<td>988,269</td>
<td>4,476,955</td>
</tr>
<tr>
<td>Education and Health Care</td>
<td>-</td>
<td>11,437</td>
<td>2,413,377</td>
<td>2,424,814</td>
</tr>
<tr>
<td>Recreation and Entertainment</td>
<td>8,018,866</td>
<td>219,932</td>
<td>188,513</td>
<td>8,427,312</td>
</tr>
<tr>
<td>Lodging</td>
<td>4,557,453</td>
<td>82,846</td>
<td>67,131</td>
<td>4,707,430</td>
</tr>
<tr>
<td>Food &amp; Beverage</td>
<td>16,041,950</td>
<td>225,504</td>
<td>636,496</td>
<td>16,903,950</td>
</tr>
<tr>
<td>Personal Services</td>
<td>-</td>
<td>340,061</td>
<td>576,024</td>
<td>916,084</td>
</tr>
<tr>
<td>Government</td>
<td>-</td>
<td>348,551</td>
<td>1,942,978</td>
<td>2,291,529</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td>48,972,589</td>
<td>13,989,157</td>
<td>13,084,966</td>
<td>76,046,712</td>
</tr>
</tbody>
</table>

% change 07 - 08: 4.2% 4.2% 4.2% 4.2%

% change 08 - 09: -8.6% -4.8% -4.5% -7.2%

* Direct sales includes cost of goods sold for retail sectors

### Tourism

Tourism income has grown substantially since 1990 and the resulting impact has been a major growth factor in the area economy. Destination marketing for the county began in a substantive way in 1990 with the creation of the Knox County Visitors Bureau as part of the Mount Vernon/Knox County Chamber of Commerce. In 1995, The Knox County Convention & Visitors Bureau (CVB) incorporated and spun off as a separate entity from the Chamber.

According to a 2009 tourism study by the Ohio Dept. of Development, visitors generated $49 million in direct tourism sales output, resulting in an overall impact of $76 million in business activity in Knox County (2009).

*Source: Tourism Sales calculations provided in a 2009 Ohio Dept. of Development Study.*
In 2009, tourism-related employment accounted for over 1,559 FTE jobs, and supported one in every 12 salaried jobs in Knox County. Total employment 2009 payroll for Knox County was $21 million. The employment breakdown into business sectors is as follows:

<table>
<thead>
<tr>
<th>Business Sector</th>
<th>Direct</th>
<th>Indirect</th>
<th>Induced</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agriculture, Fishing, Mining</td>
<td>-</td>
<td>9</td>
<td>3</td>
<td>12</td>
</tr>
<tr>
<td>Construction and Utilities</td>
<td>-</td>
<td>6</td>
<td>1</td>
<td>7</td>
</tr>
<tr>
<td>Manufacturing</td>
<td>-</td>
<td>14</td>
<td>6</td>
<td>20</td>
</tr>
<tr>
<td>Wholesale Trade</td>
<td>-</td>
<td>1</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Transportation</td>
<td>101</td>
<td>15</td>
<td>6</td>
<td>121</td>
</tr>
<tr>
<td>Retail Trade</td>
<td>195</td>
<td>12</td>
<td>47</td>
<td>255</td>
</tr>
<tr>
<td>Communications</td>
<td>-</td>
<td>7</td>
<td>3</td>
<td>10</td>
</tr>
<tr>
<td>Finance, Insurance and Real Estate</td>
<td>-</td>
<td>30</td>
<td>18</td>
<td>49</td>
</tr>
<tr>
<td>Business Services</td>
<td>-</td>
<td>60</td>
<td>18</td>
<td>78</td>
</tr>
<tr>
<td>Education and Health Care</td>
<td>-</td>
<td>0</td>
<td>54</td>
<td>54</td>
</tr>
<tr>
<td>Recreation and Entertainment</td>
<td>206</td>
<td>11</td>
<td>7</td>
<td>223</td>
</tr>
<tr>
<td>Lodging</td>
<td>141</td>
<td>2</td>
<td>2</td>
<td>144</td>
</tr>
<tr>
<td>Food &amp; Beverage</td>
<td>520</td>
<td>8</td>
<td>23</td>
<td>551</td>
</tr>
<tr>
<td>Personal Services</td>
<td>-</td>
<td>8</td>
<td>20</td>
<td>28</td>
</tr>
<tr>
<td>Government</td>
<td>-</td>
<td>3</td>
<td>2</td>
<td>5</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td>1,162</td>
<td>187</td>
<td>210</td>
<td>1,559</td>
</tr>
</tbody>
</table>

% change 07 - 08: 2.2%  2.2%  2.2%  2.2%
% change 08 - 09: -2.6% -1.6% -1.6% -2.4%

*Source: Tourism Employment calculations, in a 2009 Ohio Dept. of Development Study*

Although the 2008 recession had a measured downward impact of the tourism sales and employment, the 2011 data indicate that the tourism industry in Knox County has rebounded to levels exceeding the highest previous year on record.

In 2007-09, the CVB created and initiated a new brand called “KnoxWays,” shifting the Knox County tourism marketing emphasis more toward outdoor recreation. This shift is primarily on account of the development of the Kokosing Gap, Mohican Valley and Heart of Ohio Trails, the designation of the Kokosing and Mohican Rivers as Ohio Scenic Rivers and Water Trails and the creation of the Wally Road and the Gateway to Amish Country Ohio Byways.

The Knox County Park District in cooperation with the CVB received a $60,000 marketing grant to launch this campaign in 2008-09. Establishing the new KnoxWays brand and subsequent multi-year marketing campaign amounted to over a $100,000 investment.

All pertinent components of this comprehensive plan are integrated into the annual CVB strategic planning process that is updated annually and reviewed by the Knox County Commissioners.
Agriculture

Farming has been a major part of Knox County culture and the local economy for at least 1,000 years. Because of different terrain in the county (ranging from hilly in the east to rolling in the west), a variety of agricultural products are produced on farms in Knox County.

In the past 10 years locally grown food has become a very popular venue for both consumers and growers/processors in Knox County. Farmers markets have been established in Mount Vernon, Danville, Fredericktown, and Centerburg. The largest of these markets is held Saturday mornings from May to October on the square in Mount Vernon. On a typical Saturday, 40-50 vendors bring their produce and homemade products to the market. In order to participate in the market the vendor must grow or make the items being offered for sale, and must live within a 25 mile radius of Mount Vernon.

Not only is locally grown produce being offered, but one vendor is also offering lamb and beef that they have grown. These animal products are processed for the vendor in a facility in Knox County adding to the local economic growth.

The Owl Creek Produce Auction at Waterford was developed to allow local growers an outlet for their produce without incurring great shipping costs.

These local markets draw buyers from throughout the region and have had an economic impact in the county. Exact sales data is not available at this writing, but market managers have stated that receipts are substantial.

Kenyon College has made a concerted effort to incorporate as much locally grown food and food products in their meal offerings to their student body. Not all of the needed foods and food products are available in Knox County, but the College has made a great effort to get as much as possible from vendors in this and surrounding counties. The College is spending approximately $300,000 annually on foods and food products produced in Knox County, and an additional $550,000 on products produced within 50 miles of Gambier.

The U.S. Chamber of Commerce states that for each dollar that is generated in the community, it will pass through six different hands. This leads to greater employment, more revenues to local businesses, and a stronger community.

In 2009, (the most recent statistics that are available at this writing), grain receipts in Knox County totaled $55,310,000 and livestock receipts totaled another $23,770,000. With the addition of $300,000 for Kenyon College’s purchase of locally grown food products, the total is $79,380,000. By using the U.S. Chamber of Commerce statistic mentioned above, the impact on agriculture in Knox County accounts for a total economic effect and stimulus of $476,280,000. This makes not only for a strong agricultural community, but enhanced and stronger businesses on the main street of Mount Vernon and every other town in the surrounding area.

Some important facts include the following:

- Knox County was known as the sheep capital of the country in the first part of the 20th century. Today, Knox County has the distinction of being the largest sheep and wool producing county in Ohio.
• Producers Livestock on Columbus Road southwest of Mount Vernon is a center for selling livestock. This is an important aspect of the local farm economy, and draws farmers from a multi-county area.

• Knox County was once called the “No-Till Capital of the World”. This type of farming emphasizes soil and water conservation with properly applied herbicides. It is preferred to plowing, generally because it protects the soil from erosion by wind and water.

• There currently are about 1,260 farms in the county with the average size being 155 acres.

<table>
<thead>
<tr>
<th>Product</th>
<th>Amount Produced 2010</th>
<th>Yield/Acre</th>
<th>Other Rank</th>
<th>Cash Receipts 2009</th>
</tr>
</thead>
<tbody>
<tr>
<td>Corn</td>
<td>50,000 Acres</td>
<td>163 Bushels</td>
<td>34</td>
<td>$21,361,000</td>
</tr>
<tr>
<td>Beans</td>
<td>51,000 Acres</td>
<td>49 Bushels</td>
<td>40</td>
<td>$21,025,000</td>
</tr>
<tr>
<td>Wheat</td>
<td>4,100 Acres</td>
<td>48 Bushels</td>
<td>42</td>
<td>$1,738,000</td>
</tr>
<tr>
<td>Oats and Hay</td>
<td>15,500 Acres</td>
<td>2.68 Tons</td>
<td>8</td>
<td>$1,785,000</td>
</tr>
<tr>
<td>All other crops</td>
<td></td>
<td></td>
<td></td>
<td>$9,401,000</td>
</tr>
<tr>
<td><strong>Total All Crops</strong></td>
<td></td>
<td></td>
<td></td>
<td><strong>$55,310,000</strong></td>
</tr>
<tr>
<td>Cattle and Calves</td>
<td>18,200 Head</td>
<td></td>
<td>22</td>
<td>$5,304,000</td>
</tr>
<tr>
<td>Dairy and Milk</td>
<td>3.500 Head</td>
<td></td>
<td>22</td>
<td>$12,676,000</td>
</tr>
<tr>
<td>Hogs and Pigs</td>
<td>15,000 Head</td>
<td></td>
<td>36</td>
<td>$3,303,000</td>
</tr>
<tr>
<td>Sheep, Poultry and other livestock</td>
<td></td>
<td></td>
<td></td>
<td>$2,487,000</td>
</tr>
<tr>
<td><strong>Total all Livestock</strong></td>
<td></td>
<td></td>
<td></td>
<td><strong>$23,770,000</strong></td>
</tr>
<tr>
<td><strong>Total Ag Receipts</strong></td>
<td></td>
<td></td>
<td></td>
<td><strong>$79,080,000</strong></td>
</tr>
</tbody>
</table>

3.2.4 Income Characteristics

The per-capita income for Knox County, Ohio and the nation is shown in Figure 5. The 2009 per-capita income in Ohio was $35,408, but in Knox County it was $30,325. The difference of over $5,000 in per-capita income suggests that residents of Knox County have less to spend on goods, services and housing, as compared to the state overall. The relationship of Knox County to the state and to the country has been consistent over the years. Knox County ranked 52nd in Ohio in 2009, 53rd in both 2007 and 2008.
3.2.5 Housing Characteristics

Apart from agriculture, residential development is the dominant land use throughout Knox County. Important observations about housing include new housing construction and the age of existing housing.

**Recent Housing Construction**

Between 1990 and 2000, 3,285 (17.7%) new housing units were built in Knox County. Between 2000 and 2010, 3,325 (15.3%) new housing units were built in Knox County. Ohio’s housing units increased by 9.4% between 1990 and 2000 and 7.2% between 2000 and 2010. The county ranked 12\textsuperscript{th} in 2000 and 10\textsuperscript{th} in 2010 based on percent change.

The number of residential building permits issued in Knox County from 2003 to 2010 is shown in **Figure 7**. Knox County ranked 18\textsuperscript{th} in Ohio in 2010 based on the number of permits issued.
Figure 6
Knox County Housing Units, 1980 - 2010

Figure 7
Knox County Residential Building Permits, 2003 - 2010
Age of Homes
Examining housing units by year of construction provides insight into the history of residential development. Housing in Knox County is generally newer than in the City of Mount Vernon. According to the 2000 U.S. Census, the median year housing structures were built is 1952 for Mount Vernon, 1962 for the State, and 1963 for Knox County. Comparatively, in the 1990 Census, the median year structures were built are 1950 for Mount Vernon, 1959 for the State, and 1957 for Knox County. When considered with statistics on recent housing construction, these data show that more new housing is being built in Knox County than in Mount Vernon or the State.

Approximately 50 percent of the housing in Mount Vernon was built before 1950. By contrast, less than 37 percent of housing in Knox County and less than 32 percent of housing in Ohio was built before 1950. The age of housing units is important because it suggests locations for possible historic districts and indicates the number of older housing units that may require extra effort to maintain.

3.3 Land Use

3.3.1 Existing Land Use

As shown on Map 5, agriculture is the dominant land use in Knox County. However, it is also evident from Map 5 that residential land use is a significant element of the landscape in unincorporated parts of the county. This is because the use of land for residences, rather than agriculture, increased substantially in recent years. Better roads and the growing metropolitan region of Columbus have contributed to increased demand for residential lots in Knox County. Areas originally planned as resort housing, like Apple Valley, have become home to full-time residents. Also, one to two acre lot splits for single-family homes along established roads have become common in rural areas.

3.3.2 Zoning

- Zoning can promote land uses that allow and encourage individuals to make healthy choices – or it can do just the opposite. Decisions about the built environment have profound implications for human health. Zoning decisions can affect the rate of injuries and chronic disease, as well as the ability of seniors to age in place.

- There are four unzoned townships in the county. Conversation regarding the positive impact of zoning regulations should take place with these townships.

- Zoning may make it difficult or impossible to introduce land uses that promote wellness; therefore it is recommended that the Regional Planning Commission consider the following:
  - Applying “mixed-use zones,” which integrate residential and commercial uses;
  - Construction of sidewalks when possible;
  - Traffic-calming measures, such as roundabouts or speed bumps;
  - Pedestrian access to service and amenities when designing.
3.4 Infrastructure

3.4.1 Streets and Highways

Previous Planning Efforts

The following transportation studies and planning efforts are referenced as background information:

- **A Thoroughfare Plan for the Mount Vernon Area.** The Plan was adopted by the City of Mount Vernon in May 1992.

- **Mount Vernon Bypass Study.** The Study was completed in May 1995 and it developed concepts advanced in the 1992 Thoroughfare Plan. The Study focused on assessment of the need for a connecting roadway around Mount Vernon.

- **Access Ohio.** This transportation plan is a comprehensive view of the State’s highway network prepared by the Ohio Department of Transportation. It classified roads as arterials and collectors, identified deficiencies and proposed improvements.

- **The Ohio Department of Transportation, Division of Planning conducted a study of traffic conditions on state routes and in 2004 issued a report, Mount Vernon Transportation Planning Study: Analysis of Existing Traffic Conditions.** The Study documented the daily loss of 2,063 more hours by motorists in Mount Vernon than would be lost if all traffic proceeded continually at the posted speed limits. The loss occurs primarily in the downtown area. The Study concluded that none of the traffic in Mount Vernon met the ODOT criteria for congestion.

Nevertheless, the traffic patterns found by the Study characterized the routes serving Mount Vernon as an interchange, rather than a junction. In an interchange, multiple routes converge to a single area for distribution. As a result, the flow of traffic on all of the roadways is similar as illustrated by Figure 8. Because the routes traverse downtown Mount Vernon on two or more streets, they must jog or “dog-leg,” necessitating turns. Traffic counts in the Study demonstrate that at intersections where such jogs occur, large numbers of vehicles, including trucks, leave the marked route and continue on streets that are not part of the current routing.
Figure 8 Mount Vernon Through Traffic
Interstate Linkages

Figure 9, below, illustrates the primary routes in and out of Knox County, and their connections to interstate highways. There are three interstates in the region: I-71, I-70 and I-77. Interstate 71 is nearest, nearly touching the northwestern corner of the County, and providing a connection with the Cincinnati, Cleveland and Columbus areas. It is accessible by the way of S.R. 95, S.R. 229, S.R. 13 and U.S. 36. Interstate 70 travels east-west through Columbus and is most directly accessible from Knox County by S.R. 661 and S.R. 13.
Vehicle Registration

The following table shows the number of vehicles registered in Knox County by year from 2006 to 2011 and the annual increase or decrease. The total increase in passenger cars over the five-year period was approximately 2.5%. By comparison, the number of vehicle registrations issued in Ohio decreased by approximately 1.03% from 12,127,645 in 2006 to 11,788,425 in 2011. The number of locally owned vehicles on Knox County roads increased significantly more than the number in Ohio.

<table>
<thead>
<tr>
<th>Year</th>
<th>Passenger Vehicle Registration</th>
<th>Percent Inc/Dec</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>35,998</td>
<td>-7.6%</td>
</tr>
<tr>
<td>2006</td>
<td>36,136</td>
<td>1.0%</td>
</tr>
<tr>
<td>2007</td>
<td>36,492</td>
<td>1.01%</td>
</tr>
<tr>
<td>2008</td>
<td>36,694</td>
<td>.99%</td>
</tr>
<tr>
<td>2009</td>
<td>36,492</td>
<td>-.99%</td>
</tr>
<tr>
<td>2010</td>
<td>37,192</td>
<td>1.02%</td>
</tr>
<tr>
<td>2011</td>
<td>39,020</td>
<td>1.05%</td>
</tr>
</tbody>
</table>

Source: Ohio Department of Motor Vehicles

Significant Areas of Traffic Generation in Knox County

Areas that are major origins and destinations for vehicular trips include the following:

- Coshocton Avenue within Mount Vernon

  The eastern side of Mount Vernon along Coshocton Road (U.S. 36) is the primary highway-oriented shopping district in Knox County. The commercial activity makes Coshocton Avenue one of the busiest roadways in Knox County, with traffic approaching 27,000 cars per day.

  One reason for the high accident rate on Coshocton Avenue is the conflict between access to adjoining property and movement of through traffic. This is a common problem on high-volume commercial roadways throughout Ohio. Without innovative measures, such as access roads and shared access points, a roadway cannot maximize both through traffic and access to adjoining property because of the inherent conflict between turning traffic and through traffic.
The problems with the flow of traffic on Coshocton Avenue have prompted studies and subsequent improvements. In 1989, a traffic study recommended both short-term and long-term improvements in response to increasing traffic volumes and proposed commercial development. One recommendation was development of an access management plan, including construction of future access roads. That project was completed in 2003.

In August 1997, an updated plan for access roads with two new signals to improve traffic flow along Coshocton Avenue was proposed. One access road south of Coshocton Avenue has connected Yauger Road with Coshocton Road. The other access road would be north of and almost parallel to Coshocton Road, from Vernonview Drive eastward. Funding for this improvement is still being investigated.

In 1994, the City of Mount Vernon initiated an improvement project for widening Coshocton Avenue to five full lanes from Vernonview Drive to Upper Gilchrist Road with curbs, gutters, sidewalks, associated drainage improvements and two new signals.

- **Harcourt Road**

  Development along U.S. 36 south of the intersection with S.R. 229, on the outskirts of Mount Vernon in Clinton Township, has been limited by the availability of public water and sanitary sewers. With the recent extension of public water lines and sewer lines to the area, development on Harcourt Road is expected to increase.

- **Industrial Area South of Mount Vernon**

  A large industrial area, partly in Clinton Township and partly within the city, is south of Mount Vernon between S.R.13 and S.R. 661. The area generates significant worker and truck traffic. Finding better ways for trucks to carry goods into and out of the industrial area efficiently and safely is a major issue. This concern was a significant issue in the development of the 1992 Thoroughfare Plan and the subsequent Bypass Study.

- **Apple Valley**

  Apple Valley has become less of a resort and more of a place for permanent year-round homes. In recent years housing construction in Apple Valley has equaled about 20 percent of residential construction in the county. Concern for how current and future residents will travel to and from places to work and shop is emerging as a significant transportation issue.

  Despite current construction, “build-out” of Apple Valley will not occur for many years because it currently contains approximately 2,500 housing units, but was platted with approximately 6,600 lots. While some existing houses are located on two or more lots, and some future homes will also be located on two or more lots, the remaining number of building sites is very large. The potential for impact on roads and streets is equally large.
For illustrative purposes, assume that 4,000 lots remain vacant and three-fourths of them will become home sites. The Institute of Transportation Engineers (ITE) calculates that each detached single-family housing unit generates an average of 9.57 trip ends per day (each trip end is a trip to or from a housing unit). Although that estimate of trips per day may be high given the composition of households in Apple Valley, it suggests that traffic flow could increase by 28,710 trip ends per day.

Thus, with current and projected traffic flow into and out of Apple Valley, the intersections of U.S. 36 and Apple Valley Boulevard (County 3) will likely become more dangerous and congested. This will likely produce the need for traffic controls to maintain the safety and capacity of U.S. 36.

- **Downtown Mount Vernon**

  The downtown area of Mount Vernon is both a thriving local center of business and a regional tourist attraction for dining, shopping, and entertainment. The downtown square is also the intersection of several local and regional highways, namely U.S. 36, S.R. 3 and S.R. 229. Two of the highways, U.S. 36 and S.R. 13, were designated major arterials in the 1998 Plan. S.R. 3 and S.R. 229 were designated minor arterial routes. Traffic around the square travels one way. The additional traffic makes the square hazardous for pedestrian-oriented activities and could compromise the atmosphere that attracts tourists.

  The *Mount Vernon Transportation Planning Study: Analysis of Existing Traffic Conditions* issued in December 2004 concluded that none of the traffic in Mount Vernon met the Ohio DOT criteria for congestion. The study identified impediments to the flow of traffic, including traffic signals and left turns on state routes, and provided a data-based conceptual framework for addressing them.

### 3.4.2 Airports

There are two commercial airports in Knox County. Wynkoop, located on South Main Street, just south of Mount Vernon, is privately owned and features a grass landing strip. The Knox County Regional Airport (KCRA) is owned by the Knox County Regional Airport Authority and is located some four miles southwest of Mount Vernon. It is accessible from S.R. 661 and U.S. 36. There are two private heliports (Kokosing Construction and Knox Community Hospital) and five private grass airfields in the county. Of these private airfields, only Chapman Field in Centerburg can be used for commercial operations, but it is not open to the general public. The other private facilities are not under state rules and are uninspected.

The Knox County Regional Airport serves the general aviation needs of the Knox County area. General aviation includes all aircraft not flown by the airlines or the military. Business aviation, one of the most important segments of general aviation, consists of companies and individuals using aircraft as tools in the conduct of their business.

One of the top 10 reasons that businesses choose a location for expansion is access to local community airports. Accordingly, the KCRA plays an important role in the strength of the local economy. Two of the biggest corporate users of the airport are also two of the largest employers in the county, Ariel Corporation and Jeld-Wen. Regular corporate traffic is also generated by Dana, Owens-Corning, Rolls-Royce, United Precast, Divelbiss Corporation, Central Ohio Fabricators and
Parrish & O’Neill Insurance. Parents, visitors and board members of Kenyon College also frequently use the airport.

The Knox County Regional Airport is one of just eight airports in Ohio with a Commercial Operating Certificate issued by the Ohio Department of Transportation, Office of Aviation, meaning that there are no problems with obstructions and other safety criteria. KCRA has a 5,500 x 100 foot runway with parallel taxiway. The airport currently has VOR and GPS instrument approaches, with a WAAS approach expected in 2013. With recently completed upgrades, the airport meets all FAA design criteria for Class DII jet aircraft. A terminal building provides amenities for passengers and flight crews as well as offices for airport staff. The airport features aircraft maintenance facilities and an upholstery shop. There are presently more than 75 aircraft based at the airport.

The airport is also part of the general community, serving as the host for a number of community events. The county schools include the airport as a resource in their aviation curriculum and the annual “Third Grade Aviation Day” at the airport has become a popular tradition. Airport facilities and equipment are also available for use by the County Emergency Management Agency in case of emergency. The Mount Vernon Fire Department routinely conducts fire inspection drills at the airport.

Near-term improvements planned at the airport include expansion of the ramp area to handle increased jet traffic, security fencing, a new terminal building and additional corporate hangars.

3.4.3 Railroads

In 1974, two active rail lines traversed Knox County. One was the Penn-Central line, which followed an irregular east-west path across the county through Centerburg, Mount Vernon, Gambier and Danville. This line was abandoned and the right-of-way from Mount Vernon to Danville was redeveloped as the Kokosing Gap Bike Trail. The Penn-Central right-of-way from Mount Vernon to the county line southwest of Centerburg is being developed as the Heart of Ohio Trail. The other line was the Baltimore and Ohio Railroad (CSX) running north/south through the county. Part of this line, from Newark to Mount Vernon, was leased in late 2004 by the Ohio Central Railway and serves industrial and agricultural cargo uses.

3.4.4 Transit Systems

Knox Area Transit (KAT) is a county public transportation provider for Knox County, operating under grants from the Federal Transit Administration, the Ohio Department of Transportation, the City of Mount Vernon and the Knox County Board of Commissioners. The federal and state funding provided for calendar year 2011 operating and capital grants totaled $1,048,805.

KAT offers a combination of demand-responsive “Door-to-Door” service in and out of Knox County and scheduled “Point Deviation” shuttle service within Knox County. Shuttle buses provide in-town economical service and run every half hour.

Knox Area Transit offers a 50 percent discount off the base fares for elderly (65 or older) or disabled (declared by a doctor) customers providing a KAT E&D identification card.
3.4.5 Public Water Systems

City of Mount Vernon

The City of Mount Vernon owns and operates the largest water supply system in Knox County. The City uses a groundwater supply and receives its drinking water from two Ranney horizontal collector wells. The aquifer that supplies drinking water to the City has a high susceptibility due to the sensitive nature of the aquifer and the existing pollution-potential contaminant sources. The Water Treatment Plant (WTP), which began operation in 2001, is a conventional lime softening plant. In 2010, the plant’s average production was 2.54 million gallons a day (MGD) while production peaked at 4.53 MGD. The facility has the capacity to treat 6.2 MGD with the potential to double that capacity should the need arise. The facility has a 1,000,000-gallon clear well for storage.

There are approximately 90 miles of water lines ranging in size from four inches to 20 inches, although there are several areas with runs of smaller-diameter pipe. There are over 900 fire hydrants located from 300 to 600 feet apart throughout the city. The distribution system is divided into four isolated zones. The first serves the majority of the city with pressures ranging from 40 to 90 pounds per square inch (psi). This zone is supplied either from the treatment plant or from the 2,000,000-gallon reservoir located on New Gambier Road. The other three zones are in areas that require increased pressure: the North Boosted Zone, the East Boosted Zone and the South Boosted Zone. Pressure to the north is boosted by the 150,000-gallon Wooster Road Elevated Tank and associated booster pump station. The east zone is boosted by the 400,000-gallon East Side Elevated Tank and associated booster station. Pressure is supplied to the South Boosted Zone using a constant operation pump and two additional on-demand pumps.

The system currently serves a population of approximately 17,674 through 6,678 service taps in Mount Vernon and Clinton Township. The City has contracts to serve Clinton Township, the Village of Gambier, the Mount Vernon Developmental Center and the Knox County Board of Commissioners for other areas outside the city boundaries that are not covered by these specific contracts. Under current policy, annexation is not required by the City to extend water service outside the municipality.

Village of Fredericktown

The Village of Fredericktown expanded its water treatment plant in 1997. This plant has a rated capacity of 630,000 GPD. The plant currently treats 230,000 GPD from three wells. The water is treated with four high-pressure filters to remove iron and manganese. The water is then chlorinated and stabilized with a polyphosphate blend. The water is stored in a 150,000-gallon clear well from which it is pumped to the system and existing 100,000-gallon elevated tower. Fredericktown is planning to erect a new 300,000-gallon elevated tank to improve fire flow and to meet future industrial needs.

Village of Gambier

The Village of Gambier purchases treated water from the City of Mount Vernon by agreement. The average daily flow to Gambier has decreased in recent years due to the Village of Gambier finding several large leaks in town. The Village was averaging 300,000 GPD and is now averaging 185,000 GPD when Kenyon College is in session. The water is pumped into the Village’s 250,000-
gallon elevated storage tank and then distributed. In recent years, the Village has replaced several plastic mains with ductile iron mains.

**Village of Centerburg**

The water treatment plant serving the Village of Centerburg currently has a maximum rated capacity of 200,000 GPD. The average daily usage in the Village is 120,000 gallons, and has had over a six percent reduction due to conservation from the peak usage of 128,000 GPD in 2005. The Village currently serves 655 customers, 30 of which are outside the corporate limits. Two wells are used to supply this demand, and planning for a properly isolated future well field is being undertaken by the Village for two additional wells. The Village maintains a modern 200,000-gallon elevated storage tank.

At the present time, the water treatment facility only treats for iron removal. As demand usage exceeds 150,000 GPD, the limitations of the present treatment system will necessitate improvements and/or expansion to provide the additional water. Due to the economic changes from 2006 to present, the existing facility is adequate to meet projected growth rates during the next 10 years. However, problems with adequate fire protection in limited areas of the commercial and business districts in the village still exist and the potential need to supply a large consumer could create the need for improvements sooner.

**Village of Danville**

Approximately 480 customers inside and 12 water and/or sewer customers outside the corporation limits are served by the Village of Danville water system. The Village currently has an ordinance indicating willingness to provide water outside the corporation on a case-by-case basis, subject to the recipient’s agreement to annex. The Village operates two wells for its water supply, which is treated at its 200,000 GPD plant. Average daily usage is 100,000 GPD. The Village has 205,000 gallons of elevated storage. With water usage at a fraction of capacity, the treatment plant should provide adequate water supply for the foreseeable future, given current growth projections.

**Knox County Water District**

The Knox County Water District was established countywide in the early 1990s. The only water system currently owned and operated by the district serves approximately 2,872 customers in the Howard and Apple Valley area.

This system is comprised of five production groundwater wells. Sequestration, fluoridation and disinfection are the three levels of treatment achieved at the facility. The average daily water production is 750,000 GPD. The maximum production capacity is 1,296,000 GPD.

The water distribution system houses a 1,000 gallon-per-minute booster station, two 500,000-gallon finished water storage tanks and 80 miles of water distribution main lines.
3.4.6 Public Waste Water Systems

City of Mount Vernon

The Mount Vernon Wastewater Treatment Plant (WWTP) is a contact stabilization plant providing primary and secondary treatment, disinfection and dechlorination. It is designed for a daily flow of five MGD (million gallons a day) and a peak flow of 12.5 MGD. Currently the facility treats an average of approximately 3.2 MGD. The current facility was designed for a total population of 25,000. The original plant was built in the 1950s while a major renovation in the 1970s added secondary treatment and increased the capacity to the current five MGD. Sludge handling facilities were added in the 1990s, a new Lab/Admin building was completed in 2004 and screening and aeration upgrades were done in 2005. The facility will undergo over $5.7 million upgrades to the electrical and instrumentation systems and add a septage receiving facility in 2012. A new emergency generator will keep the entire plant operating during power outages. The new generator is required by the plant’s current NPDES (National Pollutant Discharge Elimination) permit to eliminate internal bypasses the plant experiences during power outages.

The collection system consists of approximately 90 miles of gravity sewers with 11 lift stations. The City has agreements with Clinton Township and the Knox County Commissioners to provide service to adjacent communities; annexation is not required. The WWTP does experience overloading of the facility during heavy rainfall due to inflow and infiltration (I & I). Two major interceptors, the Kokosing and the newer of the two parallel Center Run sewers, were repaired in 2011 as part of a program to address I & I reduction. An older interceptor, the original Center Run, will be abandoned as part of this project. This project is also part of a compliance schedule in the current NPDES permit.

The City has a pretreatment program to manage the industrial users that have a potential to discharge pollutants that may harm the treatment plant, as well as a Fats, Oils and Grease (FOG) program for food service establishments. Additional programs on the horizon include best management practices for auto repair shops and dentists.

The Mount Vernon WWTP discharges treated wastewater into the Kokosing River which is listed as an exceptional warm water habitat and a state Scenic River. Sludge is stored in two 420,000-gallon storage tanks, removed from the facility by contract hauler and applied to local fields in an Ohio EPA approved land application program.

Village of Fredericktown

The Village of Fredericktown operates a newly modified oxidation ditch sewer plant that is fed by a gravity collection with three lift stations. This facility was completed in 2009 and has a daily treatment capacity of 700,000 GPD and a 2 million-GPD storm flow capacity. Currently there are approximately 1,100 customers contributing an average daily flow of 230,000 GPD. This is one third of the plant’s capacity. This flow is discharged to the North Branch of the Kokosing River, which has been designated by the State of Ohio as a Scenic River. Because of this designation the treatment requirements to discharge to this river are very strict. With this new treatment plant the Village is able to have a discharge that is well below the limits that have been set by the Ohio EPA.

Fredericktown has the first Burch Biowave Sludge Processing system in the United States. This system was installed in 2005 and is able to convert liquid sludge into a product that is 90 percent dry and destroys all pathogens and bacteria that may have been present in the sludge. This
system provides the Village with a Class A, Exceptional Quality sludge that can be used as a soil amendment for landscaping.

The Village has entered into an agreement with the Ohio EPA to separate the current combined sewer system that was constructed in 1938. This is a 20 year project. The Village is currently working on the second phase and has applied to the state for financial assistance for design and construction for this project.

Village of Gambier

Wastewater treatment is provided by an oxidation ditch completed in 1996. The gravity collection system included one Village lift station and several private lift stations. The design capacity of the plant is 500,000 GPD and the average daily use is less than half of the capacity at 160,000 GPD. The average daily use has decreased over the years due to the water usage decreasing as a result of leaks being repaired. The treatment plant discharges effluent into the Kokosing River.

Downstream from Gambier to the confluence of the Walhonding River, the Kokosing is classified a “State Natural Resource Waters” and “Exceptional Warm Water Habitat.” Being downstream from Mount Vernon, it seems that there would be significant capacity in the river to assimilate more wastewater discharge under current regulations. The existing difference between plant design capacity and average daily usage is equivalent to supporting an additional 2,800 persons (or an equivalent amount of combined residential and nonresidential flow). This capacity should provide adequate wastewater treatment for some time, based on current growth rates. There are no Ohio EPA “findings and orders” for the wastewater treatment plant.

Village of Centerburg Water Reclamation Facility

The Village of Centerburg owns and operates a substantially gravity collection system and wastewater treatment facility that presently uses a conventional trickling filter followed by a sand filter technology. The plant has a design capacity of 200,000 gallons with an average daily usage of 165,000 GPD in 2010. The system serves 565 users with 48 users outside the Village. The Village experiences some inflow and infiltration and has a Sanitary Sewer Overflow (SSO). The Village has a compliance schedule in their current NPDES permit to require the elimination of the SSO and to address process technology limitations of the existing wastewater treatment facility.

The Village is located in the headwaters of the North Fork of the Licking River and the aquatic life designated use is Warm Water Habitat. The Ohio EPA Integrated Water Quality Monitoring and Assessment Report issued in 2010 defined the stream segment downstream of Centerburg as being in Partial Attainment and placed it on the Section 303(d) list of Prioritized Impaired Waters. The Village of Centerburg has completed Facilities Planning for the area, purchased land for a new water reclamation facility downstream of the Village directly on the North Fork of the Licking River, and has developed an implementation program for the selected alternative of the Facilities Plan.

The selected plan includes upgraded sanitary sewer infrastructure to eliminate the sanitary sewer overflow, a pump station, force main and downstream gravity sewer to connect the trunk sewer to the proposed treatment facility, and a new modern extended aeration process with 300,000 GPD treatment capacity for the projected 20 year growth. This will provide capacity for an additional 900 people to be served by the system as growth occurs.
Village of Danville

Approximately 480 customers inside the village and 12 outside the village limits are served by the Danville Wastewater Treatment System. The system is approximately 20 years old and includes six aerated lagoons and a gravity collection system. The design capacity of the system is 200,000 GPD and average daily usage is 295,000 GPD. Recent renovations included an extended capacity of 800,000 GPD to control overloading during high periods of inflow and infiltration, along with lagoon lining and a chlorinating system. New collection improvements have been made to address inflow and infiltration problems. The wastewater treatment system discharges effluent into the East Branch of Jelloway Creek, which flows into the Kokosing River. Future increases in plant capacity will depend on the assimilative capacity of the stream and the best available wastewater treatment. The existing difference between plant design capacity and average usage is equivalent to supporting an additional 700 persons (or an equivalent amount of combined residential and nonresidential flow). This treatment capacity should provide adequate wastewater treatment for some time, based on current growth rates. There are no current Ohio EPA “findings and orders” for the wastewater treatment plant.

Knox County Sewer District

The Knox County Sewer District was established in 1971. It owns and operates a number of wastewater treatment and collection systems in unincorporated portions of Knox County.

The Little Jelloway Wastewater Treatment Plant is the largest system, which currently serves approximately 2,900 customers in the Howard and Apple Valley areas. This treatment plant utilizes several different levels of treatment, starting with primary, secondary, tertiary, disinfection and ending with dechlorination. The average daily flow from this system is 550,000 GPD. The maximum capacity of the treatment works is 2,000,000 GPD. The collection system is comprised of approximately 120 miles of main lines, 22 lift stations and 240 residential grinder lift stations.

The district will soon be adding new systems in Bladensburg and Millwood. The Hamlet of Bladensburg will operate a “decentralized” sewer system which will serve 90 customers. The Hamlet of Millwood will operate a “centralized” sewer collection system, which will serve 66 customers, and Millwood’s waste flow will be pumped over to the Little Jelloway Wastewater Plant for treatment.

The district is not currently under Ohio EPA “Findings and Order,” however, it is currently undergoing renovations to meet more stringent discharge permit limits.

Clinton Township Regional Water and Sewer District

The Clinton Township Regional Water and Sewer District provides wastewater services to approximately 900 households in Clinton Township and portions of Mount Vernon. There is no water service. The City of Mount Vernon currently provides wastewater treatment and customer billing services to the district. The district is currently exploring all options for total independent management.
3.4.7 Parks and Open Space

Recreation and park land includes areas for active recreation such as ball fields and areas for passive recreation such as nature trails and gardens. The rolling hills, streams and open fields provide many outdoor recreational opportunities including hiking, water and snow skiing, biking, fishing and boating. Public parks are classified in three categories: neighborhood parks, major urban parks and regional parks. Publicly owned park and recreation facilities, excepting the privately owned Ramser Arboretum, are shown on Map 6.

- Neighborhood Parks - There are 11 neighborhood parks in Knox County, ranging in size from one to 18 acres. Their primary function is to serve residents within the immediate area, although some may have facilities available for larger events. Parks in this category cover approximately 73 acres.

- Major Urban Parks - The five major urban parks provide public recreational space for a larger section of the community, or provide enough space and facilities for local and regional events. These parks range from 20 to 76 acres in size. Parks in this category cover approximately 250 acres.

- Regional Parks - These parks serve a regional area and provide active and passive recreational activities, including boating, hiking, fishing, hunting, biking and camping. Roadside parks are also included in this category, because they are used by travelers as rest areas. Combined acreage of regional parks is approximately 3,785 acres. These parks include three large wildlife areas (the Mohican, Kokosing, Knox Lake Wildlife Areas) and four county parks (Honey Run Park, Thayer Ridge Park, Bat Nest Access and Wolf Run Park).

- The Mohican River Wildlife Area consists of two separate units called the Upper and Lower Areas. Most of the land was acquired from the Muskingum Watershed Conservancy District in 1958. The areas are on the eastern boundary of Knox County and in Coshocton County. The stretch of Mohican River which flows through the Area averages one-hundred feet in width and is comprised of relatively long, deep pools with occasional ripples. Recreational activities in wildlife areas include fishing, canoeing and hunting. Conservation activities include protection and improvement of the shrubbery and permanent grasslands, maintenance of small portions of open bottom land, and habitat development for native wildlife. The only facilities are a parking lot and a primitive boat-launching ramp at the Upper Area.

- The Kokosing Wildlife Area, north of Fredericktown, provides good cover for deer, rabbits, turkeys and pheasants. Public hunting is permitted on the 580-acre tract during the appropriate seasons. The Kokosing Reservoir, along Waterford Road north of Fredericktown, is stocked with largemouth bass, bluegill, saugeye, crappie, catfish and other common species. The Kokosing River, flowing from northwest to southeast through the county, offers scenic views and good water quality.

- The Knox Lake Wildlife Area, northeast of Fredericktown, is stocked with largemouth bass, crappie, bluegill, perch and other common species. Knox Lake is 20 feet at its deepest point near the spillway. The lake then tapers at the northern end to between two and four feet. There are boat ramps, boat rental, bait and parking facilities.
**Outdoor Recreation Space**

One negative indicator of the quality of life in Knox County is the available acreage of parks and outdoor recreation areas. The Ohio Department of Natural Resources publishes the Statewide Comprehensive Outdoor Recreation Plan (SCORP) as Ohio’s official policy document for outdoor recreation. The SCORP provides data on outdoor recreation acreage by county. According to the ODNR, the total size of Knox County is 338,916 acres (over 529 square miles). This ranks the County in the top one-fourth (number 21) of Ohio’s 88 counties by geographic size. However, Knox County does not rank favorably in percentage of public outdoor recreation acreage (land and water), as Knox County ranks 62 out of 88 counties. Additionally, Knox County ranks 72 out of 88 counties in terms of outdoor recreation area per 1,000 residents.

*Source for data: Statewide Comprehensive Outdoor Recreation Plan 2008 ODNR*

Other outdoor recreational opportunities existing in the county can be enjoyed by county residents. These include eight golf courses, two disk (Frisbee) golf courses, two dog parks (bark parks) and five campgrounds. The Knox County Horse Park provides riding and competitive opportunities for horse owners/lovers.

### 3.4.8 Recreational Trail Systems

**Kokosing Gap Trail**

Besides more typical public park and open areas, the Kokosing Gap Trail (KGT) is a popular outdoor recreation facility for residents and visitors. The National Rails to Trail Conservancy named the KGT one of the best rail trails in the country in 2008. The KGT is a paved trail through the woods along the Kokosing River between Mount Vernon and Danville via Gambier and Howard. The KGT is owned by the Board of County Commissioners and is maintained by the Board of Trustees of the Kokosing Gap Trail, Inc., a 501(c)(3) tax-exempt organization. This organization is responsible for day-to-day maintenance, fund raising and coordination of volunteers. The Knox County Park District assists both entities with management of the trail and maintenance of parking areas.

Since the KGT was constructed, its popularity has increased and a number of associated been made. Some recent improvements include the following:

- The opening of the KCPD, 15-acre Hellbender Preserve for hiking adjacent to the trail;
- Construction of a picnic shelter, water fountain and parking lot at the eastern terminus of the trail by the Village of Danville;
- A grant for the Village of Gambier to construct a trail connector east of the Gambier depot to provide users safe access to the village community center, athletic fields and dog park.

**Mohican Valley Trail**

At the northeastern end of the KGT in Danville is the Mohican Valley Trail (MVT). The MVT is 4.8 miles long and links Danville to Gann. At Gann the trail crosses the Mohican River through a 370-foot covered bridge called the “Bridge of Dreams.” East of the bridge the trail extends into Holmes County and connects to the Holmes County Trail. The tourism impact of the longest covered trail
bridge in the country is quantified by guest log data from the bridge. More than 18,000 visitors have signed the log, representing 49 states and 44 countries. With the impending construction and paving of the Holmes County Trail, visitation to the trail and resulting tourism will increase. A one-half-mile section of the trail was paved in October 2010 from the Bridge of Dreams to the Holmes County line.

Heart of Ohio Trail

The more than 30-mile trail system trending through the county is completed by the Heart of Ohio Trail (HOOT). The HOOT is mowed and maintained by KCPD staff and the Heart of Ohio Trail Board, a 501(c)(3) organization. When complete, the HOOT will link to the Kokosing Gap Trail in Foundation Park (Mount Vernon) and will link with the Delaware County bike trail system. Tourism activities will likely increase once users from northern Franklin and Delaware counties visit this trail system. The Knox County Commissioners owns the rail bed, and the Knox County Park District provides local grant matching funds to pave the trail. Over seven miles of the HOOT were paved in 2010 and 2011. The trail connects with the KCPD's Thayer Ridge Park.

3.4.9 Solid Waste Management Systems

Currently there is no active solid waste landfill in Knox County or within the Delaware, Knox, Marion, Morrow Solid Waste District. Solid waste from the county is hauled to a landfill in Wyandotte County. There is one solid waste transfer station in Mount Vernon.

A closed municipal solid waste landfill on Thayer Road is monitored routinely according to Ohio EPA rules. A portion of this landfill is currently used for composting yard waste. A second composting facility is located at Kenyon College.

The county has an active recycling program with drop-off sites throughout the county and one full-time recycling center in Mount Vernon.

3.5 Social Infrastructure

Apart from the cultural and social aspects of Knox County, there are delivery systems for public services. Those delivery systems can be viewed as “social infrastructure” made up of various districts, councils and organizations (governmental, quasi-governmental or private), providing social services directly or indirectly to residents. Although “social infrastructure” may be defined in various ways, for the purpose of this plan its main components are as follows:

- Community services;
- Fire and emergency medical services;
- Schools;
- Zoning administration;
- Arts council;
- Historic preservation;
- Organizations of elected officials.
3.5.1 Community Services

Area residents, organizations and corporations participate in many local initiatives that are a part of Knox County’s social fabric. The annual Food for the Hungry Drive and United Way Campaign are clear examples of overwhelming support that is provided at a local level to ensure that emergency needs are met for area residents and that prevention programs are established to address many needs before they begin. Volunteer opportunities abound through many of these efforts and are an excellent way for residents of all ages to become actively involved in their community.

Since 1995, the Knox County Family and Children First Council has been a collaboration that creates partnerships of government agencies, community organizations and parents who are committed to improving the well-being of children and their families. The Knox County Early Childhood Coordinating Committee is a subcommittee that focuses on the needs of families with children from birth to kindergarten completion. A multiagency community team facilitates comprehensive, family-centered, creative solutions to support and empower Knox County families with children facing multiple life stressors while ensuring the most effective use of existing services.

As a means of connecting area residents to the many different social services available, 2-1-1 was established in 2008. 2-1-1 is a comprehensive 24/7 information and referral line that provides callers with the most current information about area agencies, programs and services. In addition, 2-1-1 provides crisis intervention services and support when needed. Whether someone dials 2-1-1 to have their questions answered by Pathways of Central Ohio trained staff or visits www.pathwaysofcentralohio.org and clicks on the 2-1-1 Crisis/Hotline tab to utilize an online resource directory, area residents can access information on services that can improve their quality of life, as well as learn about ways to become involved in helping others.

3.5.2 Fire and Emergency Medical Services

Multiple fire districts exist in Knox County (see Map 7). All districts provide mutual aid both inside and outside of the borders of Knox County and have a long history of good working relationships stemming from mutual-aid agreements. Public discussions for this update revealed an interest in additional cooperation. Cooperation and coordination are continuing through advanced dispatch capabilities, and improved response times. Better radio communications and lower costs would benefit everyone in the county. Meaningful progress will require focused effort by the various fire districts, local officials, members of the health-care delivery system and the Knox County Emergency Management Agency.

3.5.3 Schools

Knox County has five public school systems that serve the educational needs of children aged kindergarten through grade 12. There are four private elementary schools and one private high school operating in the county. Also, there is a large home-school population that is very active.

Additional educational opportunities are available to the young adult and adult population through a public career center which offers vocational training for students from area high schools and adult education opportunities for employment, continuing education and personal enrichment.

Degree-based educational opportunities exist in the county through three post-secondary institutions, two of which offer graduate level opportunities.
Knox County has a rich tradition of producing students that are productive, high-quality members of the community. School administrators must continue to find ways to operate the schools in a way so that the taxpayers of the county feel good about supporting levies and take pride in their schools.

3.5.4 Zoning Administration

Knox County has 18 zoned townships and potentially as many part-time zoning officials. Although each township should retain control over local decisions about land use, opportunities for collaboration and shared resources exist. For example, the RPC could supply an inspector to administer zoning for several townships. Alternatively, two or more townships could share one zoning inspector. Either way could provide more consistent and timely service to participating townships.

Continued development of local programs for zoning officials (annual meetings, conferences, training sessions, etc.) could strengthen administrative capacity throughout the county. Such programs could be organized for both townships and municipalities by the RPC.

3.5.5 Arts Council

Creation of an Arts Council has been discussed as a way to formalize relationships in Knox County. Such an umbrella organization could coordinate art-related activity throughout the county and adjacent areas. This would enhance synergy between specific events and coordination of ongoing activities. The umbrella organization could be housed in the renovated Woodward Opera House. The nonprofit Knox Partnership for Arts and Culture could become part of, or could be transformed into, an arts council.

3.5.6 Historic Preservation

Knox County’s historic districts are a part of the social infrastructure. Currently the county has 43 listings on the National Historic Register, including six districts and 37 sites. Four of the historic districts (Downtown, East Gambier Street, East High Street and North Main/North Gay Street) are in Mount Vernon. The other two historic districts are in Gambier (Gambier Historic District and Kenyon College).

3.5.7 Organizations of Elected Officials

More could be done to organize local elected and appointed officials to foster exchanging ideas and sharing expertise. Associations for township, municipal, county and zoning officials could encourage collaboration and the sharing of ideas among the various governmental officials in the county.
3.6 Health Services

3.6.1 General

- Better health for Knox County residents is intricately related to land use planning and the way towns, villages and agricultural areas are developed or redeveloped.
- The places people live, work, learn and play profoundly shape their health. When neighborhoods do not have safe parks, places to walk, vibrant retail or healthy food available, everyone’s health suffers. Healthy communities provide the foundation and context for healthy behaviors and outcomes. Towns and villages built exclusively for automobiles where walking and biking opportunities are decreased or where there are “food deserts” – areas where finding fresh fruits and vegetables to buy can be difficult – currently exist in the county.
- The majority of deaths in Knox County in 2010 could be attributed to chronic diseases or to preventable injury.
- Teen birth rate (age 15-17, 2008) = 20.4 per 1,000, State Rate = 19.7.
- Knox County has a higher-than-state rate for unintentional injury deaths, motor vehicle related deaths, diabetes deaths and flu/pneumonia deaths.
- Knox County also has a higher-than-state rate for adults being overweight and persons with hypertension and asthma.
- Five Leading Causes of Death in 2010 – 1) Heart related, 2) Cancer, 3) Lung Disease, 4) Flu/Pneumonia, 5) Accidents.

3.6.2 Health Services

- The foundational health services, i.e. physical, behavioral, dental care, are available in the county or within a 30 to 45 minute drive from Mount Vernon.
- Access to these services is limited due to a person’s inability to pay for the service, being uninsured or underinsured or due to provider appointment time limits.
- Transportation to healthcare providers is also an issue for many residents living in our rural areas.
- Consideration in planning must be given to healthcare facilities and services that offer easy access to those senior residents that cannot drive. Satellite offices for services may be appropriate in this rural county.

3.7 Cultural Facilities and Programs

Knox County offers many opportunities for cultural enrichment, which enhance the quality of life. These cultural characteristics include physical facilities, cultural events and organizations.

3.7.1 Cultural Facilities

While it is not the intent to identify all cultural attractions in Knox County, some prominent ones are listed below:

- The Memorial Theater (Mount Vernon): Since 1925, the Memorial Building has been a focal point of cultural activities. Concerts, lectures, theater performances and exhibits are conducted in the 1100-seat theater. Since 1972, the Memorial Theater has been the
home of Ohio’s Distinguished Young Woman Program (formerly the Junior Miss Scholarship Program), an annual event honoring outstanding female high school seniors and attracting hundreds of spectators.

- Dan Emmett House (Mount Vernon): Daniel Decatur Emmett (1815-1904) was the father of the American minstrel show, composer of "Dixie," "Old Dan Tucker," "Blue Tail Fly" and other classic American songs. Period furniture creates a 19th-century atmosphere.

- Fredericktown Historical Museum (Fredericktown): The museum is on South Sandusky Street in a former Methodist church. It displays 19th-century artifacts, including photos from area homes, and a recent video tape of local history.

- Kenyon College (Gambier): The nationally prominent liberal arts college, founded in 1824, stands on an 800-acre campus with excellent examples of Gothic collegiate architecture. The college offers a full schedule of cultural events including plays, concerts, readings, lectures, art exhibits and films.

- Knox County Historical Society Museum (Mount Vernon): Located at 875 Harcourt Road, the museum displays artifacts from 19th-century domestic life, trades and professions. A collection of self-propelled farm and other engines, artifacts and documents relating to Daniel Decatur Emmett and Paul Lynde are displayed.

- Knox County Agricultural Museum (Mount Vernon): The site, located in the Knox County Fairgrounds, includes more than 2,000 implements and items related to agriculture and rural life in the 19th and early 20th centuries. Special attractions include a Conestoga wagon, a log cabin dating from 1881 and prehistoric Native American implements.

- Mount Vernon Nazarene University (Mount Vernon): The University is affiliated with the Church of the Nazarene. Its 210-acre campus is the site of cultural events including concerts, lectures, plays and exhibits.

### 3.7.2 Cultural Events and Organizations

While cultural facilities are important, events and organizations are essential to sustaining local culture and character. A sampling of events and organizations that help define local culture are presented below:

- There are several well established community theater groups offering plays, dramas, musicals, dinner theater and youth productions at several area venues each year. These groups include Mount Vernon Players, MTVarts, Orange Barrel Productions, Right Brain Productions, Chautauqua and Lyceum Productions, Bruce Jacklin Productions and others, each offering a variety of unique and inspiring performing arts events.

- Knox County Symphony - The symphony performs three to four concerts yearly.

- Community Concert Association - This organization sponsors five to six concerts yearly.

- Kenyon College and Mount Vernon Nazarene University - Art exhibits, lectures and concerts are regularly sponsored by both institutions. The Lecture Artist Series sponsored by Mount Vernon Nazarene University brings nationally known artists and scholars to the area.
• Danville-Howard Turkey Festival (June) - The festival encompasses a wide variety of activity including the following: live music, car show, fine food, games, bingo, Smoke House and Fire Department demonstrations. There is a show for everyone – arts, home crafters, antiques, collectibles, merchants and businesses.

• Knox County Fair (July) - Because of deep farming traditions, the Knox County Fair is a major event and an important aspect of local culture. The annual event regularly features harness racing, horse racing, antique tractor parades, tractor pulls, demolition derbies, amusement rides, top-name country entertainment and agricultural and 4-H exhibits. An important aspect of the Knox County Fair is that it brings farmers and nonfarmers together in a major community event.

• Dan Emmett Music and Arts Festival (August) - Activities include concerts featuring top national and regional talent, fiddle and banjo contests, children's performances, arts and crafts sales, a quilt show, an antiques show, historic demonstrations, antique and classic vehicle shows and tours of historic buildings. The event during a weekend draws approximately 20,000 participants annually.

• Mohican Bluegrass Festival (September) - The annual event, held near Danville at the Mohican Wilderness campgrounds, features four days of music with nationally known bands. Camping, canoeing and horseback riding are also featured activities.

• Oldtime Farming Festival (September) - The annual festival is held in Centerburg and features displays of antique tractors and farm machinery, demonstrations of traditional farm skills, craft shows and contests. Other features are free entertainment, a kid's corner and games, and free admission and parking. One of the major fund raisers is the pie auction on Saturday night.

• Fredericstown Tomato Show (September) - A community street fair that has something for everyone in the family to enjoy. There are exhibits, parades, rides, a craft show and fair food. There are many activities – bingo, a five-mile race, bidding on a commemorative Fredericstown plate or just relaxing and enjoying the entertainment.

• Downtown Mount Vernon Christmas Walk and Parade (November) - The event begins with a Christmas Parade on the Sunday after Thanksgiving. The parade is accompanied by an "open house" in Mount Vernon's Central Business District that features shopping, tours of the Woodward Opera House, holiday train rides, roasted chestnuts, carolers, period costumes, storytelling and a petting zoo.

• Gambier Craft Sale (December) - The pre-Christmas craft sale features crafters and artisans from central Ohio. This sale has an Austrian market theme and includes home-baked goods and other food items.
Chapter 4 – Planning Trends Affecting Knox County

4.1 Community Planning Attitudes and Trends

A brief explanation of certain national, state and local attitudes and trends is provided in this chapter to help form a basis for later discussion of key initiatives in Knox County. It is important to recognize that there are many common ideas among these trends and emerging attitudes. Local planning attitudes were identified from the different events held during the updating process and are summarized in this chapter.

4.2 Planning Trends

Sustainable Development

The concept of sustainable development has gained popularity with planners and community leaders since the early 1990s. Essentially, the concept of sustainable development advances the simple idea that communities are built for people and that the development of a community should enhance the quality of life of its residents, not detract from it. This concept promotes the idea that development should not create excessive environmental, social or economic costs for current or future generations.

Sustainable development generally includes the following types of approaches or initiatives:

- Creating an urban growth boundary.
- Avoiding continuous commercial zoning along arterial roads by fostering pedestrian-friendly clusters of commercial development.
- Encouraging mixed-use development.
- Revitalizing existing urban areas.
- Providing a more balanced mix of transportation alternatives.

New Urbanism or Traditional Town Planning

New urbanism or traditional town planning has become increasingly popular in recent years, as it has become more apparent that the traditional American suburb has many social, economic and environmental flaws. Proponents of new urbanism or traditional town planning believe that disinvestment in central cities, spread of suburban sprawl, increased separation of persons by race and income, environmental deterioration, loss of agricultural land and erosion of the built heritage create one interrelated complex problem. Some new urbanism or traditional town planning concepts include the following:

- Existing urban centers should be revitalized and new developments should be constructed as real neighborhoods.
- Concentrations of civic, institutional and commercial activity should be embedded in neighborhoods and districts, not in remote, single-use complexes. Schools should be located to enable children to walk or bicycle to them.
A range of parks, from tot-lots and village greens to ball fields and community gardens, should be distributed within neighborhoods. However, conservation areas and open space should be used to define and connect different neighborhoods and districts.

Design elements could include the following:

- Narrow, two-lane streets designed to slow traffic.
- Homes built close to the street and close to each other to encourage human interaction.
- Sidewalks that link schools, recreation centers, shopping, restaurants and other destinations that are close to homes.
- A variety of complementary housing types located next to each other. This results in condominiums on the same street with estate homes, town homes, mansions and cottages.
- A block-long village green along with preserved natural landscapes and water features.

Updated Development Standards

The requirements embodied in local zoning codes and subdivision regulations are responsible for many characteristics found in the built environment of most communities. These development standards are often wasteful, ineffective and simply unnecessary. In more progressive communities, many standards for development are being reexamined and changed to require a more desirable development pattern.

Examples of these updated development standards include the following:

- Modifying parking requirements for commercial development;
- Reducing parking lot standards;
- Allowing zero-lot-line, single-family housing to increase housing choices.

Conservation Design

Although conservation design is not necessarily a new concept, the idea that subdivisions should be constructed to incorporate open space networks and produce more than simply housing lots and streets is becoming more popular. This concept has been advanced most recently by Randall G. Arendt in books such as Conservation Design for Subdivisions. Earlier related ideas have been sometimes called “cluster subdivisions” and “planned unit developments.”

Current thinking on the subject of conservation design requires the design of a new residential subdivision to begin with the identification of the land to be preserved, given the natural amenities of the site. These amenities might include woodlots, open meadows, river corridors, etc. Then given the total number of units that would be allowed under conventional zoning classifications, the subdivision design should cluster housing units in the remaining areas of the development. In this way, the conservation design is “density-neutral,” given that the same number of units would be allowed on the site under conventional development and conservation design.

Some major advantages to the practice of conservation design include the following:

- Lower development costs - Clustering development can significantly reduce development costs with reduced requirements for streets, utility lines and other infrastructure.
Environmental advantages - Conservation design can have tremendous environmental advantages since it provides the flexibility necessary to preserve ecological assets on a site that might otherwise be destroyed.

Preservation of the rural atmosphere - It is ironic that as more people seek to live in and enjoy a rural atmosphere, that which is cherished and treasured becomes lost to urban development and sprawl. Conservation design is one way that development can occur along with efforts to preserve and protect important elements of the rural environment.

Walkable Communities

A walkable community can be defined as a community where people do not have to use their cars in order to get somewhere—the grocery store, a park, etc. Instead, people of all ages and abilities can get to attractive destinations without using automotive transportation.

Farmland Preservation

The issue of farmland preservation has emerged as a major area of national concern over the last 25 years. During this time, many agriculturally oriented states confronted the issue and developed programs and initiatives to address the diminishing agricultural land resources.

This new focus on farmland preservation in Ohio drew attention to many important statewide land use trends. Some land use trends are as follows:

- Between 2002 and 2007, Ohio ranked 8th in the nation in acres converted from agricultural use to developed ground.
- According to the U.S. Census of Agriculture, Ohio lost almost 115,200 acres of farmland between 2002 and 2007. This is an average 23,000+ acres per year, or approximately 12.6 acres a day. During this same period, Knox County lost 10,823 acres of farmland, an average of over 2,165 acres per year or approximately 5.9 acres per day. Therefore, Knox County accounted for approximately 9.2 percent of the State's farmland loss during this period.
- Knox County's land area is approximately 337,672 acres, of which 198,244 (58.7 percent) was “land in farms” in 2007. At the current rate of loss of land in farms, it would take 13 years for Knox County's total farmland acreage to fall to 169,336 acres or 50 percent of the total county land area.

Local Farmland Protection Efforts

It is important to note that local efforts to preserve farmland have been demonstrated around the state of Ohio for some time. Conservancy organizations have formed with the goal of acquiring development rights and/or conservation easements as a means to preserve agricultural land or environmental assets. These privately funded organizations often work in partnership with government agencies in order to maximize the use of their limited resources. Private conservancy organizations active in Knox County include the following:

- **Owl Creek Conservancy** - The Owl Creek Conservancy is a member of the Land Trust Alliance, the national organization of land trusts. The conservancy concentrates its efforts in two areas: protection and education. Since early 2005, the conservancy has acquired
permanent conservation easements on 801 acres of agricultural land. The conservancy is also collaborating with private land trusts throughout the state to form a coalition of shared talent and pooled resources.

- **The Philander Chase Corporation** - The Philander Chase Corporation (PCC) holds and monitors 1,560 acres of conservation easements in the area of Gambier. PCC, in partnership with the Ohio Department of Agriculture, accounts for an additional 1,510 acres of easements. Currently there are another 698 acres that have been accepted into the agricultural easement program but have not been closed on.

- **North Central Ohio Land Conservancy, Inc.** – In keeping with its mission to preserve the natural heritage, the North Central Ohio Land Conservancy owns approximately 65 acres in Knox County near the Mohican State Forest.

In addition to the efforts of the private conservancy organizations, the Ohio Department of Natural Resources and the Knox County Park District own conservation and agricultural easements throughout the county.

### 4.3 Knox County Cost of Community Services Study

In October 2003, the American Farmland Trust (AFT) published a Cost of Community Services Study (COCS) for Knox County. To understand the financial contributions of various land uses in Knox County, the AFT compared county-level revenues generated from residential, commercial/industrial and farm/open space land uses to the expenditures required to provide county services to those uses. The end product “provide[d] a snapshot in time of net revenues versus costs based on the public service demands of current land uses.”

The results of the study show that more money is spent providing county-level services to residents than is generated by residential land use. Farm/open space and commercial/industrial land uses make up for the shortfall. These two land uses generate more revenue than is spent to provide county-level services to them. The results (summarized as revenue-to-expenditure ratios in the following table) show the expenditures required for county-level service per $1 of revenue generated by each type of land use.

<table>
<thead>
<tr>
<th>Land Use</th>
<th>Residential</th>
<th>Commercial/Industrial</th>
<th>Farm/Open</th>
</tr>
</thead>
<tbody>
<tr>
<td>Revenue / Cost Ratio</td>
<td>$1.00 : $1.05</td>
<td>$1.00 : $0.38</td>
<td>$1.00 : $0.29</td>
</tr>
</tbody>
</table>

These results show that farm/open and commercial/industrial land uses help Knox County maintain fiscal equilibrium by offsetting the revenue-to-expenditure shortfall created by residential land uses. The report suggests that “…decisions that retain and enhance commercial, industrial and agricultural land uses, which make a positive net contribution to county coffers, can help improve the long-term fiscal stability of the county.”
Chapter 5 – Challenges/Issues Facing Knox County

5.1 Core Planning Issues

The core planning issues in the 2006 Plan have been reviewed and revised for inclusion in this update. New demographic trends apparent from the 2010 census and local studies such as the Farmland Preservation Report (2010) figure substantively in this update. Nevertheless, the core planning issues identified in 2006 remain central to shaping and managing growth and development to attain a better future for Knox County. How local leaders deal with these core issues will profoundly affect whether the overall quality of life in Knox County improves or declines over the next 20 years. These core issues are re-identified and explained anew below.

5.2 Organizational Issues

As with the 1998 Plan, completion of this update should not be viewed as the end of the planning process. Rather, this update serves as a series of guideposts on a path toward a broadly shared and inspired vision of Knox County. Attainment of that shared vision of a better future depends on coordinated and sustained planning on a countywide basis. The Knox County Regional Planning Commission (RPC) is the sole public agency with the statutory responsibility to address planning countywide, to maintain and update a comprehensive plan and to coordinate collaborative efforts to guide development for the public good.

The extent to which planning in Knox County is actually an effective ongoing process depends in large part on the organization and functioning of the RPC. Significant positive accomplishments have been made in both organization and function of the RPC since 2006.

Importantly, on January 1, 2003, the RPC became an independent agency supported by members, including most notably, the Board of County Commissioners. The RPC is functioning now as intended by statutory authority, but organizational and programmatic challenges remain. These include the following:

- **Providing Adequate Professional Staff** - At present, a single planner and a part-time administrative secretary support the planning efforts of the RPC. Adequate staff is essential for meeting the demands for making and implementing plans. The combined demands for handling lot splits, maintaining GIS databases, preparing technical reports, handling public and private inquiries and coordinating the membership of the RPC are sufficient to hinder not only meeting basic needs, but also to overwhelm progress on issues critical for coordinating and sustaining long-term planning.

- **Establishing Realistic Service Fees** - Fees for services provided by the RPC should reflect the real cost of delivering these services. For example, administrative fees charged for lot splits need to be brought in line with those charged by comparable planning commissions. Increased fees could generate additional income to help with funding additional staff.

- **Reporting on "Planning in Knox County"** - Presenting an annual report to the community could increase awareness of the need for sustained and coordinated planning and could highlight progress on key issues effectively. Such a report could be prepared and
presented in collaboration with the Area Development Foundation and the Chamber of Commerce.

- **Encouraging Broader Participation** - Presently membership in the RPC is open to all townships and municipalities in Knox County and to the Board of County Commissioners. Additional participants could include, for example, the Chamber of Commerce and the Knox County Health Department, each of which is currently an ex officio member of RPC without vote and paying no dues.

### 5.3 Land Use Issues

Core issues related to the use of land remain unchanged since 2006. Nevertheless, the benefits and rewards of new technology (for example, the Geographic Information System) and broader environmental issues have been incorporated in this update.

#### General Land Use Issues

- **Centralized Land Use Information Depository**. The RPC has a central depository of information on land use. The information is available to residents, local officials and developers. It is anticipated that the RPC will be increasingly the single best source of information on land use for all of Knox County.

- **Geographic Information System (GIS)**. Along with more general information on land use, the RPC has been heavily involved in developing and maintaining a local Geographic Information System (GIS) of computerized maps. The lack of computerized aerial photography and other related data was a significant hindrance to the 1998 Plan. Subsequent efforts have created a good base of computerized data to support local planning. Given this excellent start, the RPC is challenged to maintain and to continue development of the GIS system and to share data with public and private entities.

- **Current and Future Land Use Plans**. The 2006 Plan presented a generalized concept for future land use in the County relative to principles of wise land use and to anticipated growth of the population.

#### Environmental Issues

Environmental issues related to management of growth and development also remain central to countywide planning. Since publication of the 1998 Plan, public awareness about storm water management, erosion control, ground water pollution and management of the Kokosing Watershed has increased. Environmental issues are of interest and concern to citizens and to elected officials at all levels of government.

**River Corridor Preservation and Use.** The Kokosing and Mohican Rivers are important economic, scenic, historic and environmental assets to Knox County. Tributaries of the Licking River are also an important asset. Future planning should emphasize the following:
• Ways to incorporate both the Kokosing and Mohican Rivers in a countywide open space system;

• Sound flood plain management to prevent encroachment of structures in the flood plain and to reduce costs associated with flooding;

• Coordinated local and regional efforts to increase public access to rivers with high-quality water;

• Public review of possible environmental impact from the construction or alteration of dams, bridges, roads or other publicly funded projects.

Watershed Management. Sound watershed management should continue to be implemented, as it is vital in preventing the decline of water supplies, river sheds, streams and creeks and controlling soil erosion.

• Where Watershed Management Plans (WMPs) do not exist, they should be developed in compliance with guidelines from the Ohio Department of Natural Resources; the Mohican River is an example. The WMP for the Kokosing River should be implemented.

• Well fields and aquifer recharge areas need continued protection from inappropriate surface land uses.

• Site Plan and Subdivision Regulations need continued incorporated design measures to meet standards for avoiding pollution of storm water and ground water.

• The natural functions of flood plains need to continue to be recognized and conserved and included as part of Knox County’s “green infrastructure.”

Air Quality Management. Based upon readings from an air quality monitoring station near Centerburg, Knox County has been included along with metropolitan Columbus in a “nonattainment area.” This designation means that air in the county failed to meet standards set by the federal EPA for quality. More observing stations should be added throughout the county with the results averaged to obtain a more realistic evaluation of air quality in Knox County, since this classification denotes a threat to the public health and potentially could limit future industrial development. Plans to improve local air quality and to collaborate in regional efforts to improve air quality should be developed and implemented.

5.4 Rural Development Issues

• Lot Split Standards. Splits of productive or fallow farmland are the most common way new rural lots are created in the county. Improved subdivision standards and/or zoning requirements are needed to help assure that choices between possible uses of land are made wisely. Specifically,

  o Knox County Townships should be encouraged to adopt the County Wide Access Plan.
o The Land Use Committee of the Regional Planning Commission should amend subdivision regulations to encourage “conservation subdivisions” which could protect significant natural features and/or elements of rural character. Conservation subdivisions often include 50 percent open space and can work with on-site septic and water systems. Regulations governing these subdivisions should be created in a simplified manner to promote their usage. These subdivisions might use a “neutral density” concept whereby “development rights” could be purchased from adjacent property owners and therefore limit further development in the same area. Since the last update, Regional Planning has established an “Original Tract” policy which limits the number of lot splits possible from a single parcel.

- Preventing Sprawl and Protecting Farmland. Agricultural land use is very important in Knox County and protecting farmland from inappropriate uses is a critical challenge for planning and zoning. This Update emphasizes farmland preservation so that inappropriate development does not occur in locations where the land is better suited to agricultural uses.

  o Some, if not most, new residential development should occur in or adjacent to municipalities where adequate infrastructure is available or can be extended to, allowing public services to be provided most economically without the loss of additional agriculturally productive land.

  o Local and statewide efforts to purchase the development rights of prime farmland or to otherwise conserve the land base of the agricultural industry should continue.

Land Use Regulations

The use of land has been more and more regulated in Ohio and Knox County as the density of the human population has increased. Such regulations are multilayered and serve the public good most effectively and efficiently when coordinated between and across collaborating local political entities.

- RPC Zoning Assistance. Demand for development coupled with a range of out dated zoning codes and lack of organizational structure have increased awareness of the need for a higher level of assistance for Townships and Villages relative to zoning ordinances and to their enforcement. With RPC staff, Townships and Villages could rely more on RPC for assistance with all aspects of zoning. The RPC could provide carefully crafted model zoning regulations, incorporating standards to prevent urban and rural sprawl, poor access management or insufficient provision for open space in plans for developments.

- Collaborative Zoning. Conflicting patterns of development across jurisdictional boundaries can be avoided through collaborative and coordinated zoning ordinances. Collaboration and coordination of the ordinances and the administration of those ordinances can be facilitated through the RPC for public benefit.

- Coordination of Development. Incompatible patterns of development in neighboring political entities can be avoided, or moderated, through the collaborative and coordinated consideration by Townships and Municipalities of plans for development and of related regulatory measures. Installation of public infrastructure, such as water and sewer systems, could be planned and coordinated to focus and to foster developer-funded infrastructure compatible with the physical and man-made environment in the County. Collaboration and coordination can be facilitated through the RPC for public benefit.
• **Coordination of Countywide Regulations.** Just as watersheds, storm water, flood water, erosion and sediment transcend local political jurisdictions, so too the regulatory controls or management systems for such matters should transcend those jurisdictions. Adoption of the same, or appropriately modified, regulations by different jurisdictions (Townships and Municipalities) could allow countywide administration of flood plain and other similar regulations through the RPC for public benefit.

**Commercial Development**

Where possible, redevelopment of existing sites is preferred to creating or expanding “strip” commercial developments. Newer commercial development, whether centralized or decentralized, competes with existing development and this can produce vacant commercial spaces in older parts of a community even as new spaces are built elsewhere.

**Industrial Development**

Successful expansion of local options for employment depends on identifying and protecting key areas of Knox County with the potential for industrial development. Significant growth in new employment requires physical spaces for industry and it is important that such spaces be clearly identified and protected from inappropriate development.

- Population gains in the county confirm the attraction for living and playing in less densely populated areas. Nevertheless, local opportunities for jobs must be provided to avoid the fiscal problems commonly associated with bedroom communities.
- Many residents in the county commute long distances to work, but often express preference for local employment to avoid commuting.
- A broad industrial base provides local jobs and attracts persons with managerial and technical skills. When residents, such persons may contribute to public life.
- Knox County's increasingly diverse and skilled labor pool makes the county competitive for attracting new opportunities for employment.
- Many in the labor force seek nontraditional, seasonal, flexible-schedule and part-time employment attractive to firms with "job-sharing" strategies to reduce costs.
- Classification of Mount Vernon by the U.S. Census Bureau as a "Micropolitan Area" confirms the increasing economic and educational diversity of residents in the county.

**5.5 Transportation Issues**

Fundamental transportation problems identified in the 1998 Plan still require deliberate action to develop short- and long-term solutions. This update provides a renewed vision of desired improvements, broken into short- and long-term projects. Solutions for specific problems (for example, a roadway misalignment or a need for improving an intersection) and the need for construction of new roads are placed in a countywide context to offer alternative and more efficient routes for the flow of traffic.
• Options for public transportation are now limited. A more fully developed system is desired to help reduce congestion. Education about the present public transportation system and the public significance of expanding it is important to maintaining the quality of life in the county.

• Public policy should include measures to correct existing and evolving deficiencies in the capacity or safety of roadways and to prevent additional congestion or safety problems from poorly planned and poorly coordinated developments.

• Policies and regulations to manage access are critical tools to help prevent unsafe placement of driveways and to aid the planning and development of safe, efficient access roads.

5.6 Quality of Life Issues

Quality of life is sometimes thought of as social, cultural and economic factors resulting apart from any planning process. In fact, planning impacts the quality of life every day. We live, work, play, study and undertake daily living in an environment. This environment has physical, man-made, cultural, social and economic components tied directly to good planning. Places characterized as having a high "quality of life" result when all of the physical, social, cultural and economic components of the environment have been coordinated harmoniously.

• Careful planning and regulation achieve protection of physical and man-made environments.

• Healthy riversheds affect the quality of life. The Kokosing, Mohican and Licking Rivers are vital parts of the physical, cultural and historic features of Knox County.

• Historic places, features and buildings need to be identified, preserved and protected for the sense of place they provide. This requires not only substantial information for documentation, but also clear public policies to support preservation and protection.

• Cultural amenities such as libraries, colleges, historic neighborhoods and township and village centers need similar preservation and protection to maintain quality of life for residents, businesses and visitors.

• Locations for present and future social services such as senior centers, healthcare facilities, schools and government offices must be planned and coordinated with existing and future development to assure efficient, effective delivery of those services.

• Measures that create communities with opportunities for walking and other lifelong active recreational activities would help emphasize wellness and the prevention of disease.
Chapter 6 – Goals and Objectives

6.1 Vision

As in 2006, a fundamentally important result of this update is a renewed vision for long-term growth and change throughout Knox County. The 1998 Plan has been regarded as an excellent “first step” on a long path of sustained efforts to shape the direction of community change. Notably, this update placed an even greater emphasis on community participation with a range of efforts that reached many residents and various local leaders. As a result, the reshaped vision and community goals are even more reflective of local attitudes than ever before.

The vision for Knox County is again expressed from both technical and nontechnical perspectives. The technical perspective includes updated community goals and the nontechnical perspective is presented as though a resident in the year 2030 could somehow write a letter to a present-day resident. This imaginary retrospective letter is presented below from a person living in Knox County in 2030 to a current resident.

Dear 2012 resident of Knox County:

I am happy to report to you that the Knox County of 2030 is an excellent place to live and work. Looking back over the years it is clear that in 1997, local leaders began a commitment to community planning that endured. The 1998 Plan served the community well and a few years later, people could see meaningful progress toward accepted goals. This countywide Plan was updated with even greater community participation in both 2005/2006 and 2011/2012. This work was also aided greatly with better data from a computerized geographic information system (GIS) that substantially sharpened the understanding of land resources, land use, land ownership and physical constraints for development. Further, supportive studies such as the report from the Farmland Preservation Task Force (2000), the Cost of Community Services Study (2003) and the Kokosing Scenic River 2004 Watershed Plan dramatically added to the level of understanding of many complex issues.

Knox County maintained efforts to avoid being another unfortunate example of urban sprawl in Central Ohio. Between the completion of the 1998 Plan and the 2005 and 2012 Updates, the Columbus urban area continued along a path of growth and greater influence on Knox County. Fortunately, local leaders continued work on many initiatives and stuck to key polices that helped maintain farmland and rural character. Farming has remained an important part of local culture and the economy. Locally produced agricultural products are used and revered as the products of choice by residents and institutions not only locally, but also in the greater Columbus area.

The overall environmental quality of Knox County is better than ever. The Kokosing and Mohican River corridors are centerpieces of an impressive countywide open space system that connects to urban areas in functional and aesthetic ways. The term “green infrastructure” has meaning to Knox County residents who are connected to the land. Apart from helping to define rural character, the green infrastructure and open

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space system provide for an expanded system of trails, linear parks and outdoor recreational opportunities that is ample for every resident. Residents of Knox County are much healthier since walking and other types of nonmotorized travel are truly options for local transportation and for recreation.

Jobs are available in Knox County. Early on, local leaders recognized that balanced growth meant having places to live and work. Commuting long distances to work is uncommon, rather than the rule, and employment opportunities have grown with local tourism and high-tech business activity. Well-planned accessible industrial and other employment centers in Knox County provide places for the growth of additional opportunities for employment.

Recent commercial growth has been measured and a positive addition to the community. Empty commercial buildings are rare and local attitudes favor reuse and redevelopment of commercial spaces, rather than converting green fields to commercial uses. Downtown Mount Vernon is clearly a viable center of specialty commercial uses, services, educational opportunities, cultural activities, government and entertainment.

You can look forward to the future in Knox County; it is a wonderful place to live.

Sincerely,
The Next Generation

Besides the vision of where Knox County can go long-term, specific goals and specific polices and initiatives to achieve them were also developed. The goals are similar to the goals in the 1998 Plan, but vary somewhat based on attainment of the original goals, new public input and local attitudes. Most of the change relative to the goals is in the policies and initiatives proposed to achieve them.

6.2 General Goals

- Maintain and continue development of an effective, adequately staffed and funded planning organization in Knox County.
- Have organized, relevant and up-to-date information on the land resources of Knox County readily available to local officials and the public.

6.3 Land Use Goals

- Guide overall development effectively in accord with a plan for future land use and basic principles of wise land use.
- Protect the natural resources and environmental assets of Knox County.
- Protect Knox County’s farmland and rural character.
• Establish areas for residential growth consistent with desires to preserve farmland and rural character.

• Develop and redevelop attractive, accessible and viable commercial areas to serve the needs of Knox County residents.

• Identify (and reserve) areas especially suitable for industrial development and provide adequate industrial sites for future employment needs.

6.4 Transportation Goals

The transportation goals in the 2006 Plan were reviewed and updated in the context of the planning process by the Transportation Committee of RPC. The committee, in agreement with public input, concluded that the 2006 transportation goals remained relevant. The formal goals shown below summarize how the County should approach transportation matters:

• Protect roadway capacity with good planning. The ability of a roadway to carry traffic is greatly influenced by how well or how poorly adjacent land uses and curb cuts are developed. Since new road construction and/or significant upgrades are often costly and since congested corridors are often sites of vehicular accidents, it is incumbent on local leaders to make sure that roadway capacity is not diminished by poorly planned development.

• Plan new roads to address future problems. The existing roadway network presents significant problems, especially in Mount Vernon. A radial pattern of major routes forces car and truck traffic to converge in the heart of the city, creating traffic congestion and delay. The concept of a major bypass route was summarily rejected by the community in the late 1990s. This focused attention on developing a series of modest roadway connections to address current and burgeoning problems.

• Encourage other forms of transportation besides motorized vehicles. Options allowing individuals to use other forms of transportation, such as walking or riding a bike, are influenced largely by how their surroundings are planned and built. Knox County can work to make physical environments more pedestrian- and bike-friendly. Having such an environment would allow and encourage more physical activity as a normal part of living in Knox County and thus would benefit the well-being and health of residents.

• Maintain a good experience of traveling through Knox County. Transportation is more than getting from point "a" to point "b." Knox County is among Ohio's most attractive areas with scenic corridors and byways. Formal recognition of this is needed in planning for land use and transportation to help maintain the attractive views and vistas that contribute to the quality of life and attract tourists.
6.5 Quality of Life Goals

- Assure continuing delivery of fire and emergency medical services.
- Continue to increase outdoor recreation space.
- Reduce the incidence of preventable disease and injuries.
- Identify, recognize and protect historic resources.
Chapter 7 – Recommended Policies and Initiatives

Policies and Initiatives

The preceding chapters of this update describe Knox County as a whole in 2012, public opinions on planning, an updated long-term vision for the community and goals to attain that vision. Guides for actions directed toward ultimate attainment of the goals and, thus, the long-term vision are needed. Specific guides for actions are listed below as policies and initiatives for each goal.

7.1 General Goals

7.1.1 To maintain and to continue developing an effective, adequately staffed and funded planning organization in Knox County.

7.1.1.1 Continue to define organizational roles. (Policy)

The role of the Knox County RPC has expanded in recent years due to staffing and leadership provided by representatives to the RPC. Since completion of the 1998 Plan, the RPC has evolved from an unstaffed organization, largely focused on reviewing minor subdivisions and changes in zoning, to a professionally staffed organization engaged in both current and long-range planning. Great strides have been made in terms of the acceptance and relevance of the RPC.

• The RPC should serve in the capacity of mediator, coordinator and consensus-builder among and between the City, the Villages, the Townships and the county as a whole. The RPC should be viewed as an impartial advocate for good planning and wise land use. Specific activities where this role is particularly useful include annexations and economic development.

• When the RPC addresses planning and development issues directly, it should be in the context of matters of countywide significance or in terms of interjurisdictional issues (joint economic development districts. special service districts, projects that involve more than one jurisdiction, etc.). Although planning issues having impact on only one jurisdiction are local responsibilities, the RPC should provide assistance when requested.

• The RPC can provide services and staff to local governments. Two examples are assistance with keeping zoning ordinances current, and providing personnel to administer local zoning.

7.1.1.2 Model codes and regulations (Initiative)

As in the 2006 Plan update, the need for model codes and regulations continues. While each jurisdiction is unique and each set of land use controls should reflect local planning policies, there are enough common elements to warrant development of model zoning language that could be used by many local jurisdictions. Examples of important common problems that model regulations could address, include
telecommunication facilities, adult entertainment establishments and group homes. In addition, there is a need for model subdivision regulations that can be adopted by local Villages. In some cases, local Villages have not yet confronted the need for subdivision regulations that would define minimum standards for new road construction, procedures for subdivision plats or minor lot-split approval. With the demand for development expected to increase, it would be highly desirable to develop such standards before an immediate need to respond to a proposal to change the use of land. The Knox County Subdivision Regulations are a starting point for a local model, but municipal subdivisions must reflect the different legal structure and the differences in municipal infrastructure.

7.1.1.3 Updating the Comprehensive Plan (Policy)
Implementation is the key aspect of any plan. Implementation of this update should be continually coordinated and assessed for effectiveness and relevance. Revision of this Update will be appropriate as its policies and initiatives are implemented.

- Attainment of the goals in this Update will occur through implementation of its policies and initiatives. Standing and special committees of the RPC should report at least annually on how their activities reflect the policies and initiatives in this update. So that progress can be assessed, regular meetings should be held with organizations and agencies not involved directly with the RPC, but which are involved in implementation of one or more of the policies or initiatives.
- As planning is an ongoing, community-wide process, the Knox County Comprehensive Plan should be fully reviewed in a public process conducted by the RPC no less than every five years.

7.1.2 To have organized, relevant and up-to-date information on Knox County land resources readily available to local officials and the public.

7.1.2.1 Continue to develop Geographic Information System (GIS) data base. (Policy)
Knox County has made a considerable investment in developing a strong GIS system. The County Auditor, Engineer and RPC have all moved forward with new aerial photographs, parcel-specific property information and a wide range of new data that is geographically referenced in local GIS files. All maps produced for this update are similarly consistent with local GIS conventions and formats. Future challenges include sustained efforts to assemble and organize all GIS data so that the RPC serves as a central depository for land-use information and data. Key elements include the following:

- Computerized zoning maps and codes from all Municipalities and Townships;
- Water and wastewater treatment facilities and planned expansions;
- Locations of conservation easements;
- National Register nomination listings;
- Local land-use plans and updates;
- Mining activities, planned operation duration and reclamation plans;
• Proposed municipal and township roads;
• Current land use information;
• Flood plains;
• Wellhead protection and aquifer recharge areas;
• Park plans and expansion plans;
• Farming information, such as locations of containment farms, regional changes in production or regional failures to produce because of outside influences.

7.1.2.2 Improve data accessibility with web posting. (Initiative)
Much has been done to assemble information on land resources in a central repository. Now, public access to that information is even more important. To move forward and put assembled information to maximum use, the development of an RPC web site should be an initiative. Ultimately, a considerable amount of information about Knox County, land development activity, local planning and zoning policies and related information could be put on an RPC web site for easy and convenient public access.

7.1.2.3 Improve local zoning maps. (Initiative)
Existing local zoning maps at both the Township and Municipal levels could be improved given the availability of parcel-specific data from the County Auditor. Some of this work has been completed as part of this update, but more needs to be done to reach maximum usefulness for zoning enforcement.

7.2 Land Use Goals

7.2.1 To guide overall development effectively in accord with a plan for future land use and basic principles of wise land use

Potential initiatives
• Encourage unzoned townships to consider the adoption of local zoning ordinances.
• Work with the Knox County Commissioners to devise ways to “incentivize” development measures/options that support the goals of the Comprehensive Plan.
• Regularly review initiatives in the Comprehensive Plan with Township Trustee and Zoning Boards.
• Develop an “expedited major subdivision” process for parcels where unique situations exist and the normal major subdivision platting process may be excessively punitive.
• Coordinate the development of a Knox County “transfer of development rights” program between legally eligible units of government.

7.2.2 To protect the natural resources and environmental assets of Knox County

Potential initiatives
• Begin discussions with the Knox County Commissioners on the potential development of “storm water management districts” in certain high-development areas where the initial platting of subdivisions/development predates the county’s current Storm Water Management & Sediment and Erosion Control Regulations.

•
• Develop and incorporate “mitigation strategies” for important local resources and environmental assets (i.e. wetlands, prime farmland) into the Knox County Subdivision Regulations.

7.2.3 To protect Knox County’s farmland and rural character.

Potential initiatives
• Work with local Land Trusts and the Ohio Department of Agriculture to develop a local “farmland preservation” program for Knox County.
• Provide Knox County Townships with educational materials on “Agricultural Protection Zoning.”
• Develop an incentive component for the Knox County Subdivision Regulations that gives preference to the approval of rural subdivisions that are shielded from view from main thoroughfares.
• Encourage public enrollment in the “Agricultural Security Area” program.
• Study the development of a farmland/open space conversion “impact fee.”

7.2.4 To establish areas for residential growth consistent with desires to preserve farmland and rural character.

Potential initiatives
• Encourage local cities and villages to develop 20-year projected “Urban Growth Boundaries” (UGB) and coordinate/prioritize updated zoning, land-use guidelines and infrastructure development within the UGB.
• Initiate discussions between local units of government to propose development incentives for commercial and residential development within UGB areas.
• Coordinate the development of “community-building” planning initiatives for the various hamlets and small villages in Knox County to enhance the attractiveness of these areas for residential redevelopment and neighborhood-scale commercial, retail and recreational development.

7.3 Transportation Goals

7.3.1 Maximize the capacity and function of existing roadways and provide for the safe and efficient movement of traffic between local and regional destinations.

7.3.1.1 Regulate land development to accommodate roadway function. (Policy)
Township zoning should require setbacks for new construction and the Knox County Subdivision Regulations should be amended similarly to require setbacks for new platted subdivisions.

• Building Setback Requirements for Major Roads: A minimum front building setback line of 150 feet from the centerline of the right-of-way should be established in Township zoning ordinances. This would allow for widening and could allow front access roads when needed. This would also allow for adequate separation between traffic flow on major roads and adjacent development.
• **Building Setback Requirements for Minor Roads**: A minimum front building setback line of 100 feet from the centerline of the right-of-way should be established in Township zoning ordinances. This would allow for widening and for turn lanes next to intersections or sources of high traffic volumes. This also would allow for adequate separation between traffic flow on minor roads and adjacent development.

7.3.1.2 **Designate truck routes in and near the Mount Vernon area using existing key roadways. (Short-term Initiative)**

The existing patterns of roadways in and near Mount Vernon, which were originally designed as a system of radial roadways, do not provide for efficient movement of high volumes of truck or other traffic. All major traffic flow is directed toward the town square, which has limited capacity for traffic. Also, it is undesirable for large volumes of through passenger and truck traffic to be forced into the pedestrian environment of downtown Mount Vernon. While long-term solutions to congestion may involve construction of new roadways, the primary near-term concern is development of routes to direct the flow of truck traffic in the most acceptable manner. The following truck routes are proposed as a short-term solution:

- **Granville Road - Parrott Street - Columbus Road Truck Route**: The Granville Road-Parrott Street-Columbus Road Truck Route would connect the industrial area south of Mount Vernon with S.R. 229 and U.S. 36/S.R. 3 that link Knox County with I-71 and the Columbus area.

- **Downtown Truck Route**: The movement of trucks through downtown Mount Vernon is an undesirable, but necessary, consequence of the current roadway network. For the short term, the truck route shown in **Figure 10** is one feasible solution.

![Figure 10 Downtown Truck Route](image-url)
7.3.2 Construct new roadways and upgrade existing roadways to address current and projected traffic flow.

Potential corridors for new roadways should be defined so that the opportunities to extend roadways are preserved for the future. Whether actual road construction occurs with private land development, or as a future public improvement project, it is important for the community to identify key areas where new roadways are needed to address existing and reasonably foreseeable future traffic demands.

There are many public purposes that warrant local attention to the need for a well-connected system of roadways. When the local roadway system provides for quick and direct access to destinations, vehicular trips are shorter on average. This saves time as individuals travel a more direct route to destinations. Further, more direct routes and fewer miles driven result in reduced gas consumption and air pollution. Perhaps most important, a well-connected system of roadways allows for better response times by emergency vehicles, thus enhancing protection of life and property.

When local governments have an adopted plan for new streets and highways, then new subdivisions should be designed within that planning context. Usually, new subdivisions involve local streets that function primarily to provide access and have little impact on area-wide traffic circulation. However, without proper planning, a subdivision could be designed and built in a manner blocking the best alignment for extending a major road. Similarly, a poorly designed subdivision on one side of a street could restrict needed road widening. Once restricted extra public costs and project delays are likely as less desirable improvement options are defined and explored.

Section 711.10 of the Ohio Revised Code addresses the need for a local plan for major streets and highways in the context of a County or regional planning commission's ability to adopt subdivision regulations. Section 711.09 similarly addresses municipal subdivision regulations. Providing for review of proposed subdivisions in the context of regional needs for the circulation of traffic is a primary justification for subdivision review by any local government.

Individual projects described below indicate a general sense of intent. It is difficult to identify a sequential list of projects, because many of the projects identified herein are expected to take place in conjunction with private development. Thus, decisions a current or subsequent property owner makes about development will be a key element in timing projects. The challenge for local officials includes the critical need to review all subdivisions in the context of larger circulation needs. In considering the following list of projects, it should be noted that the proposed alignments are suitable for general planning purposes only. It is also likely that additional studies and site-specific investigations may provide other viable alignments.

The identification of future roadway segments is not an effort to establish a "beltway" or "bypass" around Mount Vernon. Individual segments have value independent of other segments and represent steps for improving the flow of existing and future volumes of traffic. It should also be clear that in some cases, the intersection between the existing road system and new proposed roads would create the need for varying degrees of improvement of those intersections. In some cases, the intersections might involve work to improve sight distances, installation of traffic control measures or the addition of turn lanes to accommodate a larger number of turns. However, effort
7.3.2.1 Short-term transportation initiatives

- **Continue Blackjack Road extension to U.S. 36/S.R. 3.**
  Among the most needed roadway extensions is a connection between Blackjack Road and U.S. 36/S.R.3. As noted in the 1998 Plan, this extension would allow industrial traffic south of the City of Mount Vernon to gain access to I-71 and the Columbus area without going through downtown Mount Vernon.

  There are several options for alignments that warrant focused study. Between the existing intersection of Granville Road with Blackjack Road and U.S. 36/S.R. 3, there are roads (Kinney Road and Henry Road), a developing rails-to-trails bikeway, a waterway (Ory Creek) and many private property interests. Addressing all these considerations adequately will require substantial effort, but this issue should be considered in depth in the near term before options are precluded by private development.

  Additional study was completed in early 2006 to consider alternative routes and a specific roadway design. The new roadway could be similar to S.R. 661 (in number of lanes, design speed and right-of-way width). However, the character of this future roadway could also include considerations such as a boulevard, special lighting, landscaping or other distinctive elements. Future land use in this area is expected to include light industrial development which could benefit from additional design elements to create a more distinctive place.

  Funding options might include use of Tax Increment Financing (TIF) to leverage the positive tax flow from associated development. Further, as this area is likely to attract development that produces jobs, state and federal resources may be available to help fund construction costs.

  Regardless of how soon related transportation improvements are built to provide better access to S.R. 13 north of the city, the Blackjack Road Extension to U.S. 36/S.R. 3 has benefit and merit as a stand-alone project.

7.3.2.2 Longer-term transportation initiatives

The longer-term policies defined below summarize a community view of needed transportation projects. These polices should guide decision-making on proposals for private development and on which options to pursue for funding.

- **Improvement of S.R. 95 between I-71 and Fredericktown**
  The issue of improving S.R. 95 between Fredericktown and I-71 has been discussed locally for some time and relates economic development to a more effective connection between the northwestern portion of Knox County and the interstate system. Although no effort for design improvements is underway, as currently discussed, improvement of S.R. 95 could take the form of a "super 2" (essentially a higher capacity two-lane road with engineering upgrades to further enhance capacity and safety, particularly at intersections).
• **Class X (nonmaintained) roads**
  Certain township roads in some Knox County townships are Class X and action is needed by Township trustees to reduce the potential liability associated with them. The Knox County Engineer has appropriate legal documents that Township trustees can adopt to address this situation in a manner consistent with the Ohio Revised Code.

• **Gann area transportation enhancement project**
  Unique transportation elements converge in the Gann/Danville area. The Mohican Valley Trail is a 4.8-mile trail built on abandoned railroad right-of-way connecting the villages of Gann and Danville. At Gann, the trail crosses the Mohican River through a 370-foot covered bridge, called the Bridge of Dreams. East of this bridge the trail connects with the Holmes Country Trail. This part of the trail needs to be paved.

• **Centerburg transportation issues**
  In Knox County, many county and township roads intersect state routes at angles that create poor sight distances. Ideally, roadway intersections (especially those involving higher traffic volumes and vehicular speeds) should intersect at right angles. In the Centerburg area particularly, some roadways intersect U.S. 36/S.R. 3 at angles that create sight distance and safety issues. These roadways include Oliver and Updike Roads. Since U.S. 36/S.R. 3 traffic is expected to increase, it is critical that intersection improvements be made to maximize capacity and safety of this important corridor to the Columbus area.

• **Mount Vernon area transportation issues**
  Traffic flow in and around Mount Vernon is frequently discussed. After an extensive bypass was proposed and rejected by the community, the 1998 Plan offered a more modest, but effective, system of connections between existing roads. The following policies/projects are generally consistent with the 1998 Plan and earlier visions of a more fully connected roadway system that does not force vehicles into downtown Mount Vernon:

  **Short-range projects**
  - Improvement of bicycle or pedestrian traffic across the Kokosing River, for student pedestrian safety. The walkways on the viaduct are inadequate and need to be widened or an alternative provided.
  - Pedestrian traffic should be accommodated for crossings of South Main Street and the north-south and active rail line connecting the Kokosing Gap Trail and Heart of Ohio Trail.
  - Safe Routes to School Program, grants for sidewalks, etc., should be pursued and implemented.
  - Dan Emmett Elementary, East Elementary, the Middle School and Pleasant Street Elementary need to be considered for any pedestrian traffic improvements.
• Upper Gilchrist Road, New Gambier Road and Eastern Star Road – at a minimum upgrade existing legs for transportation improvements to this area.

• Move traffic more efficiently from Coshocton Avenue to High Street.

• Make needed improvements to Chestnut Street between North Gay Street and Sandusky Street.

• Review and install/replace, where warranted, all signage on routes leading to S.R. 661.

**Long range goals**

• Consider improvements to Murray Road and Sycamore Road for a truck route to get traffic off of S.R. 586 prior to entering Mount Vernon.

• Promote pedestrian walkways in rural subdivisions.

• Continue to encourage all the Townships to adopt the county wide Access Management Program.

• Encourage the City of Mount Vernon to continue to purchase properties and rights-of-way for projects when the opportunity presents itself.

• Make improvements to align Fairgrounds Road and Clinton Road at their intersection with Old Mansfield Road.

• Improve the intersection of Coshocton Avenue, Vernonview Drive and Yauger Road.

• Connect Edgewood Road to Coshocton Avenue.

• Consider the extension of Beech Street from Sychar Road to S.R. 13.

• Construct a new bridge at Sandusky Street and connect to S.R. 13 south of the river.

• Extend McKenzie Road westward to S.R. 13 north.

• Improve McKenzie Road to become a primary connector road.

• Identify a major project to Mid-Ohio Regional Planning Commission (MORPC) once the Comprehensive Plan is updated.

• Harcourt Road is becoming a development corridor, which creates concerns long-term for business/commercial traffic. Consider building a service road or
build a new road to handle the increased traffic and leave Harcourt to act as a service/access road.

7.3.3 Encourage alternate forms of transportation.

7.3.3.1 Strengthen County and Municipal subdivision regulations (and local zoning where appropriate) to require pedestrian linkages when new residential development is near existing or proposed trails, schools, parks, playgrounds, commercial areas or community facilities.

Local subdivision regulations (and in some cases, local zoning) are tools that can help assure the construction of pedestrian linkages. The following material was obtained from the Federal Highway Administration and shows how local zoning and subdivision ordinances can be amended to require more attention to the needs of pedestrians and bicyclists:

- **Subdivision layout**: Residential subdivision layouts (including Planned Unit Developments) should provide safe, convenient and direct bicycle and pedestrian access to nearby residential areas, bus stops and centers of neighborhood activity, such as schools, parks, commercial areas or office parks.

- **Cul-de-sacs**: Cul-de-sacs have proven to be effective in restricting automobile through traffic. However, they also have the effect of restricting bicycle and pedestrian mobility unless public accessways are provided to connect them with nearby streets. Trail connections between cul-de-sacs and nearby streets should be provided wherever possible to improve access for bicycles and pedestrians.

- **Future extension of streets**: During development, streets, bicycle paths and sidewalks should be designed to connect to adjacent properties that are also likely to be subdivided. Thereby, a system of connecting roads and sidewalks could be developed over time.

- **Inclusion of bicycle and pedestrian facilities in phased development**: Areas proposed for pedestrian and bicycle use should be defined in projects that occur in a phased or otherwise piecemeal fashion. For projects in which only part of the land owned by an applicant is proposed for development, a sketch plan showing the tentative and alternative locations of streets, bicycle facilities and public access ways should be developed for all of the land owned. This will help ensure that subsequent construction phases can be designed to produce a network of compatible connections.

- **Drainage areas and pedestrian/bicycle facilities**: Most new residential subdivisions built in Knox County are likely to be designed without curbs and gutters and are likely to rely on natural swales and green spaces to accommodate storm water in the right-of-way and/or along parallel landscape strips. Such areas should be considered for the design of pedestrian and bicycle facilities.

- **Internal bicycle/pedestrian circulation for commercial and business developments**: Adequate provisions should be made for bicycle and pedestrian circulation between buildings and other points on development.

- **Landscaping**: Landscaping should be arranged to permit sufficiently wide,
clear and safe pedestrian walkways. Combinations of turf, shrubs and trees are desirable in border areas along a roadway. Low shrubs in commercial areas and near schools are often desirable to channel pedestrians to crosswalks or crossing areas.

- **Rural sidewalks**: Sidewalks along rural roadways should be provided as near the right-of-way line as is practicable. If a swale is used, the sidewalk should be placed at the back of the swale. If a guardrail is used, the sidewalk must be behind the guardrail.
- **Bridge sidewalks**: Sidewalks on bridges should be placed on both sides.
- **Street lighting**: For both safety and security, most sidewalks require street lighting. Lighting is needed both for movement of pedestrians and for their detection by motorists when they cross a roadway. Normal placement of street luminaires provide sufficient lighting for safe pedestrian movement.
- **Minimum width of sidewalks**: The minimum width of sidewalks in nonresidential areas should be five feet to provide an adequate pedestrian space. Even greater widths are justified in areas with high pedestrian traffic.
- **Border areas and buffers**: Wherever practical, a buffer width of 12 feet or more should be provided between the curb and the sidewalk for safety.
7.3.3.2 Continue to build a database of information on all existing bike trails and planned extensions in Knox County and in municipalities. 
This general initiative should be carried out by the Knox County Park District, in cooperation with the Knox County Regional Planning Commission and Kokosing Gap Trail Board.

7.3.3.3 Continue to work toward the establishment of a network of bike routes and lanes throughout Mount Vernon. 
This should be facilitated by the Knox County Park District, the Kokosing Gap Trail Board and the City of Mount Vernon. Attention should be paid to provisions for parking areas for bikes as well as for making roadways more accommodating for cyclists.

7.3.3.4 Continue to educate children about bike safety. Including the use of helmets, through the development of special programs. 
The Knox County Park District, Kokosing Gap Trail Board and the school systems in Knox County should coordinate these programs.

7.3.3.5 Encourage ride sharing with appropriate facilities (such as free parking lots) and programs, especially for commuters to major metropolitan areas.

7.3.3.6 Establish connections by bus or other forms of public transit between Mount Vernon and Apple Valley.

7.3.3.7 Build on the designation of the Kokosing and Mohican River Water Trails.

7.3.3.8 Continue to develop and implement plans to construct and pave the Heart of Ohio Trail and Mohican Valley Trail, owing to their multimodal importance to the community, the region and their position on the statewide Ohio-to-Erie Trail. (Policy)

7.3.4 Enhance and protect the positive experience of traveling within Knox County.

7.3.4.1 Establish additional development standards along key corridors and entranceways into Mount Vernon. (General Initiative) 
Harcourt Road and Coshocton Avenue, along with U.S. 36/S.R. 3, are key corridors and entranceways for Mount Vernon. Clinton Township adopted an Overlay Zone along Harcourt Road that requires additional landscaping and signage along U.S. 36/S.R. 3. Further development of appropriate requirements should be encouraged along this corridor and similar efforts are desirable elsewhere. The development of the model zoning requirements (with specific standards to further this objective) is a logical approach.

7.3.4.2 Establish special requirements for outdoor advertisement along Scenic Routes. (General Initiative)
Since certain roadways in Knox County are designated as Scenic Routes, there should be a concerted effort to include additional development standards along these routes to protect the views in Knox County.
7.3.4.3 Further develop the formally designated Scenic Byway system in Knox County. (General Initiative)

7.4 Quality of Life Goals

7.4.1 Assure continuing delivery of fire and emergency medical services.

Like most inhabitants of rural counties in Ohio, many Knox County residents receive fire and emergency services from special districts covering specific areas and each District/Department has adapted to their own individual area needs or requirements for protecting life and property. Public perspectives on this indicate that more coordination and cooperation between organizations is desirable for both effectiveness and cost efficiency. There is also a need for greater education of the public to develop an understanding of the costs and funding options for both service providers (including their mandatory continuing educations) and equipment. There is continuing dialog about these issues among the involved organizations, and this trend is the positive outgrowth of a long history of mutual aid and good working relationships between existing districts. Continuing efforts between Districts/Departments to build on this history of collaboration should be supported and the RPC may be able to provide the neutral forum for such efforts.

7.4.2 Continue to increase outdoor recreation space.

7.4.2.1 Amend the Knox County and Mount Vernon subdivision regulations to include a mandatory dedication of parkland with subdivision activity. (Initiative)

Many local governments in Ohio have adopted a standard under which the dedication of parkland is required when land is developed for residential purposes under local subdivision regulations. Typically, this standard relates the size of the dedication to the size of the new subdivision. Where the development is small or where a park is not feasible/desirable, providing a fee in lieu of actual dedicated land is generally an option. According to 2008 data from ODNR, Knox County ranks 72nd among Ohio’s 88 Counties with 52 acres of outdoor recreation space per 1,000 people.

7.4.2.2 Continue the dedicated source of local tax revenue for the Knox County Park District. (Policy)

The Knox County Park District has accomplished major initiatives using minimal funding from Knox County. Millions of dollars in the form of state grants have been obtained by KCPD to pave the Heart of Ohio Trail and to open parks, such as Honey Run Waterfall. The required local match to attract these grant dollars, that would otherwise go to another county or region of Ohio, is provided by the smallest mill levy in the county, dedicated to park acquisition and trail construction and maintenance.

7.4.2.3 Continue with planning and implementation of a major recreational focal point neardowntown Mount Vernon, on the southern side of the Kokosing River. (Initiative)

The City of Mount Vernon is completing a master plan for Foundation Park, which will serve as the hub for the connection of the Heart of Ohio Trail and Kokosing Gap Trail. This recreational attraction will serve as a destination and an asset for the downtown area.
7.4.2.4 Develop and implement plans for a river walk along the southern side of downtown, serving as a pedestrian connection between downtown, the Kokosing Gap Trail, the Heart of Ohio Trail and Foundation Park. (Initiative) To gain maximum impact and synergy from these significant public features, a pedestrian connection, such as a river walk, is desirable. A river walk might include outside vendors and seasonal activity, along with permanent buildings having frontage on both vehicular and pedestrian areas.

7.4.2.5 Develop and implement plans for the Fredericktown Wellness Path. Each community within Knox County deserves a safe place to bike and walk which links to community businesses, parks, schools and libraries. (Policy)

7.4.2.6 Continue to develop and implement plans to construct and pave the Heart of Ohio Trail and Mohican Valley Trail, owing to their importance to the community, the region and their position on the statewide Ohio-to-Erie Trail. (Policy)

7.4.2.7 Further develop the formally designated Scenic Byway System in Knox County. (General Initiative) Specific projects include seeking scenic byway status on S.R. 3 from the Historic District in Mount Vernon to the Ashland County line. S.R. 3, also known as the “3C Highway,” served as one of the most significant cross-state highways, linking Ohioans from Cincinnati, Columbus and Cleveland. Its historic significance deserves Scenic Byway designation.

7.4.2.8 Develop and implement plans to equitably distribute recreational areas throughout the county. (Policy) Currently, publicly owned recreation areas are not evenly distributed in the county. Some townships may be underserved in terms of outdoor recreation space available relative to others. Any new construction or acquisition of recreational space should take this into consideration.

7.4.2.9 Develop and implement a system of water trails. (Initiative) Build on the designation of the Kokosing State Scenic River Water Trail. The water trail begins at Riverside Park on the western side of Mount Vernon and runs downstream to the eastern county line.

Build on the designation of the Mohican State Scenic River Water Trail. This water trail occurs in Knox County, as well as Ashland, Holmes and Coshocton counties.

7.4.3 Reduce the Incidence of preventable disease and injury.

7.4.3.1 Animal bites Ninety-eight animal bites were reported to the Knox County Health Department in 2010. The majority of these bites were by dogs. No positive rabies specimens were submitted from Knox County. Education regarding building in rural areas and exposure to wild animals including bats and raccoons should be improved. Realtors, contractors, local healthcare providers, animal control officers and veterinarians could be part of a community-wide program on animal bite prevention.
7.4.3.2 Environmental Health

- **Unintentional injury** – During 2004-2006 an average of 24 Knox County residents died each year as a result of an unintentional injury. For the same time frame, 11 Knox County residents died annually due to motor vehicle accidents. In 2008, Knox County unintentional-injury deaths ranking was 50.8 per 100,000 compared to the Ohio average of 40.6/100,000. Prevention education must be community-wide to decrease the number of unintentional deaths to Knox County residents. Planning for redevelopment of roadways and traffic intersections must take into consideration the number of motor vehicle deaths that occur in specific areas of the county.

- **Radon** – Knox County has one of the four highest levels of radon concentration in counties in Ohio. The majority of the county zip code areas report elevated mean indoor air concentrations. See Map 15. The zip code of 43028 (Howard area) has the highest concentrations. Radon is the leading cause of lung cancer in the state of Ohio. Prevention education must be community-wide. Homeowners and school systems must be encouraged to administer radon testing to determine their risk level. Radon test kits should be readily available to county residents. All new construction of homes and buildings in the county should use Radon Resistant New Construction (RRNC). Preconstructed homes should have passive radon mitigation installed. Consideration of developing building codes should take place.

- **Lead** – Knox County has many homes/buildings built prior to 1978 and many that are being renovated, repainted or demolished. These buildings may contain lead and expose the owner, tenant or contractor to blood lead poisoning. Lead can damage nearly every system in the human body and has harmful effects on both adults and children. Lead poisoning is the greatest environmental threat to children in Ohio. In 2009, eight children in the community had elevated blood lead levels requiring hospitalization and chemical chelation. Public education on proper abatement of lead hazards must take place community-wide. Demolition of homes and buildings must be done with the understanding that the potential lead contamination be contained. Lead abatement is required by ORC to be done in a specific manner – all contractors should be made aware of this when doing renovation or demolition.

- **Asthma** - Asthma is a chronic inflammatory disease of the airways. With proper treatment, asthma is a controllable disease. There are about 5,533 adults and 999 children in Knox County who are living with asthma. Asthma disproportionately affects disparate groups in Knox County such as women, children and those of Appalachian heritage. Asthma deaths are rare, but in most cases preventable. In 2009, no deaths from asthma occurred in Knox County. Knox Community Hospital discharges for patients diagnosed with asthma, is higher than the state average. Air quality in the outside environment, homes and other buildings can cause a person with asthma to suffer. Development of commercial and residential areas should take into consideration the air quality of the area. Policy development should occur that includes standards for single and multifamily housing in the county.

- **Septic Systems** – Planned development must include the manner in which sewage will be disposed of. Any residential home that is currently utilizing a septic system for sewage and is within 200 feet of a public sewer line must “tap in” to public sewer. The planning for transition from septic to public sewer must consider the cost to home or business owner and funding assistance made available. Home and business owners must be educated on the rule that mandates tapping into public
sewer from a septic and on the proper abandonment of an unused septic system. In 2010, 109 septic permits were processed at the Knox County Health Department.

- **Wells** – In 2010, 88 water well permits were processed in Knox County. Education about proper installation and maintenance of water wells must become a “norm” for contractors, realtors and others that work with home and business owners. Attention must be given to placement of new buildings, their use and the potential for pollution that could affect private water well systems.

- **Composting** – A portion of the closed landfill on Thayer Road is used as a composting facility for the county. In 2010, this facility composted 2,500 tons of material. Kenyon College also has a composting facility. Plans for county development should include the potential for additional composting facilities open to county residents.

- **Recycling and litter** – There are 13 recycling drop-off sites in Knox County, six of which are full-time. Combined, in 2010 these sites collected 667 tons of materials. The full-time recycling center located in Mount Vernon reported 1,402 tons of materials collected in 2010. Extensive education and promotion of recycling efforts and its positive impact on the environment must continue. Litter enforcement should be promoted and funding considered for “policing and control” of litter in the community. Consideration should be given to educating the Amish population in appropriate refuse disposal and recycling.

- **Future** - Potential issues to consider for regional planning and development include the implementation of residential geothermal system regulation by the Ohio Department of Health, regulation of “water furnaces” or outdoor wood burners by the Ohio EPA, and the potential for development of Construction and Demolition Debris landfills. Utica shale drilling is an activity that must also be considered in planning and development.

### 7.4.4 Identify, recognize and protect historic resources.

**7.4.4.1 Continue to place individual properties and districts on the National Register of Historic Places. (Policy)**

Efforts to designate individual structures throughout Knox County as Nationally Designated Historic Places or Districts should continue.

**7.4.4.2 Continue efforts to revitalize the Woodward Opera House and target it as a cultural and historic anchor for downtown Mount Vernon and Knox County. (Policy)**

The revitalization of the Woodward Opera House by the Woodward Development Corporation is well along and is beginning to redefine downtown Mount Vernon. The addition of the small black box theater at 111 South Main Street, ThePlace@TheWoodward, has been a great success, quantifying the need for additional theatrical rehearsal and performance space. Along with the theater, other existing and future uses of the building could combine to create a significant attraction in downtown Mount Vernon. These efforts, which have been underway for many years, should be sustained.
7.4.4.3 Review and/or develop design review regulations for downtown Mount Vernon and residential areas along North Main Street and East Gambier Street. (Initiative)
Existing design review regulations affecting historic property in downtown Mount Vernon should be evaluated for adequacy. Such regulations cannot be retroactive, so it is important that local requirements are reasonable, effective and appropriate. Inappropriate renovation of one or a few downtown properties could diminish the historic qualities and charm of a larger area. Similarly, residential areas along North Main Street and East Gambier Street in Mount Vernon may be subject to inappropriate redevelopment and/or renovation.

7.4.4.4 Encourage and support Villages and other local units of government to protect and enhance historic resources. (General Policy)
A sense of pride develops as local communities focus on their uniquely built environments. Apart from the Village of Gambier (which has a designated Historic District), smaller units of government in Knox County have not undertaken preservation initiatives to protect their historic resources. Local funding for such initiatives is an issue. Consequently, there is an ongoing need to support and encourage local historic preservation from the county level. County support might include technical resources and assistance with coordination of efforts.

7.4.4.5 Investigate a Knox Heritage Trust or similar measure. (Initiative)
A further step in protecting historic resources would be to create a Knox Heritage Trust as a vehicle for acquisition of key properties. Alternatively, an existing organization might assume this responsibility using private funds to acquire and perhaps renovate significant historic properties.

7.4.4.6 Create a Knox County Arts Council.
An umbrella organization is needed to help coordinate arts-related activities in Knox County. There are several arts-related organizations in Knox County, and preliminary discussions have taken place about the need for a single organization to help coordinate and enhance the arts-related activities in Knox County. Such an organization could coordinate events, create combined promotional materials and work toward creating synergies between organizations and events.

7.4.4.7 Develop formal historic tours with uniform identification and signage. (General Initiative)
Walking or driving tours of downtown Mount Vernon and various historic areas and buildings throughout Knox County should be developed and denoted with proper signage. The articulation and promotion of a scenic loop associated with tourist activity with Amish Country and Mohican Country could be a helpful addition to the ongoing work of attracting tourists. The tours and the scenic loop should be promoted by the Knox County Convention and Visitors Bureau.

7.4.4.8 Pursue “Certified Local Governments” (CLG) status. (Initiative)
CLG status opens additional funding possibilities and technical assistance from the Ohio Historic Preservation Office. The CLG program can also provide training for local officials.
Appendix A – Maps

- Map 1 - Contour Elevations, 50-Foot Intervals
- Map 2 - Surface Water Features
- Map 3 - Flood Hazard Area, 100 Year Floodplain
- Map 4 - Mount Vernon Source Water Area Protection
- Map 5 - Existing Land Use, 2010-2011
- Map 6 - Knox County Recreation Areas
- Map 7 - Fire Districts
- Map 8 - School Districts
- Map 9 - Proposed Commercial Development
- Map 10 - Soil Types
- Map 11 - Current Zoning Map
- Map 12 - County Trails and Scenic Byways
- Map 13 - Contour Elevations, 10-Foot Intervals
- Map 14 - Lands With a Conservation Purpose
- Map 15 - Geometric Mean Indoor Radon Concentrations

All maps included in this Appendix can be viewed in greater detail by visiting the Knox County Map Department at 117 East High Street.
Appendix B – Bibliography of Related Planning Documents

- Knox County Regional Planning Commission, *Knox County Comprehensive Plan, 2006 Update*
- Ohio Department of Transportation, *Go OHIO: Transportation Futures Plan*, 2010
- Knox County Health Department, *Community Health Assessment*, 2011
Appendix C – Summary of Public Comment

Public input to the 2012 Update of the Knox County Comprehensive Plan was/will be achieved in the following ways:

1. The Steering Committee members represented public officials and private citizens with a broad geographic base across the county and a wide spectrum of interests.

2. The subcommittees of the Steering Committee drew upon the talents of public officials, business and citizen leaders and private citizens with expertise in the area of concern of the subcommittee.

3. The various subcommittees solicited input from the community by personal interviews as well as broad based surveys. The information received is reflected in the document.

4. The draft of the Comprehensive Plan was made available for public review on the Internet as well as at public libraries across the county. A copy of the public notice is shown on the following page. Two written comments were received as a result and were considered by the Steering Committee.

5. The Knox County Commissioners will hold two public hearings on the final draft document. These hearings are now scheduled for August 23rd and August 30th. Comments received will be considered by the Commissioners before adoption of the final Comprehensive Plan.
The Knox County Regional Planning Commission is releasing for public comment, a draft version of the 2012 update to the Comprehensive Plan for Knox County. The document will be available for public inspection and review beginning Monday, June 4, 2012.

The public will be able to view the document at the following locations and websites:

www.knoxcountyparks.org/
www.knochhealth.com/
www.co.knox.oh.us/offices/rp/

The Knox County Regional Planning Commission
117 E. High Street, Suite 221

The Mount Vernon Public Library
201 N. Mulberry Street.

Danville Branch
512 S. Market St

Fredericktown Branch
1 Burgert Drive

Gambier Branch
PO Box 1984
115 Meadow Lane

The Public is asked to send any comments or suggestions to:
Darrel Sevens, Secretary/ Director of the Knox County Regional Planning Commission.
117 East High Street Mount Vernon, OH 43050
Or email to knoxplanning@co.knox.oh.us

Deadline to receive comments will be Saturday June 30, 2012