PLAN SWL
SOUTHWEST LEHIGH COUNTY

SOUTHWESTERN LEHIGH COUNTY
COMPREHENSIVE PLAN

OCTOBER 2017

BOROUGH OF ALBURTIS, BOROUGH OF EMMAUS, BOROUGH OF MACUNGIE, LOWER MACUNGIE TOWNSHIP, LOWER MILFORD TOWNSHIP, UPPER MILFORD TOWNSHIP

LVPC
Lehigh Valley Planning Commission

SOUTHWESTERN LEHIGH COUNTY STEERING COMMITTEE

PEG MCCORMACK, ALBURTIS BOROUGH

SHERRYANN OELS, ALBURTIS BOROUGH

SHARON TREXLER, ALBURTIS BOROUGH

BRENT STRINGFELLOW, EMMAUS BOROUGH

RON BEITLER, LOWER MACUNGIE TOWNSHIP

IRV KEISTER, LOWER MACUNGIE TOWNSHIP

SARA PANDL, AICP, RLA, LOWER MACUNGIE TOWNSHIP

LOIS GADEK, LOWER MILFORD TOWNSHIP

ELLEN KOPLIN, LOWER MILFORD TOWNSHIP

DONNA WRIGHT, LOWER MILFORD TOWNSHIP

CHRIS BOEHM, MACUNGIE BOROUGH

ROSEANN SCHLEICHER, MACUNGIE BOROUGH

BRIAN MILLER, UPPER MILFORD TOWNSHIP

ROB SENTNER, UPPER MILFORD TOWNSHIP

FAIRWIND
F·A·R·M

EXECUTIVE SUMMARY.....9
INTRODUCTION.....11
REGIONAL PROFILE.....21
PLANNING AND DEVELOPMENT CONTEXT.....29
SUBJECT AREAS: NATURAL RESOURCES.....35
SUBJECT AREAS: AGRICULTURE.....43
SUBJECT AREAS: COMMUNITY UTILITIES AND SERVICES.....51
SUBJECT AREAS: ECONOMIC DEVELOPMENT.....61
SUBJECT AREAS: COMMUNITY DESIGN AND HISTORIC RESOURCES.....67
SUBJECT AREAS: HOUSING.....73
SUBJECT AREAS: TRANSPORTATION.....79
SUBJECT AREAS: CIVIC LEADERSHIP.....89
SUBJECT AREAS: LAND USE AND DEVELOPMENT.....95
VISIONS, STRATEGIES AND ACTIONS.....105
STATEMENT OF PLAN INTERRELATIONSHIPS.....139

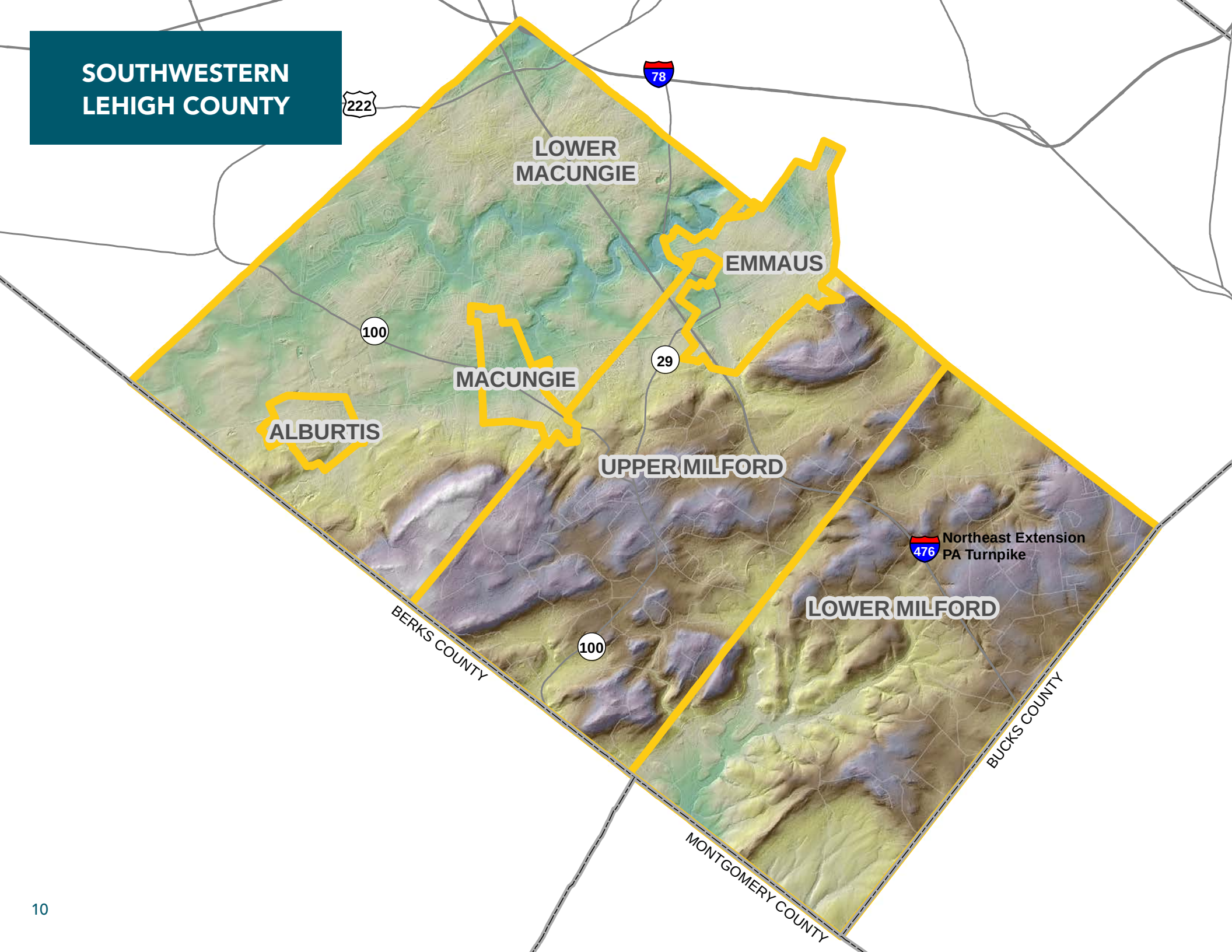
EXECUTIVE SUMMARY

This plan represents the culmination of nearly two years of intensive research, community engagement and development of a collective vision for the six municipalities in Southwestern Lehigh County: Lower Macungie Township, Upper Milford Township, Lower Milford Township, and the boroughs of Macungie, Alburtis and Emmaus. These municipalities first engaged in the multimunicipal planning process in 2001 and adopted a shared Comprehensive Plan in 2005. The following document is the first complete update to that Multimunicipal Comprehensive Plan.

Numerous community engagement initiatives and a rigorous survey revealed that the citizens of Southwestern Lehigh County share a concern about the future quality of life in their region, with quite a few believing that changing development patterns are having a net negative impact. A clarification of the vision for the region has revealed that the majority of the population wants less expansive residential development, coupled with significantly lower intensities of commercial and industrial development, particularly due to the impact these land uses have on roadway congestion. Additionally, most residents recognized that modest amounts of housing growth will be essential to accommodate future demand—the critical aspect is to coordinate this development carefully with water and sewer infrastructure. The village centers and the three boroughs serve as the de facto downtowns to the region, so their aesthetic and cultural heritage warrants particular preservation attention. Lastly, the citizenry of Southwestern Lehigh County articulated a profound desire to protect agricultural land and natural resources, not only for their own merits but as a means of countering the aggressive land use development that has been taking place in the areas closest to the City of Allentown.

This plan organizes the ambitions of the six Southwestern Lehigh County municipalities into a clearly articulated vision across nine subject areas. Nestled within these visions are a number of more clearly implementable strategies, followed by bottom-up actions that can help achieve those strategies. These elements combine with a future land use plan, public engagement results, existing conditions and explanations of how the subject areas comprise the regional vision. Together, these features of the updated Multimunicipal Comprehensive Plan serve as a powerful tool for guiding future land use decisions: zoning; subdivision and land development; official maps; traffic impact fees; and parks, recreation and open space—in short, all the other planning initiatives that could take place to ensure the retention of a high quality of life in the years ahead.

SOUTHWESTERN LEHIGH COUNTY



INTRODUCTION

HOW TO USE THIS PLAN

This Comprehensive Plan will serve as the primary means of guiding public policy in land use, development, transportation, recreation, agriculture and housing for the six municipalities in Southwestern Lehigh County that signed an intergovernmental cooperative planning and implementation agreement. While the agreement is a legal document under the Pennsylvania Municipalities Planning Code (MPC), it does not operate as a part of a code of ordinances. Rather, the agreement operates as the definitive public vision driving how a community functions, grows or does not grow. The agreement should determine the timing, site design and connectivity of development, because it offers a more flexibly-worded, accessible method of informing future changes in actual municipal land use laws: specifically, zoning and subdivision and land development ordinances.

HISTORY OF MULTIMUNICIPAL AGREEMENTS IN SOUTHWESTERN LEHIGH COUNTY

The six municipalities that make up the Southwestern Lehigh County region—the boroughs of Alburtis, Emmaus and Macungie, and the townships of Lower Macungie, Upper Milford and Lower Milford—have been jointly planning since 2004, when they collectively formed the Comprehensive Planning Committee. With the assistance of one primary consultant (Urban Research and Development Corporation (URDC) out of Bethlehem), the region adopted its first Comprehensive Plan in the spring of 2005, formally recognizing and setting the course for cross-jurisdictional cooperation and decision making. The group continues to meet on either a monthly or quarterly basis, depending on need, to discuss and address the shared concerns across this region.

The stated intent of the adopted plan is "to establish overall policies for the development and conservation of the Southwestern Lehigh County Region over the next 15 years". However, in the years since the plan's adoption, portions of this region have grown at an inordinately rapid pace. While Lehigh County has long been one of the fastest growing counties in Pennsylvania, several municipalities in Southwestern Lehigh

County are growing at an even faster rate than the county as a whole. The rapid changes to the region, coupled with the challenges the communities have faced in interpreting and implementing the 2005 plan, prompted the six municipalities to reconvene and prepare for an update to the plan.

STEERING COMMITTEE AND KEY STAKEHOLDERS

In late 2014 and early 2015, the region's municipalities convened a Steering Committee for Southwestern Lehigh County with the express purpose of reviewing the guiding principles behind the Multimunicipal Comprehensive Plan. The Steering Committee consisted of two or three community leaders from each municipality, including managers, planning commission members, council members and other public officials. Serving as the lead entity, the Steering Committee reaffirmed the previous multimunicipal agreement and contracted with the Lehigh Valley Planning Commission (LVPC) to prepare an update to the *Southwestern Lehigh County Multimunicipal Comprehensive Plan*. The plan update was funded through a mix of municipal contributions (with each municipality contributing equally),

contributions from the Lehigh Valley Planning Commission and grant money from the state's Department of Community and Economic Development awarded through the Municipal Assistance Program (MAP).

Working with the six municipalities and their Steering Committee, the Lehigh Valley Planning Commission helped build a structure for gathering information, exploring community engagement initiatives, presenting data in installations, and ultimately developing the text, maps, graphs, visions and strategies that would form the backbone to this Multimunicipal Comprehensive Plan update.

In developing the plan update, the Lehigh Valley Planning Commission worked with the Steering Committee to develop an expansive list of community stakeholders that included prominent small business owners, other public officials, religious leaders, local advocates, nonprofit chairs and other figures with strong vested interests in how the region grows. These stakeholders and the Steering Committee featured prominently in the extensive public participation process that took place through much of 2016.

PUBLIC PARTICIPATION

The Lehigh Valley Planning Commission and the Southwestern Lehigh County Steering Committee collaboratively employed a variety of methods to engage Southwestern Lehigh County residents, solicit feedback and capture information across different constituencies.

Website

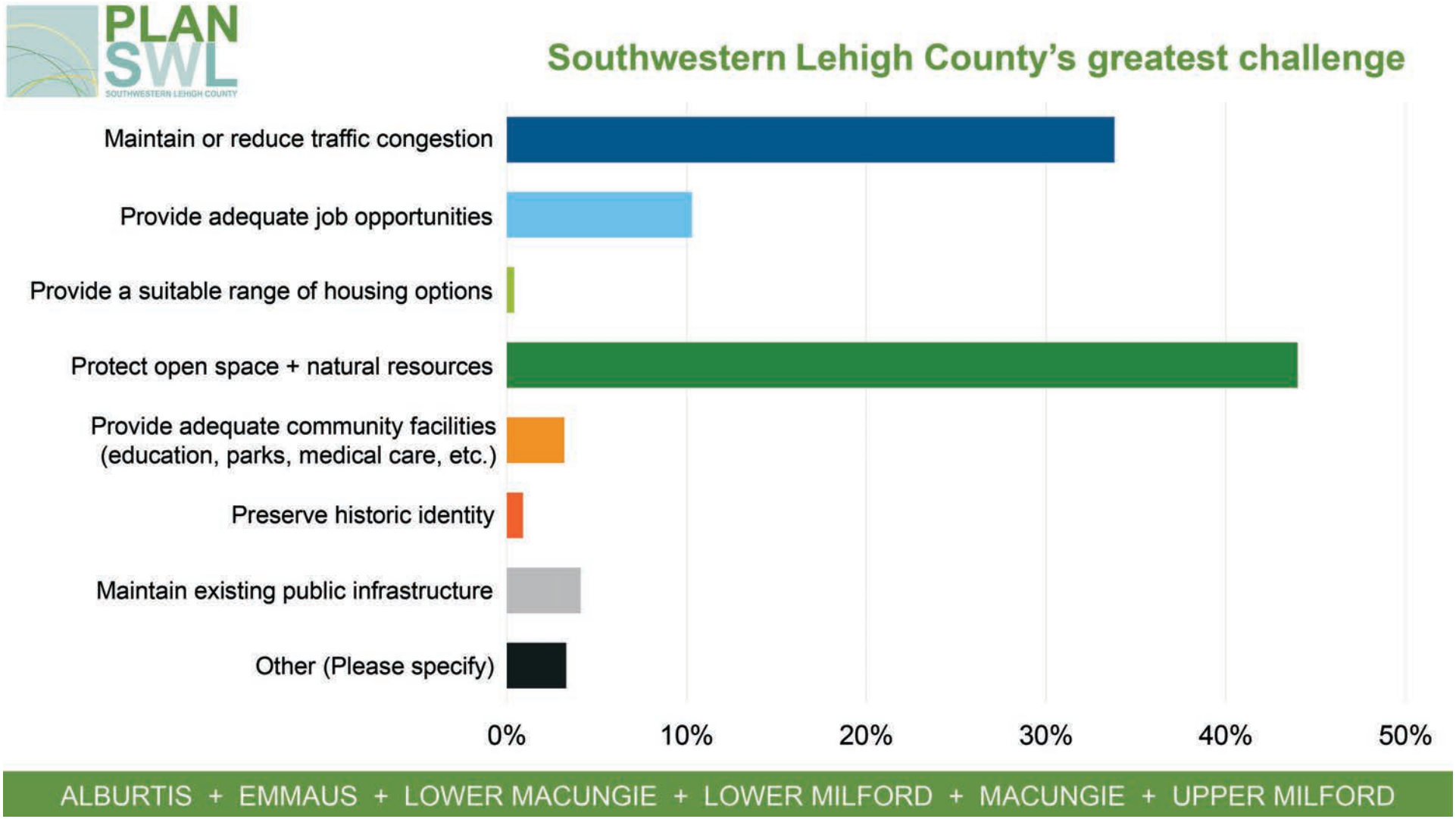
To engage area residents and distribute information related to the Southwestern Lehigh County planning effort, the Commission staff developed a PLANSWL website (planswl.org) in the fall of 2015. The website provided information on Community Indicators, Field Observations, Municipal Profile pages, Map Gallery and Upcoming Events. Additionally, the website presented the results of the public engagement efforts, including community vision statements and community survey results.

Charrette and Listening Sessions

Beginning in late 2015, the Steering Committee developed a list of over 300 community stakeholders across the six municipalities and categorized them according to their individual areas of expertise. These areas of expertise spanned the following seven topics referenced in the Pennsylvania Municipalities Planning Code:

- Land Use and Future Development
- Housing
- Transportation
- Natural and Historic Resources
- Community Facilities and Utilities
- Economic Development
- Civic Leadership

Each stakeholder then received an invitation (tailored to the recipient's subject matters of expertise) to a series of roundtable



discussions, or planning "charrettes." These roundtable discussions took place on January 5th and 6th, with over 100 individuals attending.

Sessions included a brief presentation on the "State of Southwestern Lehigh County," followed by multiple roundtable discussions based on the aforementioned seven topics, and concluded with 90 minutes of open-ended discussion. Using the feedback gathered from the charrettes, the Lehigh Valley Planning Commission generated a list of the top five identified

issues, or themes, for each topic. The Lehigh Valley Planning Commission also determined that it would be appropriate to separate the topic of natural resources and historic resources, resulting in a total of eight topic areas.

These topic areas informed a subsequent community-wide public listening session held on January 14th from 7pm to 9pm at the Lower Macungie Community Center and attended by 75 people. Attendees organized themselves according to the topics under examination and reviewed the five key issues related to their topic. Each participant was then given five "votes" which they could use to visually rate the importance of an issue. Once voting was complete, the Lehigh Valley Planning Commission moderated a discussion in which participants voiced their opinions about the voting results and brought up important, previously unidentified concerns.

Community-wide Survey

The themes distilled and refined across these meetings provided the basis for a 26-question public opinion survey that assessed thematic, demographic and quality-of-life elements in Southwestern Lehigh County. The Lehigh Valley Planning Commission collected survey responses via random and non-random web-based approaches. During the collection period of February 11th to February 29th, 2016, a total of 1,333 respondents completed the survey.

For the random sample approach, the Lehigh Valley Planning Commission mailed a postcard to a random sample of residents within the six-municipality region inviting them to complete the online questionnaire. This approach generated 744 responses, producing a margin of error of +/- 4% at the 95% confidence interval. To increase the precision of the estimates and correct for differential coverage by geographic and demographic detail, the resulting data was weighted based on four variables: age, educational attainment, place of residence and gender. All analyses for this sample were performed based on these weighted data.

The non-random, self-administered survey approach was open to all Southwestern Lehigh County stakeholders during the same collection period as the random sample component. Working through the six municipalities, the Steering Committee disseminated the web-based survey via municipal email lists, websites, Facebook pages and public meetings. In addition, the Lehigh Valley Planning Commission shared the online survey via stakeholder email lists, a geographically targeted Facebook promotion, the Lehigh Valley Planning Commission and Southwestern Lehigh County websites, Twitter, LinkedIn, flyers at various public locations and print upon request. This approach produced 589 responses and allowed individuals who did not receive the random sample to contribute their responses and feedback to an identical survey. However, responses to the two surveys remained distinct from one another and were calculated and interpreted separately to preserve the statistical validity of the responses from the random sample.

The ability to administer the survey to a random sample, with results that are similar to those from a non-random sample, ensures confidence in these results. Furthermore, this multi-

faceted approach allowed for comparison of the two samples. Responses for the two samples largely complimented each other, with respondents identifying transportation, natural resources and agricultural assets as important focus areas for improving quality of life in Southwestern Lehigh County.

THEMES AND SUBJECT AREAS

In March, April and May 2016, monthly public meetings collected feedback and reaction to the results of the public opinion survey and draft goals rooted in the eight core themes of the plan. Based on the community engagement efforts described above, the Lehigh Valley Planning Commission determined that nine key subject areas would serve as the basis for organizing the remaining information in the Comprehensive Plan: Natural Resources, Agriculture, Community Utilities and Services, Economic Development, Community Design and Historic Resources, Housing, Transportation, Civic Leadership and Land Use and Development.

These subject areas capture the ideas that the Steering Committee, stakeholders and other residents from Southwestern Lehigh County have determined are the most essential to maintaining the region's most cherished characteristics and giving an aspirational basis for those qualities that need improvement. All of these subject areas correlate either directly or roughly to the elements required in a comprehensive plan, as stipulated in the Pennsylvania Municipalities Planning Code.

ORGANIZATION OF THIS DOCUMENT

To set the stage for the discussion of the key subject areas identified by the community, this plan begins with a brief summary of existing conditions in Southwestern Lehigh County. The Regional Profile describes the region's people and landscape, while the Planning and Development Context explores how the landscape is changing. Following this summary, the plan discusses challenges and opportunities presented by each of the key subject areas. These subject area chapters are followed by the heart of the plan—the Visions, Strategies and Actions developed to bring the community's vision for Southwestern Lehigh County to life. The document concludes with a statement of plan interrelationships.

EXISTING CONDITIONS
includes a thorough array of community data - legislative history, infrastructure improvements, building activity, home sales, demographics, and transportation.

PUBLIC PARTICIPATION
details the intensive community engagement that helped inform policy details on the subsequent sections.

SUBJECT AREAS
help inform the public policy aspect of the comprehensive plan. While many of these areas are required by the Pennsylvania Municipalities Planning Code, several emerged as key topics through the community engagement process. Branded by a distinct icon, each of these brief but graphics-rich sections look at the key issues facing the Southwestern Lehigh communities as they pertain to each subject.

VISIONS, STRATEGIES, ACTIONS
are the "toolkit" for putting the entire plan into use. The icons again appear prominently here to indicate which of the different subject areas each Goal, Policy and Action touches upon, so that users can filter through the actions that interest them the most.

STATEMENT OF PLAN INTER-RELATIONSHIPS
is required by the Municipalities Planning Code to serve as an analysis of internal consistency (do the parts of this report all fit together well?) as well as a external consistency (how well do these policies mesh with the policies in comprehensive plans of neighboring municipalities?).

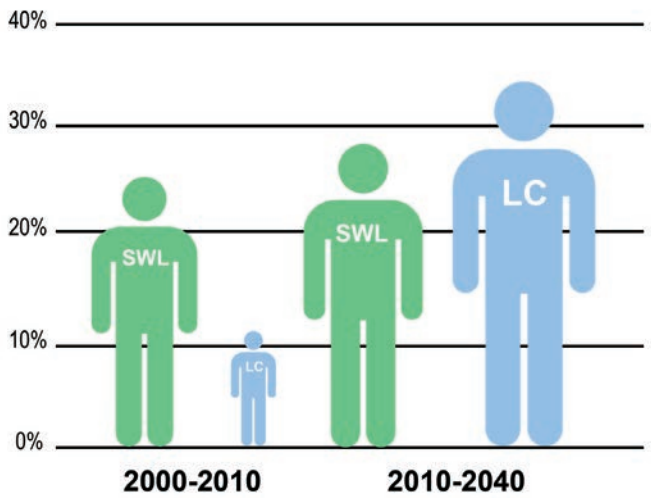
ACURA
DO
NOT
PASS

REGIONAL PROFILE

REGIONAL POPULATION

Between 2000 and 2010, the population of Southwestern Lehigh County grew twice as fast as the county. Although the region is expected to continue to grow in the decades to come, population projections developed by the Lehigh Valley Planning Commission indicate that future growth rates may slow relative to the county. The regional population in 2040 is expected to be 74,442, compared to 58,346 in 2010.

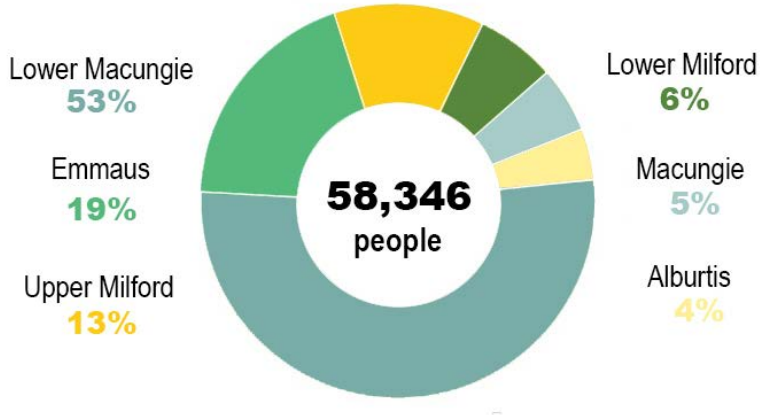
POPULATION GROWTH RATE



Source: U.S. Census Bureau, Decennial Census, 2000 and 2010; LVPC Projections 2020, 2030, 2040

MUNICIPAL POPULATION

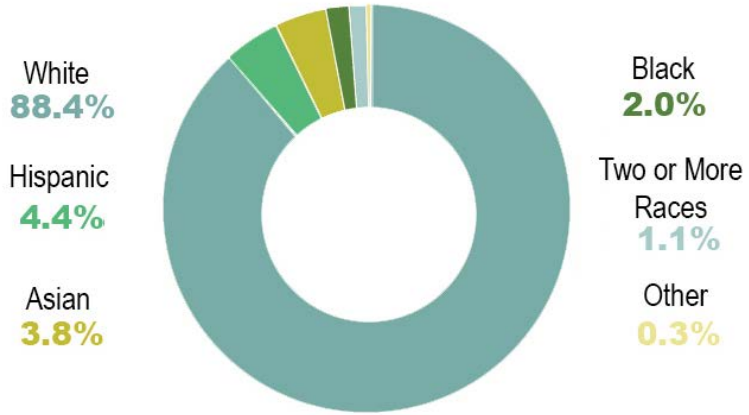
In 2010, Southwestern Lehigh County was home to 17% of the population of Lehigh County. Lower Macungie Township is the region's largest and fastest growing municipality, accounting for more than half of the region's population in 2010. Based upon Lehigh Valley Planning Commission's projections, the region's boroughs are anticipated to grow at a slower pace than the townships through 2040.



Source: U.S. Census Bureau, Decennial Census, 2010

AGE, RACE AND ETHNICITY

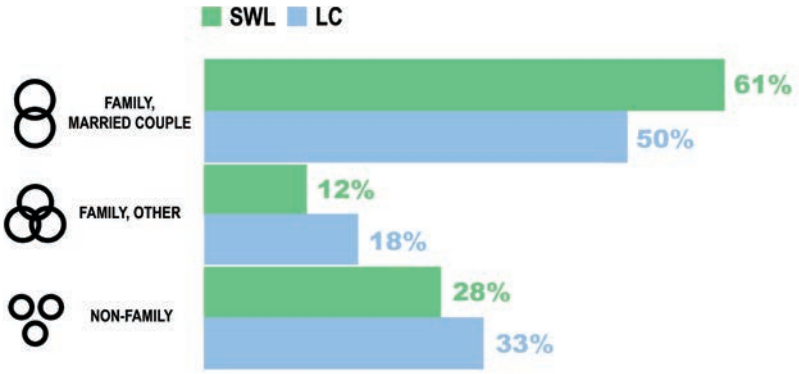
The age profile of Southwestern Lehigh County mirrors that of the county, with about 24% of residents under the age of 18 and about 16% over the age of 65. The population of Southwestern Lehigh County is less diverse than that of the county, with about 11.6% of residents identifying as non-White and/or Hispanic, compared to 28.4% for Lehigh County as a whole.



Source: U.S. Census Bureau, Decennial Census, 2010

HOUSEHOLDS

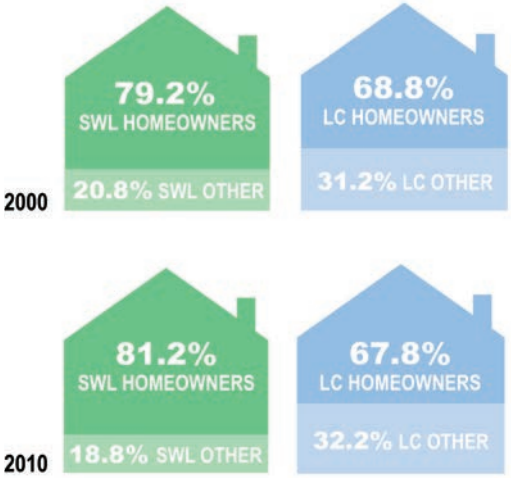
In 2010, the people of Southwestern Lehigh County comprised about 22,900 households, or about 17% of all households in Lehigh County. Compared to the county, a larger share of these households were married couple family households, and a smaller share were non-family households.



Source: U.S. Census Bureau, Decennial Census, 2010

HOMEOWNERSHIP

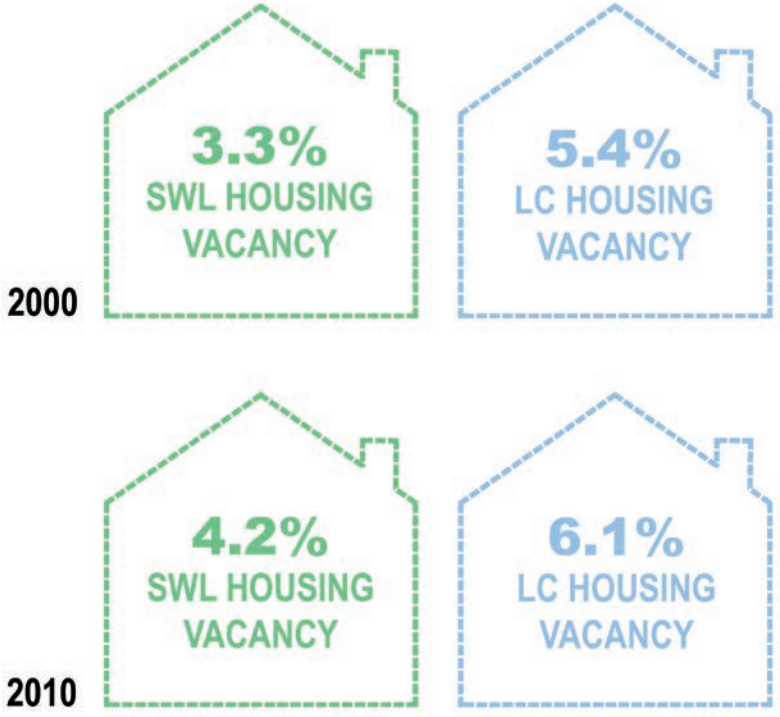
In the wake of the national housing crisis, Southwestern Lehigh County fared better than the county. While homeownership declined slightly in Lehigh County between 2000 and 2010, homeownership in Southwestern Lehigh County actually rose slightly during that same period.



Source: U.S. Census Bureau, Decennial Census, 2000 and 2010

VACANCY

Southwestern Lehigh County experienced a slightly higher increase in vacancies from 2000 to 2010 than the county as a whole. However, housing vacancy levels in both Lehigh County and the Southwestern Lehigh County municipalities remain quite low from a national perspective.

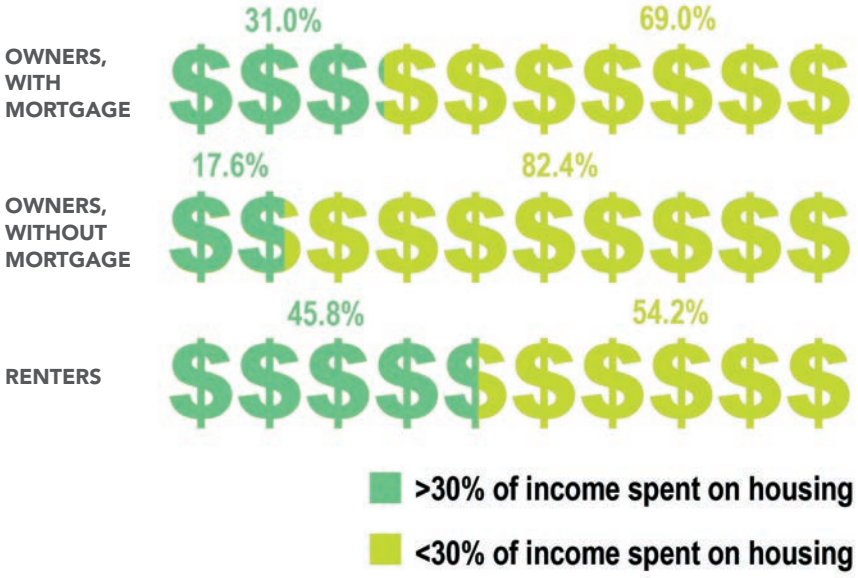


Source: U.S. Census Bureau, Decennial Census, 2000 and 2010

HOUSING COSTS

A general guiding principle is that households should try to devote no more than 30% of their gross income to housing costs (including rent or mortgage, utilities, insurance and real estate taxes) so that sufficient resources are available for other needs. In Southwestern Lehigh County, the share of households spending more than 30% of their gross income on housing (29.9%) is generally below that of the county (37.6%) and the nation as a whole (36.6%). The share of households in Southwestern Lehigh County exceeding the 30% threshold tends to be greatest among renters and lowest among owners without a mortgage (where housing units are owned free and clear of debt).

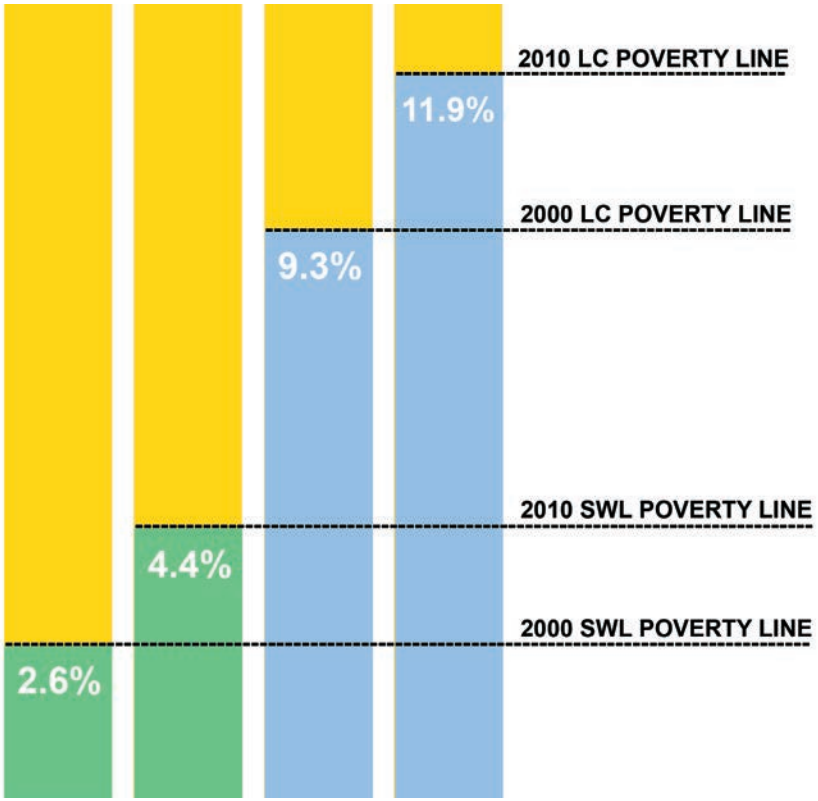
HOUSEHOLD HOUSING COSTS



Source: 2009-2013 American Community Survey

POVERTY

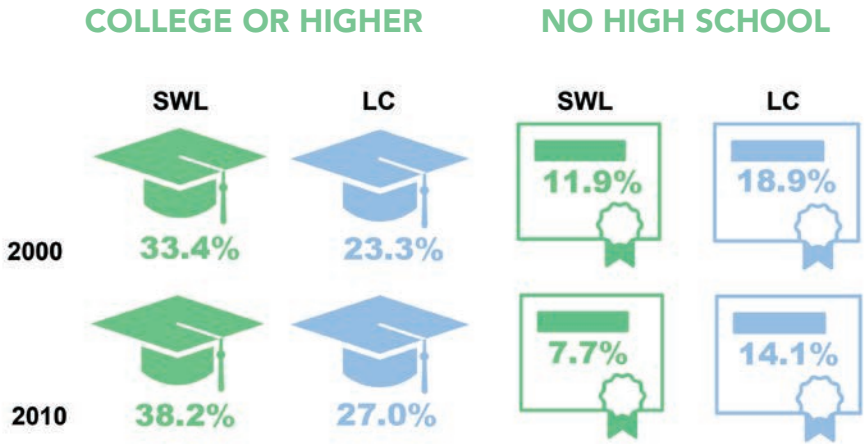
Though poverty rose from 2000 to 2010, most Southwestern Lehigh County municipalities continued to have poverty rates significantly lower than that of the county as a whole.



Source: U.S. Census Bureau, Decennial Census, 2000 and 2010

EDUCATION

In Southwestern Lehigh County between 2000 and 2010, the percentage of adults age 25 years or older with at least a bachelor's degree rose, while the percentage of adults age 25 or over without a high school diploma fell. These trends mirrored those in the county as a whole.

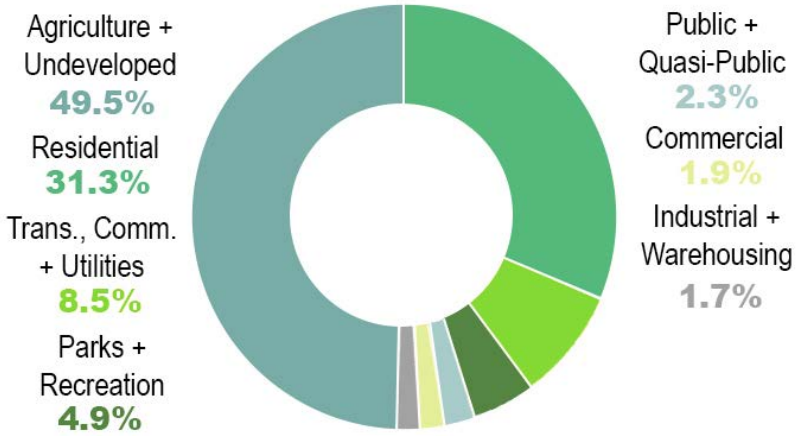


Source: U.S. Census Bureau, Decennial Census, 2000 and 2010

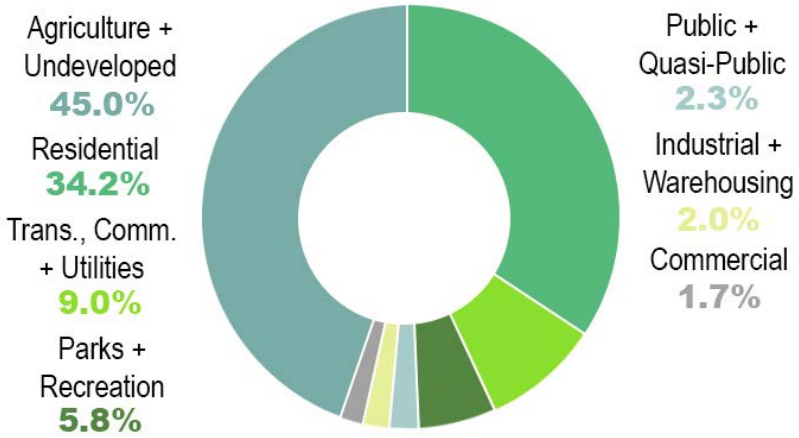
EXISTING LAND USE

An analysis of land use data provided by the Lehigh County assessment office revealed that Southwestern Lehigh County experienced a net loss in the percentage of lands devoted to Agriculture and Undeveloped from 2004 to 2014. This 4.5% decrease in Agriculture and Undeveloped was accompanied

SWL EXISTING LAND USE, 2004



SWL EXISTING LAND USE, 2014



Source: Lehigh and Northampton counties GIS Tax Assessment databases and LVPC GIS databases

by a 2.9% increase in Residential uses, a .9% increase in Parks and Recreation and a .5% increase in Transportation, Communications and Utilities uses.

Compared to Lehigh County as a whole, in 2014 Southwestern Lehigh County had a greater percentage of land classified as Residential uses (34.2% compared to 28.0%) or Transportation, Communications and Utilities (9.0% compared to 7.7%), while lagging behind the county in the amount of land classified as Parks and Recreation (5.8% compared to 8.6%) and Agriculture and Undeveloped (45.0% compared to 47.6%).

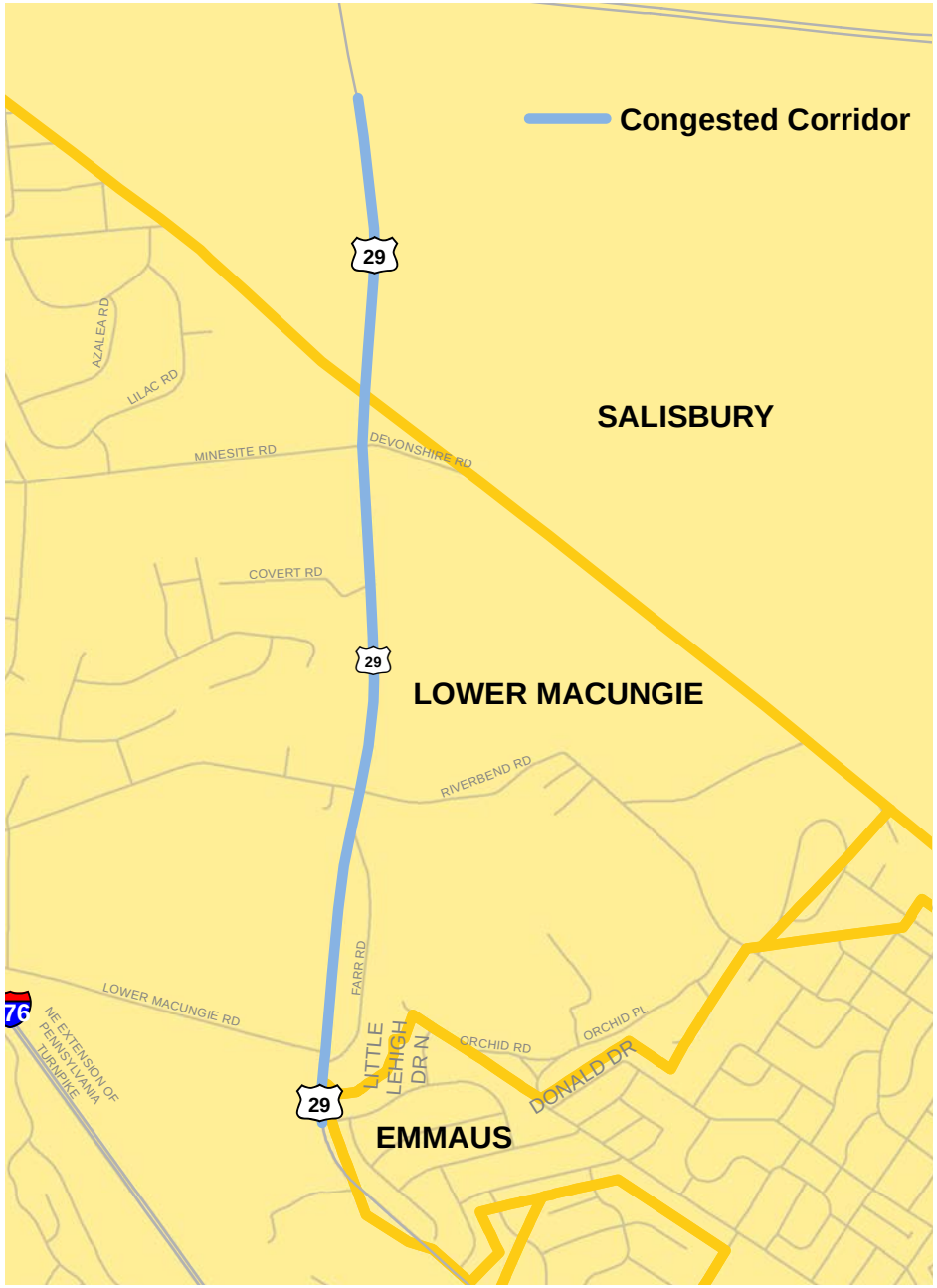
EXISTING TRANSPORTATION SYSTEM

Southwestern Lehigh County is served by Interstate 476—the primary north-south corridor through eastern Pennsylvania—and Interstate 78—a primary corridor linking New York City and Northern New Jersey to points west. Southwestern Lehigh County is also served by major state highway Route 100 (which passes through Macungie borough), Route 29 (which passes through Emmaus borough), and Route 222 (which extends from PA 145 in Allentown to the Lehigh County/Berks County line and points westward).

Using a Regional Travel Demand Model that defines congestion in terms of level of service (LOS), the 2016 Lehigh Valley Congestion Management Process identified six congested road segments within Southwestern Lehigh County: 1) Lower Macungie Road (South Krocks Road to Route 29), 2) Hamilton Boulevard (Grange Road to Schantz Road), 3) Brookside Road (Hamilton Boulevard to Lower Macungie Road), 4) Route 476

(Route 22 to Lehigh County Line), 5) Route 29 (Fish Hatchery Road to Little Lehigh Drive), and 6) Emmaus Avenue (Harrison Street to Cypress Avenue). Additionally, a review of the *2016 Traffic Safety Plan* prepared by the Lehigh Valley Planning Commission identified the following three high crash corridors in the Southwestern Lehigh County planning area: Route 222 (Dorney Park to Railroad Bridge before Route 100 in Lower Macungie Township), Route 29 (Chestnut Street: Turnpike to Mill Road in Upper Milford Township), and Kings Highway (Zionsville Road to Palm Road in Lower Milford Township).

The Lehigh and Northampton Transportation Authority (LANta) provides limited transit service in the region via bus route #322, serving Lower Macungie Township, and bus route #104, serving Emmaus borough. In 2011, LANta introduced Route 501 Macungie/Alburtis LANtaFlex to serve the boroughs of Macungie and Alburtis. LANtaFlex is a reservation-based flexible service which is open to the general public and replaced the limited service fixed route "D" (Northampton/Emmaus), which was cancelled due to poor performance.



PLANNING AND DEVELOPMENT CONTEXT

INTRODUCTION

This chapter explores how the landscape of Southwestern Lehigh County is changing by analyzing planning, development and sales activity in the region between 2005 and 2014.

PLANNING ACTIVITY

The building blocks of local land use planning are the comprehensive plan, local land use ordinances and local infrastructure investments. The comprehensive plan establishes a shared vision for how a community will grow and provides a blueprint for its physical development. This vision is implemented through local land use ordinances that regulate where and how land is developed, and local infrastructure investments that determine where public infrastructure is provided.

To develop a general understanding of local land use planning in Southwestern Lehigh County, the LVPC analyzed all planning activity in the region between 2005 and 2014. Of the 93 actions analyzed, most were either zoning ordinance amendments (63) or subdivision and land development ordinance amendments (19).

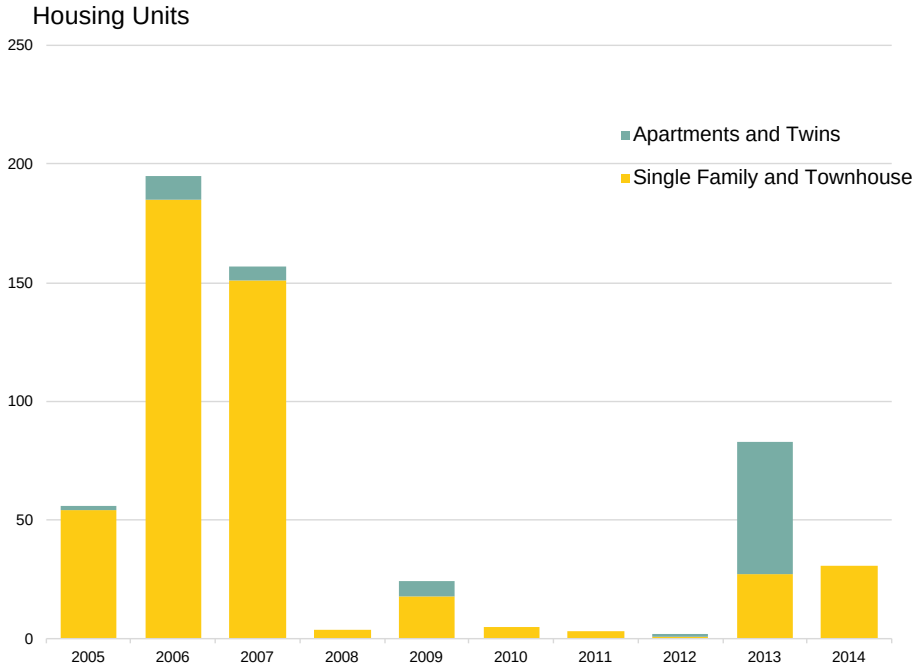
Most local planning activity was well-aligned with the County and Multimunicipal Comprehensive Plans. When compared to the *County Comprehensive Plan The Lehigh Valley… 2030*, 47% of the actions analyzed were matters of local concern, 44% were consistent and 9% were inconsistent. Most inconsistent actions either allowed very low densities in areas designated for urban development or allowed development in areas designated for farmland preservation. When compared to the Multimunicipal Comprehensive Plan, 20% of the actions analyzed were matters of local concern, 65% were consistent and 15% were inconsistent.

The Lehigh Valley Planning Commission also analyzed local infrastructure investments in Southwestern Lehigh County between 2005 and 2014, including projects that were planned, in process or completed during the ten-year period. The six municipalities of Southwestern Lehigh County reported 89 infrastructure projects between 2005 and 2014, including 48 transportation projects, 16 sewer or water system projects and 17 park projects.

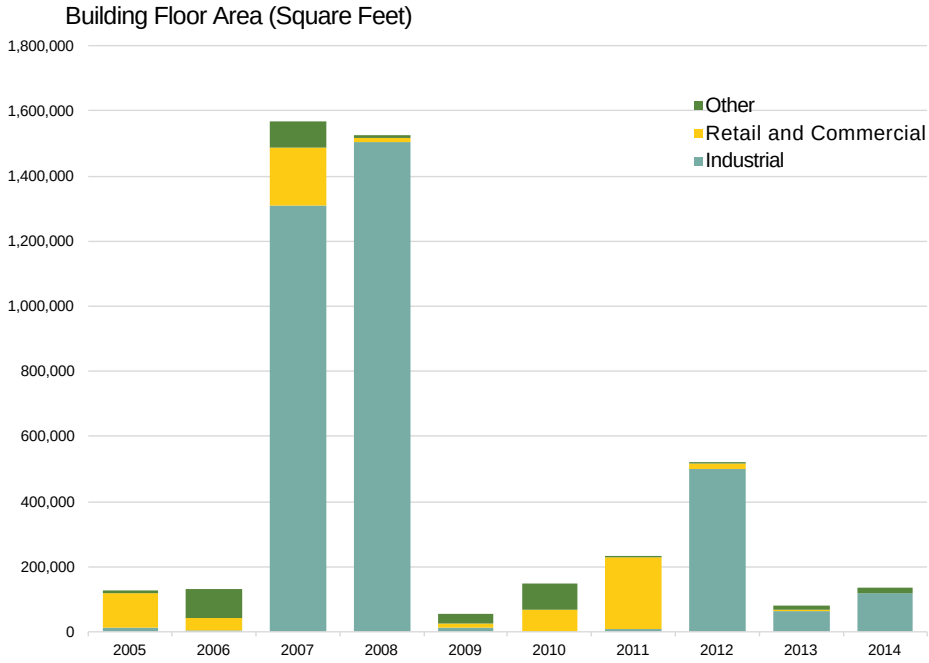
DEVELOPMENT ACTIVITY

Local land use planning may shape development decisions, but it is certainly not the only driver of development activity. To understand how the landscape of Southwestern Lehigh County is changing, the Lehigh Valley Planning Commission analyzed trends in land development plans and building permits.

APPROVED RESIDENTIAL DEVELOPMENT



APPROVED NON-RESIDENT DEVELOPMENT



Land development plans submitted to the Lehigh Valley Planning Commission between 2005 and 2014 show a steep decline in development activity after the financial crisis of 2007, followed by a modest rebound after 2012. In the residential sector, the number of approved housing units peaked at 195 in 2006, but fell to only 4 in 2008. Across the ten years, most approved housing units were either single family detached or townhouses. In the non-residential sector, the approved building floor area peaked at 1.57 million in 2007, but fell to only 53,000 in 2009. Across the ten years, most approved building floor area was industrial, and a modest share was retail or commercial.

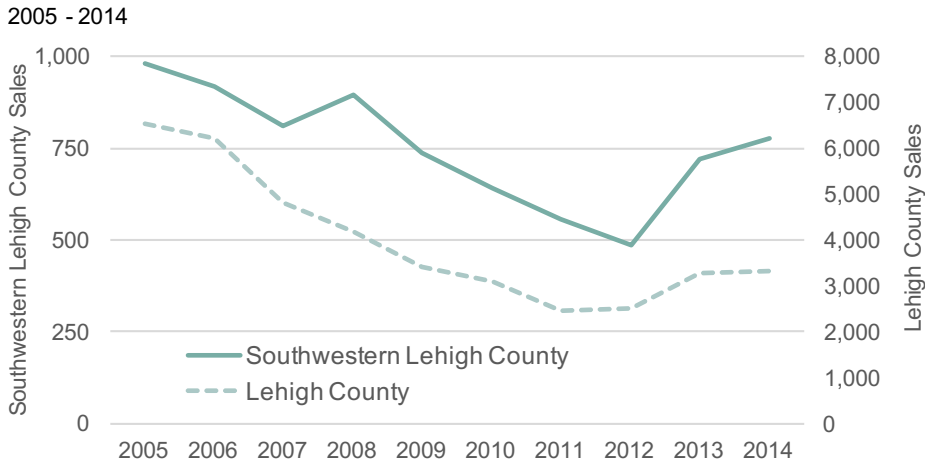
Building permit data show a similar trend in development activity. Building permits are required before construction can begin, and therefore provide a more accurate measure of development activity than approved land development plans. According to the U.S. Census, the number of new housing units authorized by building permits peaked at 805 in 2005, but fell to 192 by 2008. While the number of new housing units authorized by building permits began to rebound after 2012, the rebound was modest compared to the county. New housing units in Southwestern Lehigh County represented 46.5% of all county housing units in 2005, compared to 12.5% in 2014.

SALES ACTIVITY

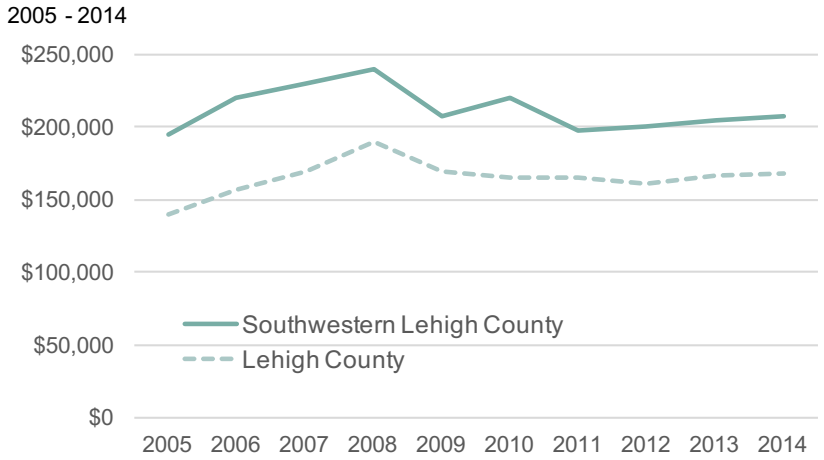
Trends in the regional housing market also shape development decisions. To understand how the regional housing market evolved between 2005 and 2014, the Lehigh Valley Planning Commission analyzed trends in housing sales and prices.

According to county data, housing sales in Southwestern Lehigh County were relatively stable in the years following the financial crisis. While county housing sales fell 50% between their peak in 2005 and their low in 2013, housing sales in Southwestern Lehigh County fell only 27%. This stability suggests that the

HOUSING SALES



MEDIAN SALES PRICE

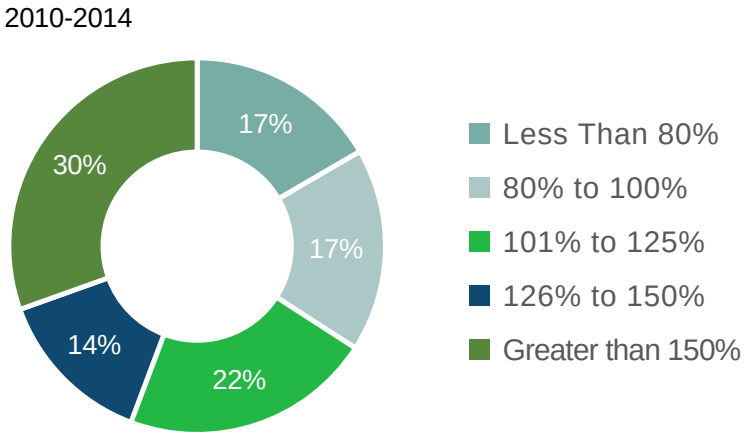


Southwestern Lehigh County housing market is more resilient to external market stresses than the regional market. Among housing types, single family detached housing represented the largest share of sales (56%), followed by single family attached (30%) and condominiums (14%).

Between 2005 and 2014, the median sales price of Southwestern Lehigh County homes remained significantly higher than the county median. The gap did narrow, however, across the ten-year period. The median sales price of Southwestern Lehigh County homes fell from 140% of the county median in 2005 to 124% in 2014. This suggests a slight shift in the position of Southwestern Lehigh County within the regional housing market.

The *2010-2014 Housing Market Report* (LVPC) assessed the variety of price points available to homebuyers in different communities. According to this analysis, Southwestern Lehigh County offered a fairly balanced mix of price points, with somewhat more sales at higher price points. Between 2010 and 2014, 17% of sales recorded prices under 80% of the county median, while 30% of sales recorded prices above 150% of the county median.

SOUTHWESTERN LEHIGH COUNTY SALES PRICES COMPARED TO LEHIGH COUNTY MEDIAN



SUBJECT AREAS: NATURAL RESOURCES

INTRODUCTION

Southwestern Lehigh County's interconnected natural resources create unique landscapes that define the community's character and contribute to the local quality of life. These resources also serve important environmental and social functions by providing natural habitat and supporting biodiversity; protecting and enhancing water quality; filtering pollutants from water, soil and air; recharging groundwater aquifers; providing aesthetically pleasing areas and recreation opportunities; and protecting lives, money and property by buffering developed areas from flooding. Determining which natural resource features to preserve is an important step in the development of a comprehensive plan.

WATER RESOURCES

Surface Waters

The streams, lakes and ponds of Southwestern Lehigh County have played a significant role in its history and development and are interpreted by commemorative parks and historical structures and remnants. Many municipal parks and trails are located near streams. These stream corridors can also serve as blueways (a greenway corridor that includes a watercourse) and critical wildlife habitat areas. Some of the best trout habitat and fishing in eastern Pennsylvania can be found in Southwestern Lehigh County. Within the region, the Pennsylvania Fish and Boat Commission's October 17, 2016 Class A Wild Trout Waters report designates the Perkiomen and Spring creeks and significant portions of the Hosensack, Little Lehigh and Saucon Creek mainstems as Class A Wild Trout Streams. Subsequent evaluation by the Pennsylvania Department of Environmental Protection of the Hosensack and Saucon creek segments designated as Class A Wild Trout Waters upgraded the water quality to High Quality-Cold Water Fishes.

The Pennsylvania Department of Environmental Protection maintains a Water Quality Standards program based upon water use. All Commonwealth waters are protected for an aquatic life use as well as a number of water supply and recreational uses.

In Southwestern Lehigh County, the water quality designations are: High Quality-Cold Water Fishes (Hosensack [part], Leibert, Little Lehigh, Perkiomen, Saucon and Swabia creeks), Cold Water Fishes (Hosensack [part] and Indian creeks), High Quality-Trout Stocking Fishes (Unami Creek tributaries) and Trout Stocking Fishes (Macoby Creek).

Groundwater

Groundwater resources within Southwestern Lehigh County are greatly determined by bedrock composition. Carbonate bedrock areas (north of South Mountain) have well-drained soils and groundwater that is more plentiful due to the ability of water to move more freely through breaks and channels in the rock, which also increases the risk of groundwater contamination. Conversely, the bedrock in the southern half of Lower Milford Township tends to provide some of the most limited groundwater sources in Lehigh County. The bedrock located in the remaining area of the region typically has a lower yield than carbonate bedrock but is usually sufficient for individual domestic use. The latter two bedrock areas tend to have more wetlands.

Wetlands

Wetlands are areas that are filled by surface or groundwater sufficiently often and long enough to support a variety of vegetation typically adapted for life in wet soil conditions. As documented in the *Lehigh Valley Return on Environment* (2014) study, wetlands provide higher natural system service benefits (flood mitigation, water quality, etc.) on a per acre basis than any other land cover. Southwestern Lehigh County has 115 sites that are classified as wetlands, primarily in Upper Milford and Lower Milford townships.

NATURAL LANDS

Woodlands

Woodlands are valued for many reasons—recreational opportunities, firewood harvesting, commercial timbering and as buffers between incompatible land uses. Many species of birds and wildlife depend on large, unbroken wooded tracts for survival. Woodlands also mitigate environmental stressors by reducing stormwater runoff, filtering groundwater recharge, controlling erosion and sedimentation, moderating local microclimates and purifying the air. There are over 9,900 acres of woodlands (in stands of greater than five acres) in Southwestern Lehigh County, primarily located on the hillsides, such as South Mountain, and along stream corridors.

Interior Woodlands

Interior woodlands are the areas of a woodland patch that are a minimum of 300 feet from the edge. The habitat characteristics—light, wind, moisture, predation rates, tree density and composition—found at the edges are quite different from the conditions in the forest interior. Many wildlife species require interior woodlands for survival. The majority of interior woodlands in Southwestern Lehigh County are found on South Mountain, Mill Hill and the Carls Hill/Powder Valley area.

Riparian Woodlands

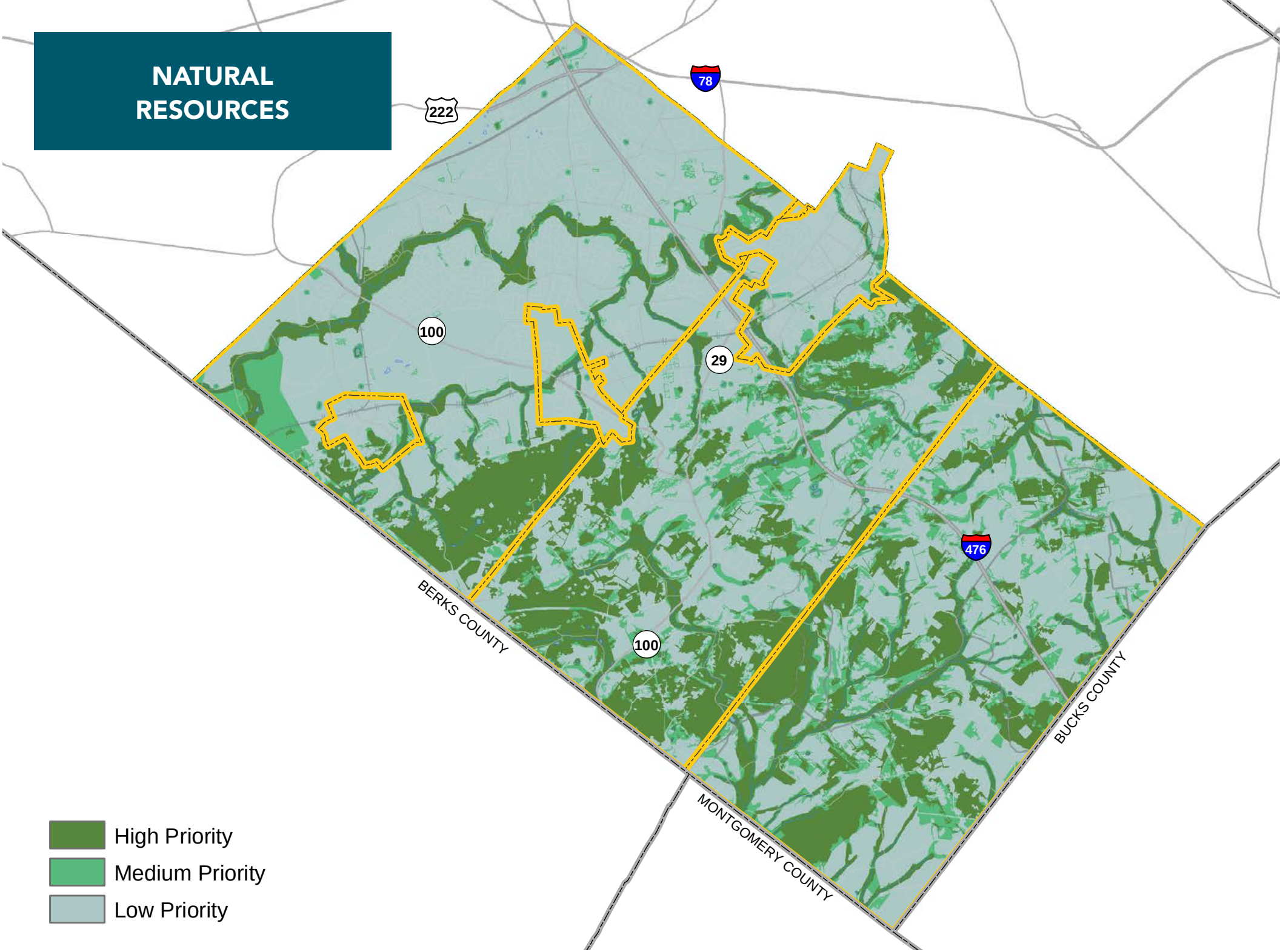
Riparian woodlands are recognized as a vital feature for protecting and restoring waterways. A riparian buffer is an area of natural vegetation that is maintained along a waterbody to protect water quality and stabilize channels and banks. The

riparian vegetation affects the canopy cover, shading, nutrient inputs, amount of large woody debris entering the waterbody and the amount of pollutants entering the waterbody from storm runoff. Riparian woodlands are located along several streams in Southwestern Lehigh County, for example parts of the Hosensack, Indian, Leibert and Swabia creeks.

Floodplains

A floodplain is the low lying area adjacent to a stream, river or watercourse that is subject to periodic flooding, that can store large amounts of water, be a source of aquifer recharge and prevent loss of life, health hazards and property damage. Regulation of floodplains helps to protect open space and

NATURAL RESOURCES



critical habitat areas, and preserve and enhance water quality and quantity. Some of the floodplain areas identified by the Federal Emergency Management Agency include the Little Lehigh and Swabia creeks and the southern parts of the Indian and Hosensack creeks.

CONSERVATION PRIORITY LANDS

Natural Heritage Areas

Southwestern Lehigh County has natural areas worthy of protection, such as rare plant and threatened or endangered animal species locations and high quality natural habitats. The *Natural Heritage Inventory of Lehigh and Northampton Counties, Pennsylvania – Update 2013* identified 12 Natural Heritage Areas: seven sites having a core habitat and supporting landscape and five sites having only a watershed-level supporting landscape in Southwestern Lehigh County. The majority of Natural Heritage Areas identified in the Inventory are associated with wetlands, riparian zones, floodplains and vernal pools.

Significant Local Natural Areas

Natural areas of local significance also exist that have a diversity of wildlife and plant life, provide water quality protection and have potential for recreation opportunities. Southwestern Lehigh County has five significant local natural area sites, the largest of which is Mill Hill.

Greenways and Blueways

Greenways are corridors of open space, and blueways are greenway corridors that include a watercourse. Both greenways and blueways are critical components of any landscape. They protect the environment, provide alternate routes of transportation, supply recreational opportunities, and connect natural and cultural areas to one another. Greenways may vary from narrow strips to wider corridors that incorporate natural, cultural and scenic features. Connectivity distinguishes greenways from isolated pockets of open space.

Natural Resources Conservation Priorities

Areas recommended for natural resources protection are based on the methodology created for the *Comprehensive Plan The Lehigh Valley…2030*. Ten different natural resource components are used: hydrology (streams, lakes and ponds), riparian buffers, floodplains, wetlands, hydric soils, Natural Heritage Areas, local natural areas, steep slopes, woodlands and interior woodlands. The ten individual components were assigned conservation priority values and overlayed on a map of the region, resulting in conservation priorities to be factored into the Future Land Use Plan.

SCENIC LANDSCAPES AND RESOURCES

Southwestern Lehigh County has an abundance of scenic resources, including waterways, roads and views. The region's identity is formed and reinforced through these features, which are viewed as regional assets that contribute to quality of life.

Streams providing scenic resources include the Little Lehigh, Swabia, Leibert, Hosensack, Indian and Saucon creeks. Scenic roadways include Limeport Pike in Lower Milford Township. Scenic views also exist, such as from the intersection of Routes 29 and 100 in Upper Milford Township. One of the most prominent scenic features is South Mountain, which bisects the Southwestern Lehigh County region south of the boroughs. Lastly, farmlands are also an important resource that residents appreciate for their scenic beauty.

ENVIRONMENTAL IMPACTS AND HAZARDS

Steep Slopes

Slopes with grades of 15% or greater are steep, and slopes with grades of 25% or greater are very steep as classified by the *Comprehensive Plan The Lehigh Valley…2030*. Slopes of 8% to 15% are moderately steep. Steep slopes (inclusive of very steep and moderately steep slopes) are vulnerable to damage resulting from site disruption, particularly related to soil erosion. Erosion of steep slopes can yield heavy sediment loads on streams and wetlands, degrading water quality and disturbing aquatic habitat. Increased sedimentation also increases flood hazards by reducing the floodwater storage capacity of drainage ways. The steepest slopes in Southwestern Lehigh County are primarily located in southern Lower Macungie Township and throughout Upper Milford and Lower Milford townships.

Geology

Southwestern Lehigh County has three physiographic provinces—Ridge and Valley, New England and Piedmont. The Great Valley Section of the Ridge and Valley Province is characterized by forested, flat-topped ridges and fertile valleys. The southern portion of this section is underlain by carbonate bedrock, which has the most fertile soils in the region and encompasses the northern part of the region. Carbonate bedrock also has the potential for sinkhole formation, which can cause severe property damage, disruption of utilities and public services, damage to roadways, injury and loss of life. The Reading Prong of the New England Province, which includes South Mountain, consists of harder gneiss bedrock, and is characterized by high hills and ridges. The Triassic Lowland Section of the Piedmont Province, which encompasses the southern half of Lower Milford Township, has a mix of bedrock including quartz, conglomerate, sandstone and shale, and is characterized by rolling hills and low ridges.

AGRICULTURE

INTRODUCTION

Farming is an important part of the Southwestern Lehigh County economy and landscape. The region's farming resources include over 9,000 acres of farmland and, according to the *Assessment Report: Lehigh Valley Local Food Economy* (2014), two community gardens and two farmers' markets. Although farms are not natural landscapes, they can complement parks and natural areas by providing open space and adding to the pastoral scenery that residents treasure.

According to the U.S. Department of Agriculture's Census of Agriculture, farmland acreage and the number of farms in Lehigh County decreased by 47% and 71%, respectively, between 1954 and 2012. Land development has contributed significantly to this loss of farmland acreage. According to the Lehigh Valley Planning Commission's database, in 2015, Southwestern Lehigh County's municipalities approved residential and non-residential subdivision or land development projects for 197 acres (973 acres in Lehigh County), including land classified as agricultural/undeveloped by the Lehigh Valley Planning Commission.

FARMLAND PRESERVATION

Support for farmland preservation is evident from the 2016 Southwestern Lehigh County public opinion survey—85% of respondents feel it is extremely or very important to protect farmland. Pursuant to this goal, the *Comprehensive Plan The Lehigh Valley … 2030* recommends that approximately 25% (over 55,500 acres) of Lehigh County be preserved as agricultural land. Two techniques that can be used to preserve farmland are agricultural conservation easements and regulatory approaches.

- An agricultural conservation easement is a legal restriction on development that limits the use of land to agricultural purposes. Under the agricultural conservation easement program, the property owner sells the rights to develop land for nonagricultural purposes to the County, municipality or a conservancy while retaining ownership and continuing to farm the land.
- Municipalities, as provided by the Municipalities Planning Code, can preserve farmland through regulatory approaches. For example, local agricultural zoning can preserve farmland by designating areas where agriculture is the principal use and constrain non-agricultural development and uses.

AGRICULTURAL CONSERVATION EASEMENT PROGRAMS

Lehigh County established the Agricultural Land Preservation Board in 1989 for the primary purpose of preserving farmland in the County by developing and administering a program to purchase agricultural conservation easements. The program leverages County funding with matching funds, primarily from the Pennsylvania Agricultural Conservation Easement Purchase Program, which was established in 1988. Lehigh County provides funding to the farmland preservation program annually, if available. As of April 2016, the County has provided $20.1 million for farmland preservation under this program. Additional funding, which is used to pay for monitoring, is provided by interest on roll back taxes that are collected annually on Act

319 (Clean and Green Preferential Tax Assessment Program) properties. The County acquired its first agricultural conservation easement in July 1991 for the Graber Farm in Lower Milford Township. In Southwestern Lehigh County, 57 farms totaling 4,148 acres have been preserved, equating to 10% of the region's land area.

Currently, the County farmland preservation program has a backlog of 80 agricultural conservation easement applications, averaging 49 acres. Some properties may stay on the waiting list for years due to marginal property characteristics that result in a low score in the ranking system, which is a mix of state and County criteria. New applications each year are combined with applications on the waiting list, and then all applications are ranked together. In recent years, increased emphasis has been placed on the soil classification due to concerns that the program focused too much on clustering farms as a criteria. Soil classification now accounts for 50% of the ranking score. Small,

isolated farms with highly ranked soils can compete favorably for funding regardless of the size of the farm or the clustering. After the ranking scores are completed, the acquisitions are processed in the order of the ranking results.

The County program is employing innovative techniques to preserve more agricultural land. A Municipal Partnership Program, which is based on Northampton County's Township Partnership Program, is currently in the pilot phase. Through this program, municipalities can also provide funding, which provides more flexibility by allowing the municipality to increase the cap (currently $6,000) that the County will pay per acre for the easement. For 2016, Lower Macungie and Upper Milford townships have offered such funding ($150,000 and $50,000, respectively). In November of 2016, Upper Milford also approved by referendum an earned income tax that will provide funding for open space preservation for the next five years in the township. Also, the County has preserved about six farms working with Wildlands Conservancy, which preserves the natural area portion of the farms, with the agricultural portion being preserved through the farmland preservation program.

In addition to the County agricultural conservation easement program, federal funding is available through the U.S. Department of Agriculture, Natural Resources Conservation Service's Agricultural Conservation Easement Program, which is a portion of the Farm Bill re-instituted in 2014 (Agricultural Act of 2014). Over the years, the federal program has become more complex and has more requirements than the state program in terms of appraisal requirements, farming operations, land use restrictions, requirements for best management practices on the property and long-term monitoring. These more stringent federal terms have resulted in decreased interest in participation among property owners. Three farms in Lehigh County have been preserved under the federal program, none of which are in Southwestern Lehigh County's municipalities.

FARMING SUPPORT MECHANISMS

Support for farming in the region is important and is accomplished through a variety of means—properly equipping new and existing farmers for this challenging lifestyle, providing innovative opportunities to meet residents' fresh food needs, providing food systems support to farms and supporting opportunities for local farm products to be used locally.

Pennsylvania has measures that can be used to protect normal farming operations and practices. Under the authority of the Agricultural Security Area Law, municipalities are able to create and administer agricultural security areas to register farm properties. Agricultural Security Areas promote viable farming operations through the following measures:

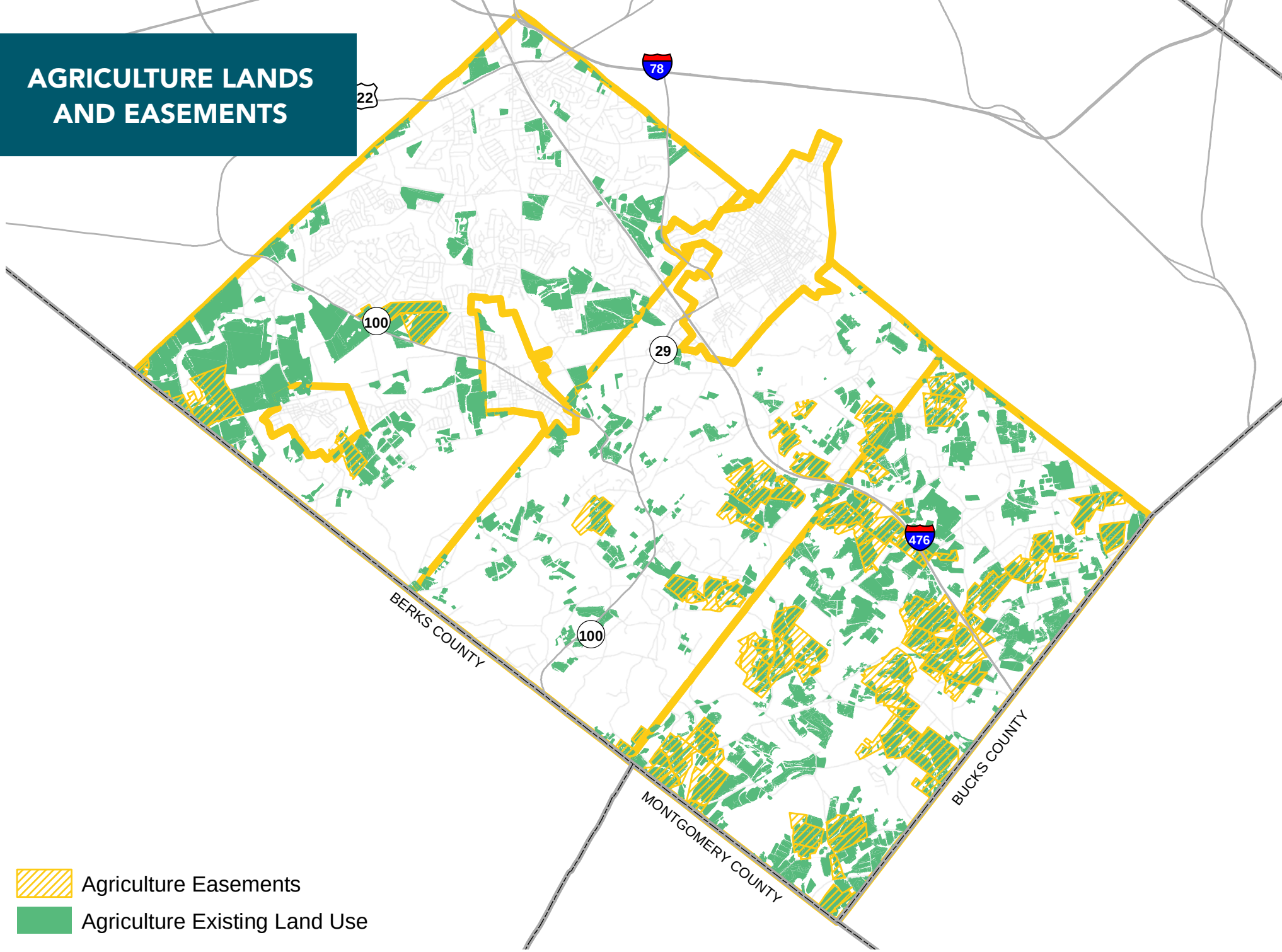
- Local government must encourage the farming of these properties by not enacting laws or ordinances that would restrict farm structures or farm practices, unless the laws or ordinances have a direct relationship to public health or safety.
- Local laws or ordinances must exclude from the definition of public nuisance any agricultural activity or operation conducted using normal farming operations within these areas if the agricultural activity or operation

does not have a direct relationship to public health and safety.

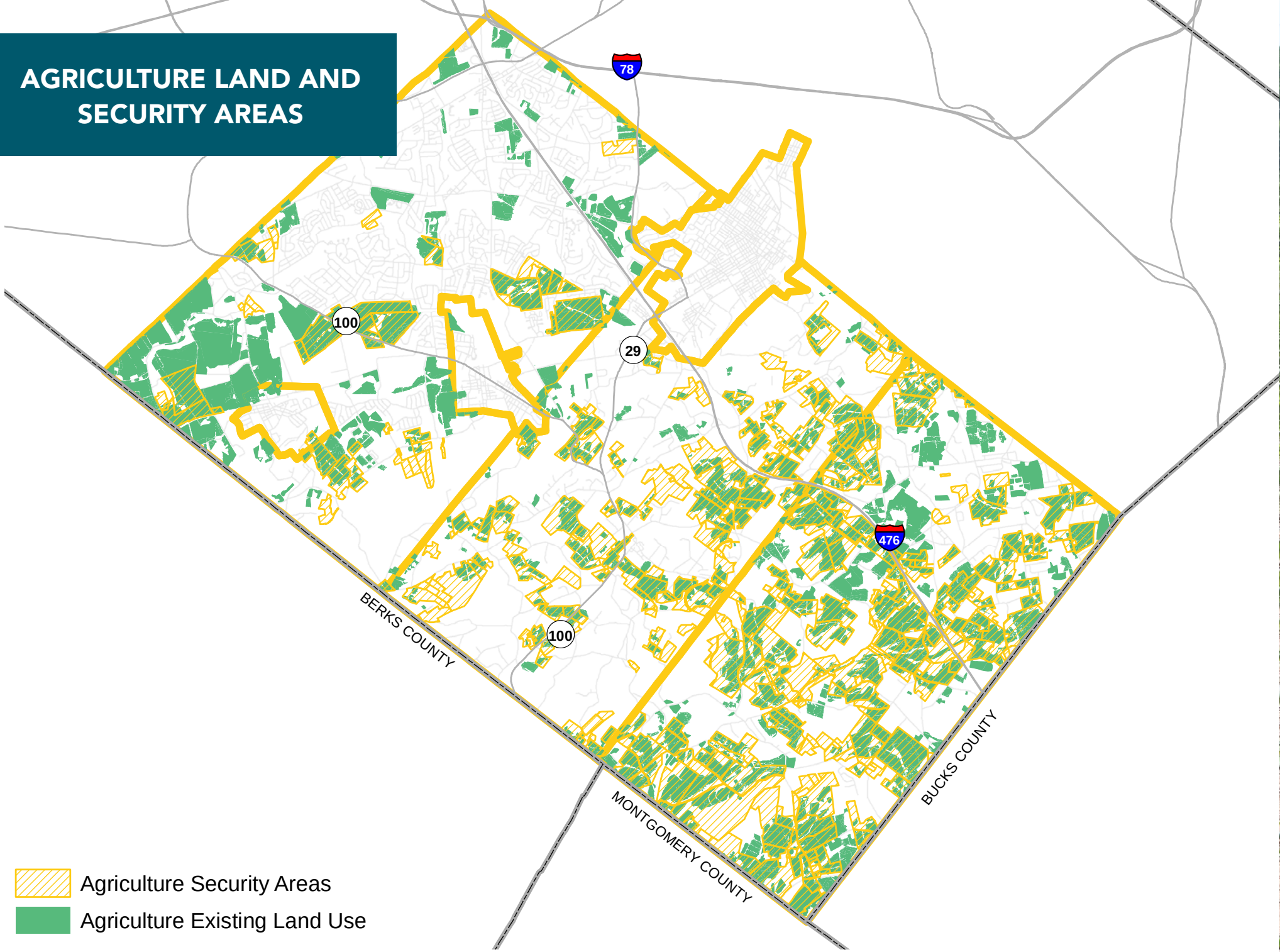
- The owner of land within these areas comprised of 500 or more acres may be eligible to apply through the county board to sell an agricultural conservation easement to the Commonwealth, the county, a local government unit or some combination thereof.

A single owner or group of owners can propose the creation of an Agricultural Security Area. A minimum of 250 acres, which does not need to be contiguous, is required. The municipalities should review the area boundaries every seven years and update if necessary. Southwestern Lehigh County's municipalities have 8,413 acres designated as agricultural security areas.

AGRICULTURE LANDS AND EASEMENTS



AGRICULTURE LAND AND SECURITY AREAS



SLIDE RULES
RULES FOR THE POOL SLIDE:

SUBJECT AREAS: COMMUNITY UTILITIES AND SERVICES

INTRODUCTION

Community facilities and services are core elements of a community and often reflect the quality and character of an area as a place to live, work and play. A variety of entities can provide these utilities and services including governing bodies, authorities, school districts and private agencies. Southwestern Lehigh County's ability to provide the utilities and services to its residents in an effective and efficient manner will determine the direction of future growth.

SEWAGE DISPOSAL

Municipalities are responsible for assuring that safe and reliable sewage disposal is provided within their boundaries. To accomplish this, municipalities are required to prepare official sewage facilities plans under the Pennsylvania Sewage Facilities Act, commonly called Act 537. These plans must show the current and future needs of the municipality and assess wastewater facility choices to meet these needs. Each municipality in Southwestern Lehigh County has an official sewage facilities plan, with adoption dates ranging from 1971 to 2012.

Two public sewage treatment plants—one in the City of Allentown and the other in Lower Milford Township—provide sewage disposal service in the region. The Allentown sewage treatment plant serves portions of the boroughs of Alburtis, Macungie and Emmaus and the townships of Lower Macungie and Upper Milford Township. This system is owned by the City of Allentown; however, Lehigh County Authority began operation of the facility in 2013 per a lease agreement with the City. The Lower Milford Township sewage treatment plant, which only serves the Village of Limeport, is owned and operated by the Township. Remaining portions of the region rely on on-lot sewage disposal systems.

Lehigh County Authority has indicated they may require an additional four million gallons per day of treatment capacity for future growth needs in western Lehigh County. With all allocation accounted for at the Allentown sewage treatment plant, this may require plant expansion or other disposal alternatives. The Lehigh County Authority and Allentown have been working on a joint Act 537 Plan to account for this potential need.

WATER SUPPLY

The protection of water resources is a major priority of the regional water supply plan. Overall, water of adequate quality and quantity is available to meet current demands in Southwestern Lehigh County. However, the ability to provide a safe, reliable water supply could be adversely impacted without careful planning. Water suppliers need to have emergency plans, establish emergency interconnections with other systems and implement water source protection programs to assure a safe, reliable water supply.

The four community water systems listed below provide water service in the area. Additionally, there are three central water systems serving specific subdivisions in Lower Macungie, Lower Milford and Upper Milford townships and one central system in Lower Macungie Township serving a mobile home park. Remaining portions of the region rely on on-lot water supply.

- The Alburtis Borough water system serves most of the borough and a small portion of Lower Macungie Township.
- The Emmaus Borough water system provides direct service within the borough.
- Lehigh County Authority provides water service to the majority of Lower Macungie Township and small portions of Alburtis Borough, Macungie Borough and Upper and Lower Milford Townships.
- The Macungie Borough water system serves most of the borough, small portions of Lower Macungie Township and a few homes in Upper Milford Township.
- The Red Hill Water Authority serves a portion of Upper Milford Townships.

Water system replacement costs are anticipated to become a serious problem in older urban areas. Water suppliers will need to establish appropriate facilities monitoring and capital replacement programs to meet these challenges in the future. Providing service to existing and future customers in an adequate and cost-effective way often requires agreements

between municipalities. The agreements may be for routine water service or may include provisions to deal with emergencies.

- Changes to the Pennsylvania Municipalities Planning Code in 2000 require municipal and county comprehensive plans to contain a plan for the reliable supply of water. The Municipalities Planning Code states that:
- Lawful activities such as extraction of minerals impact water supply sources and such activities are governed by statutes regulating mineral extraction that specify replacement and restoration of water supplies affected by such activities.
- Commercial agriculture production also impacts water supply sources.

Through its visions, strategies and actions, this plan promotes the provision of adequate supplies of water of good quality to meet the existing and future needs of the area.

STORMWATER MANAGEMENT

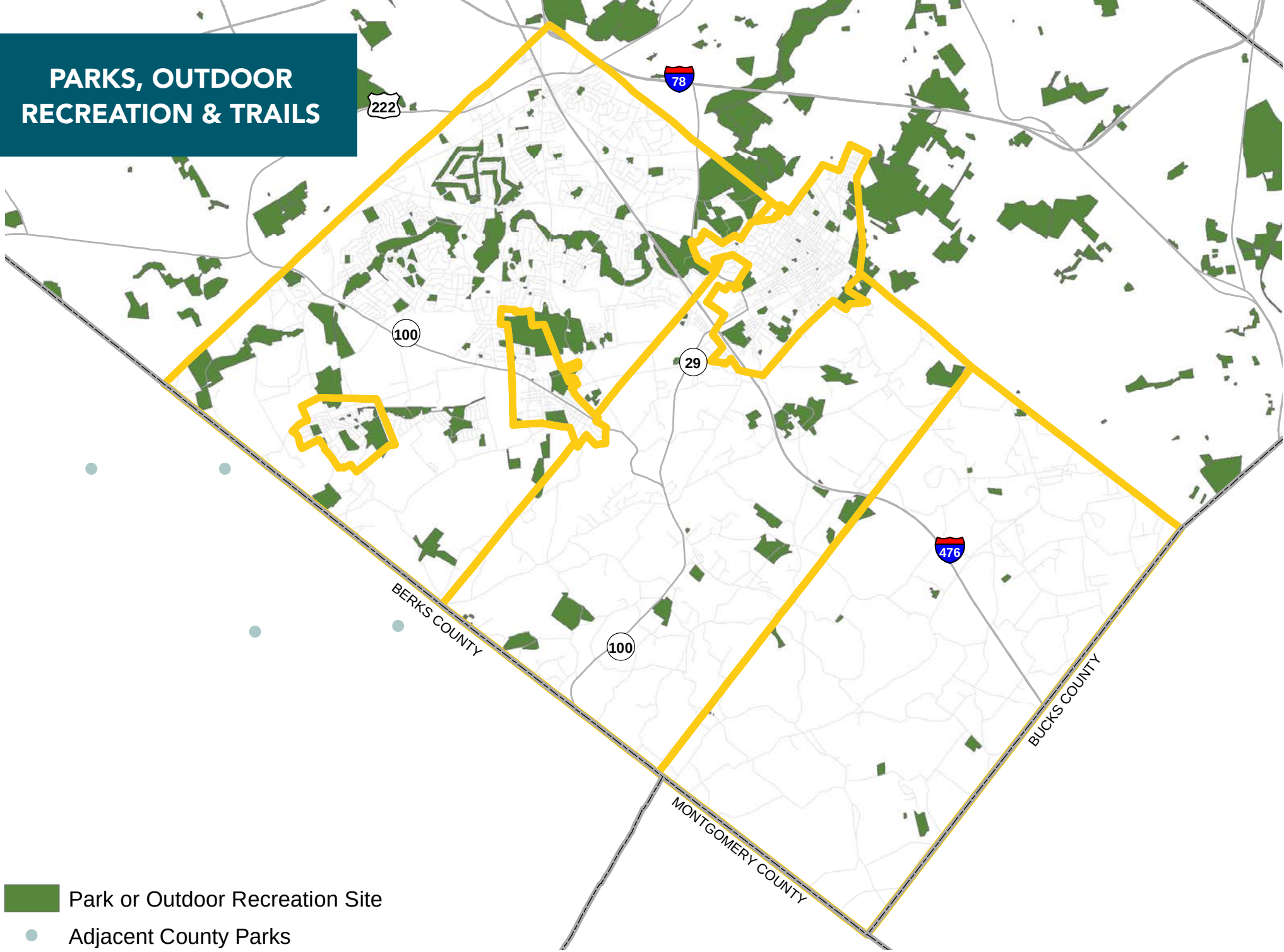
Within the Southwestern Lehigh County region, stormwater management for new development is accomplished through implementation of ordinances created at the county level and enforced by local municipalities. The ordinances are created under the Pennsylvania Stormwater Management Act, commonly referred to as Act 167. Lehigh County and the Lehigh Valley Planning Commission created the Act 167 plans for the Little Lehigh Creek, Saucon Creek and Perkiomen Creek Headwaters. The plans and ordinances provide water quantity and water quality controls.

To comply with requirements of the National Pollutant Discharge Elimination System (NPDES) regulations from the Environmental Protection Agency, all six municipalities in Southwestern Lehigh County must adopt and implement an ordinance that requires the use of stormwater Best Management Practices to reduce or prevent the discharge of pollutants into receiving waters. Each of the three watershed plans listed above provide a model municipal ordinance that meets this criteria that has been adopted by the municipalities.

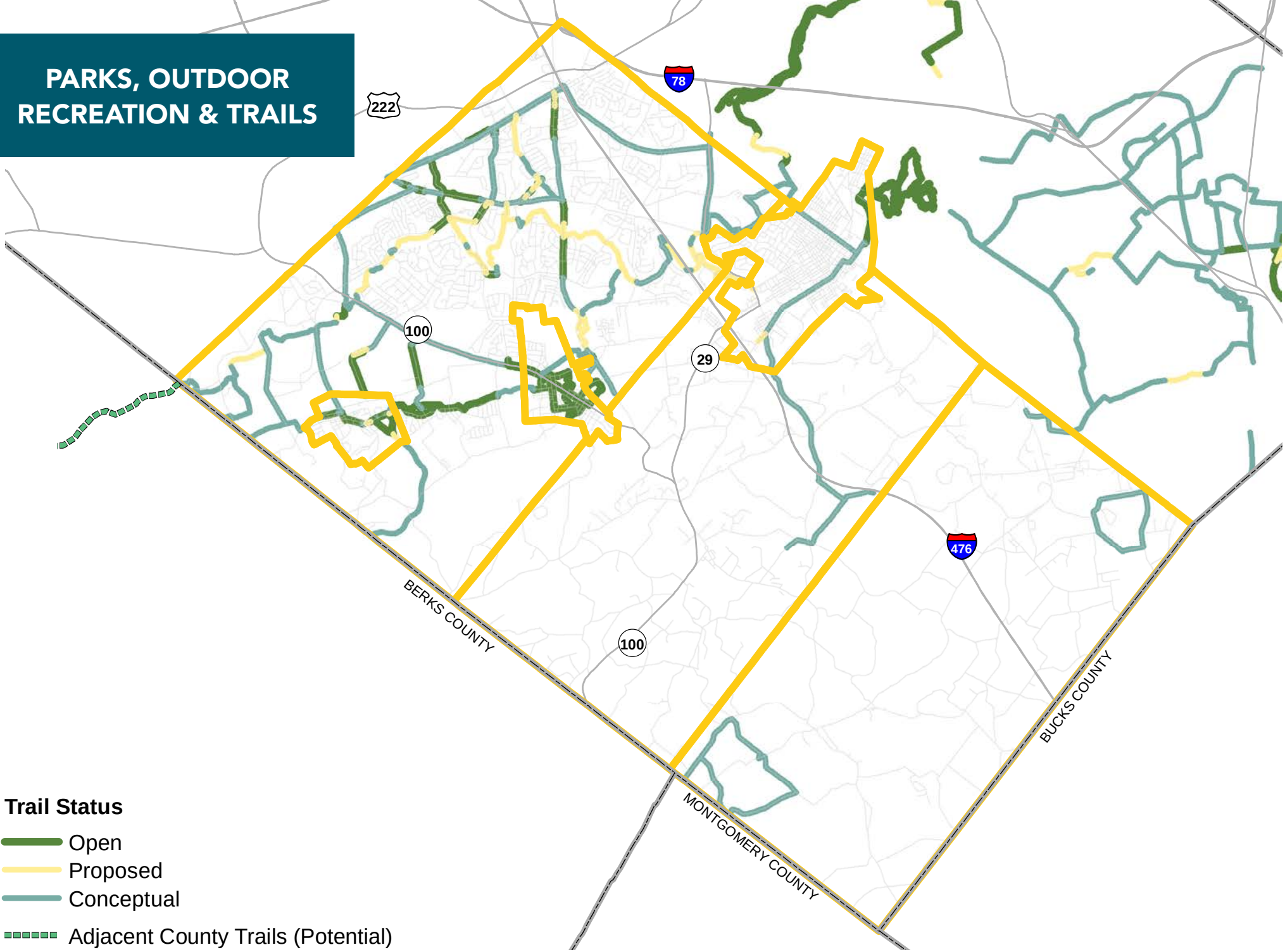
PARKS AND RECREATION

A wide variety of parks, trails, natural areas and other outdoor recreation sites exist in Southwestern Lehigh County. The region's recreational opportunities—111 sites totaling 2,638 acres—are owned by municipalities, Lehigh County, school districts and private entities. Seventy percent of these sites are open to the public, though some may have limitations to their use (e.g., public school properties); the remaining sites are not open to the public (e.g., homeowner's association recreation areas, private school properties). Southwestern Lehigh County also has 43 natural resource and greenspace sites totaling approximately 550 acres. The majority of these sites are owned by the municipalities and currently do not have any recreational facilities.

PARKS, OUTDOOR RECREATION & TRAILS



PARKS, OUTDOOR RECREATION & TRAILS



LIBRARY SERVICES AND EDUCATIONAL RESOURCES

Three public libraries serve the region: Emmaus Public Library serving the boroughs of Emmaus and Macungie and Upper Milford Township; the Lower Macungie Library serving Lower Macungie Township and Alburtis Borough; and the Southern Lehigh Public Library serving Lower Milford Township.

Two school districts serve the region. East Penn School District serves the boroughs of Alburtis, Emmaus and Macungie and the townships of Lower Macungie and Upper Milford and has a K-12 enrollment of 8,071 students. Southern Lehigh School District serves Lower Milford Township and has a K-12 enrollment of 3,104 students.

SOLID WASTE DISPOSAL

Lehigh County has prepared a solid waste plan to meet state requirements. The most recent plan for Lehigh County is from 2009, with revisions in 2012 and 2013. The County currently has signed capacity agreements with 24 permitted facilities throughout the Commonwealth. The County plan assures disposal capacity through 2020.

In Southwestern Lehigh County, Emmaus Borough, Lower Macungie Township and Upper Milford Township are mandated by state law to implement a curbside collection program. Upper Milford Township and Lower Milford Township have curbside recycling through a resident's contracted waste hauler. While not mandated, the boroughs of Alburtis and Macungie have curbside collection programs.

COMMUNITY EMERGENCY SERVICES

The boroughs of Alburtis, Emmaus and Macungie have local police departments. Police services in the townships of Lower Macungie, Upper Milford and Lower Milford are provided by the Pennsylvania State Police.

The Emmaus Ambulance Corps provides coverage for Emmaus Borough and the eastern portions of Upper Milford Township. The Macungie Ambulance Corps provides coverage for Alburtis and Macungie boroughs, Lower Macungie Township and Western Upper Milford Township. Centronia Ambulance also covers Upper Milford township. The Macungie Ambulance Corps, Upper Saucon Ambulance Corps and Upper Perkiomen Valley Ambulance Corps provide coverage for Lower Milford Township.

Emmaus' Fire Department consists of staff (fire chief) and paid on-call volunteers and operates from a single station. The remaining municipalities' fire services are all volunteer. These services include: Lower Macungie Fire Department (Wescosville and Brandywine Fire Stations), Alburtis Volunteer

Fire Department, Macungie Volunteer Fire Department, Lower Milford Volunteer Fire Company #1, Upper Milford Western District Fire Company and Citizens' Fire Company of Upper Milford Township.

According to the National Fire Protection Association, the majority (about 66%) of fire departments in the U.S. are entirely volunteer, with another 19% being mostly volunteer. About 70% of all firefighters are volunteer. Nationally, volunteer firefighters donate an estimated $140 billion annually (2011) of their time, a huge cost savings to communities across the country. The number of volunteer firefighters is decreasing while their age is increasing. A number of challenges related to recruitment and retention of volunteers exists, including time demands, training requirements, increasing call volume, leadership problems, federal legislation and regulations, among others.

Red Earth
FARM
C.S.A.
You Choose. We Deliver.
www.redearthfarm.org
Hardware

SUBJECT AREAS: ECONOMIC DEVELOPMENT

INTRODUCTION

Broadly defined, economic development refers to the process of local wealth creation, manifested by growth in jobs, income and investment, and supported by improvements in the social, built and natural environment. To ensure the continued growth and health of Southwestern Lehigh County's economy, plan proposals and strategies must focus on bolstering the region's competitive advantages and maintaining a regional balance of existing and future land uses. Specific actions that can advance these goals include strengthening the region's downtowns (the boroughs of Alburtis, Emmaus and Macungie, or other crossroads villages in the townships), supporting its strong natural assets through vibrant agricultural and outdoor economies, and addressing evolving economic sectors like retail, warehousing and manufacturing.

DOWNTOWNS

Economically vibrant downtowns function most effectively as walkable, mixed-use nodes of density. Downtowns can also serve as effective anchors to larger transportation and, in turn, economic networks. Encouraging the adaptive reuse of historic structures and existing vacant buildings over greenfield development can help protect and support the economic viability of these urban centers. Downtown business organizations can likewise play a role in coordinating the development of context sensitive marketing strategies and promoting suitable levels of parking in these areas. Finally, regional collaboration is vital in coordinating land use, transportation and economic development strategies among multiple municipalities.

AGRICULTURAL AND OUTDOOR ECONOMIES

Balance is a key concept to the future economic health of Southwestern Lehigh County, as demonstrated by the region's strong desire to preserve rural and agricultural land uses in concert with its support for local downtowns. In assessing strategies to improve the region's quality of life, 74% of residents rate the strategy of developing near existing infrastructure to conserve land elsewhere as either extremely or very important; 82% of respondents see supporting farming as an industry as extremely or very important. To support agriculture as an economic industry, municipalities should foster the maximization of land capability. Additional strategies to promote a more viable agricultural economy include working with other people and entities to provide training, increasing efficiency in new farming approaches, and encouraging farming related businesses to locate and expand within Southwestern Lehigh County.

In addition to the region's agricultural economy, Southwestern Lehigh County possesses strong natural assets in the form of open space, parks, trails, greenways and blueways. The protection and promotion of these assets can offer real economic benefits for a community, as described in the Lehigh Valley

Planning Commission's Lehigh Valley Return on Environment report. Southwestern Lehigh County can further solidify its place as a regional leader in this area, and leverage an already strong outdoor culture, through the attraction of recreation-centric businesses and promotion of tourism activities that complement Southwestern Lehigh County's natural assets, heritage and culture. The support of this sector is critical to promoting a balanced, diversified economic climate as it capitalizes on a true strength of the area to accompany the advancement of more intense land uses in local downtowns.

EVOLVING ECONOMIC SECTORS

Maintaining a balance of uses and acknowledging the saturation of development is important to supporting an agricultural economy, uplifting the downtowns and providing employment opportunity for current and future residents of Southwestern Lehigh County. Eighty-five percent of respondents feel that the pace of new development should decrease or stay the same in the Southwestern Lehigh County communities. Warehousing, strip mall and big-box retail received the strongest opposition among types of new development. The survey also indicated that retention of current businesses should be a priority for

community leaders and residents, with 79% of respondents identifying this strategy as very or extremely important to improving the region's quality of life. Any new development should target the parts of the communities that show the greatest evidence of disinvestment. This includes existing buildings, facilities and areas where infrastructure (such as roads, water and sewer) already exist.

While manufacturing and warehousing may appear similar in building form, manufacturing is more desirable to residents, as 44% of respondents indicate they strongly or somewhat support the new development of manufacturing, while 12% of respondents indicate they strongly or somewhat support the new development of warehousing in Southwestern Lehigh County. To support the growth of jobs in the manufacturing industry, communities can utilize local, regional and state level programs, such as tax or financing incentives, to attract manufacturing businesses. At the same time, by establishing site design guidelines for large freight facilities, whether manufacturing or warehousing, communities can retain and protect Southwestern Lehigh County's unique sense of place and character. The community should also encourage clustered development through the creation of incentives for redevelopment and reuse of existing infrastructure and facilities. Communities should address routing and parking of the subsequent freight traffic to minimize the undesirable effects of tractor trailer traffic on residential streets.

JOB DENSITY

78
222
100
29
476
100
BERKS COUNTY
MONTGOMERY COUNTY
BUCKS COUNTY
5 - 153 Jobs/Sq. Mile
154 - 598 Jobs/Sq. Mile
599 - 1,339 Jobs/Sq. Mile
1,340 - 2,377 Jobs/Sq. Mile
2,378 - 3,712 Jobs/Sq. Mile

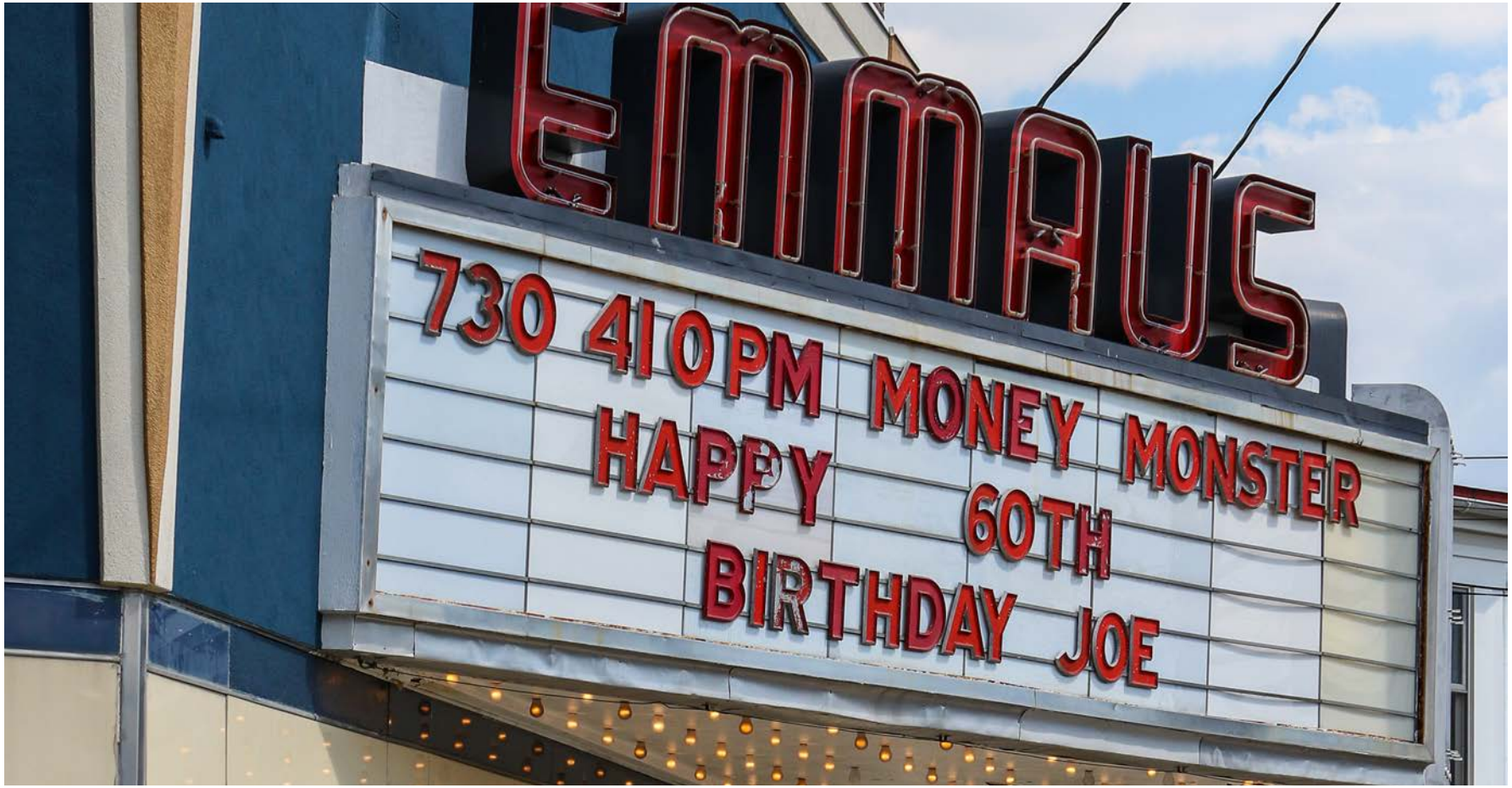
EMMAUS
ROTARY CLUB
HARRY C. TREXLER
TRUST

SUBJECT AREAS: COMMUNITY DESIGN AND HISTORIC RESOURCES

INTRODUCTION

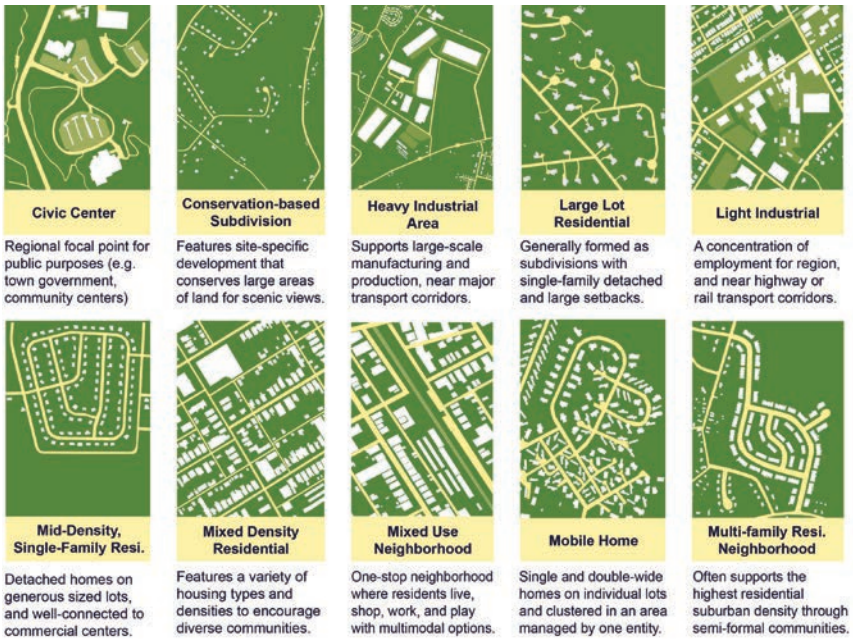
Some of the oldest and most culturally and historically significant places in the Lehigh Valley are found in Southwestern Lehigh County. In fact, Lehigh County was settled from the southwest, or current day Lower Milford Township, north into Upper Milford Township, Alburtis Borough and Lower Macungie Township, and northeast into the boroughs of Macungie and Emmaus beginning in 1682. Prior to the settlement of European people in Southwestern Lehigh County, the area served as a critical natural environment supporting a large population of bear, fish and other wildlife that the native people hunted. Archaeological and historic resources are abundant, including Minsi or Delaware Tribe settlements, early European farmsteads and even mid- and late-nineteenth century industrial remnants. Above and below ground cultural and historical resources are built into the ethos of Southwestern Lehigh County and are categorized as essential community values and place defining elements. These critical cultural and historic landscapes are preserved, enhanced and evolved through good community design.

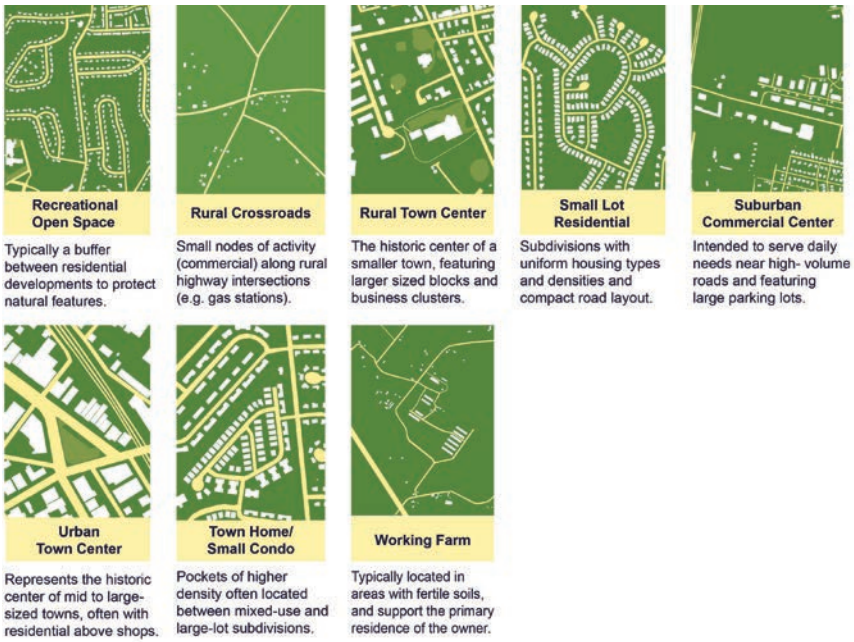
Community design combines aspects of historic preservation, archaeology, planning, architecture, landscape architecture, public works, transportation systems and public art to create dynamic environments. Community design and form affect movement of people, goods and services, human interactions with the built and natural environments and human health. Southwestern Lehigh County offers a great variety of place and building types, and densities that serve as a framework for community development and can inform guidelines for new construction and redevelopment.



BALANCING TRADITIONAL COMMUNITY AND POST WORLD WAR II FORM

Community form is a term that describes the physical attributes of a traditional place or the early planned portions of a municipality. Emmaus, Alburtis and Macungie boroughs, and crossroads villages, such as East Texas in Lower Macungie Township, Limeport and Hosensack in Lower Milford Township, and Zionsville in Upper Milford Township, are all examples of "historic core" communities with a traditional form. This form generally is characterized by rectangular blocks connected by avenues, streets and ribbon-like arterials along which people and commerce move. These connections, combined with the presence of closely grouped buildings with frontages in a line,





possibly linked by sidewalks and amenities like parks and ground floor storefront buildings from different eras, create a sense of permanence and place. These places can be urban, suburban and even rural, and exist throughout Southwestern Lehigh County.

Generally, traditional community form was a development standard from the Colonial Era through the 1940s. After World War II, the traditional community form began to evolve as automobiles allowed people to travel further faster. The scale of place began to evolve into less of a balanced approach to walkability, bikeability and driveability. Buildings and neighborhoods moved farther and farther apart, land uses segregated and less of a focus on the connections between developments became prominent.

The Southwestern Lehigh County communities are collectively refocusing on balancing new and more traditional forms of development. This blended, evolved community form consists of a network of streets with a pattern of lower-density residential neighborhoods with higher-density, mixed-use corridors and nodes. Pedestrian-scale buildings and street designs that reflect the presence of pedestrians as well as automobiles, and in certain places transit and bicycles coordinated with low-scale, spread-out buildings, is a clear desire of the public and local leaders. Variety emerged as a major theme in the community

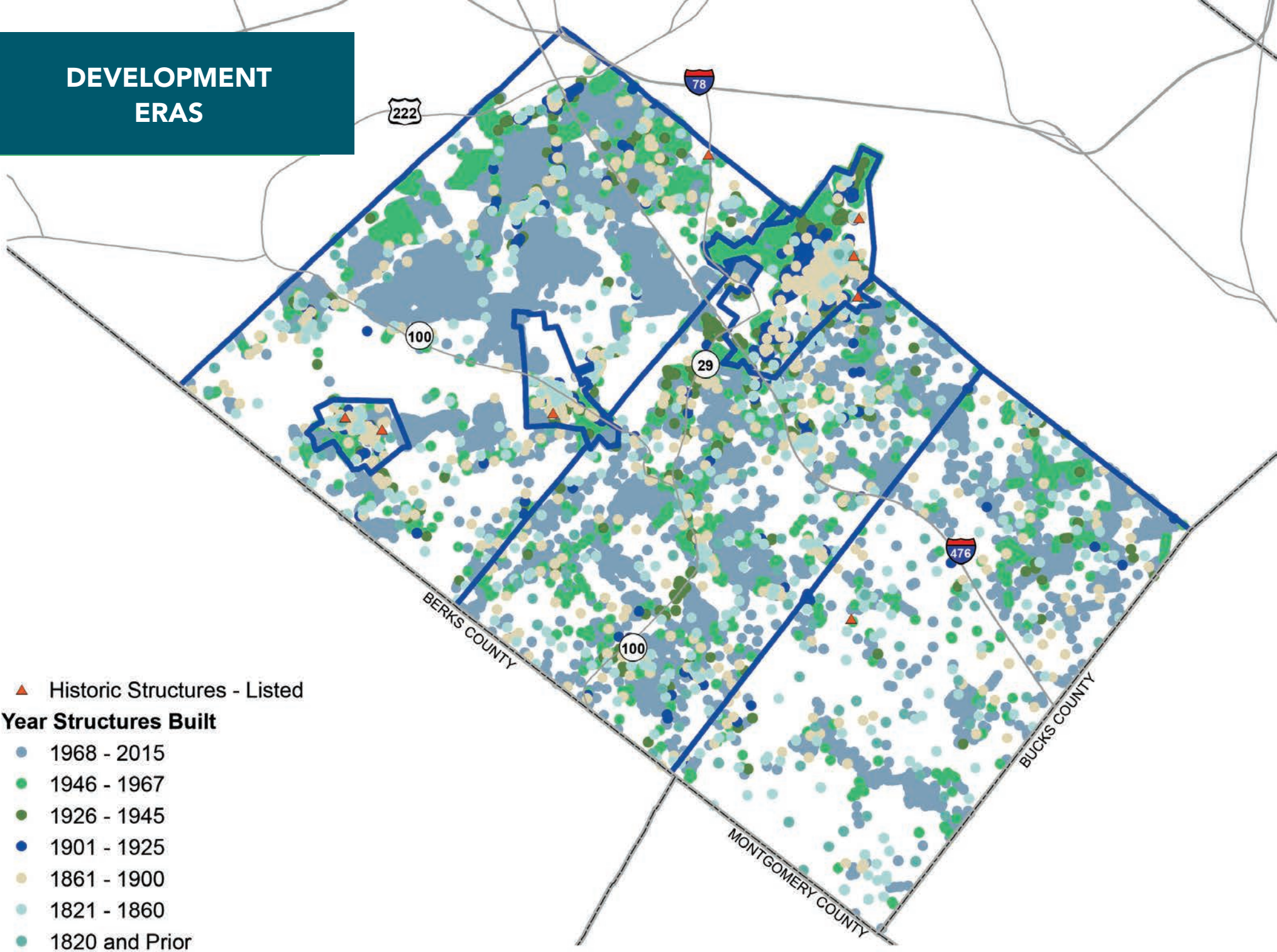
GOOD EXAMPLES OF "PLACES"

1. Wide sidewalks encourage pedestrian and biking use
2. Existing structures were re-purposed, painted with distinct artwork and link to the character and history of the local area.
3. Its location increases activity next to areas less in use, therefore decreasing safety issues.
4. Informal seating encourages passerby and users of the internal space to linger, thus generating activity and vitality.
5. Landscaping softens the industrial appearance of the area and makes it more welcoming.
6. The space is flexible and can accommodate formal or informal, private or public events. It connects the inside and outside.
7. Designated parking is made available.
8. It creates a "meeting point" or destination in what would have otherwise been an overlooked space.

meetings held throughout the planning process. This variety of community form within Southwestern Lehigh County can benefit the region by allowing it to be resilient and responsive to future population, community and economic changes.

The foundation of community variety is in collaborative support across place types, allowing for the protection of historic resources and sense of place, and providing a host of efficiencies that ultimately shelter the tax base, capitalize on existing public investment from roads and bridges to parks and water systems, and cluster development to safeguard critical natural areas and community-identified priority industries, including agricultural and locally-owned borough retail and service operations.

DEVELOPMENT ERAS



SUBJECT AREAS: HOUSING

INTRODUCTION

Not surprisingly, housing supply correlates powerfully to population change, which, in turn, often serves as a powerful indicator of a community's overall quality of life. Simply put, if a place offers a high quality of life, demand for housing typically will be high, because people want to move there or remain there. Places that wish to manage out-of-control growth should look carefully at their residential zoning laws, which can heavily influence new housing construction. However, overly restrictive regulations in areas with high demand can constrain supply to the point of pushing home values to unreasonable levels. What constitutes "reasonable" will vary greatly across a region, but if long-term homeowners cannot keep up with property taxes, the results for a municipality could be disastrous. Furthermore, excessive regulations could run afoul of the federal Fair Housing Act (or Pennsylvania's Human Relations Act), especially if those rules or standards substantially burden certain individuals on the basis of race, national origin, religion, sex, color, disability, familial status or other statutorily defined protected classes.

Housing in Southwestern Lehigh County deserves special consideration, not just for the provision of new residential units, but for the maintenance of existing housing stock. Appropriate, reasonable housing regulations are essential in both ensuring that newcomers have the opportunity to live in a community and that the aesthetics of the most cherished older construction continue into contemporary development practices, all while ensuring that dwellings across a variety of types (single family, apartment, condominium) offer the modern amenities that will allow them to remain attractive real estate for future generations.

HOUSING CONSIDERATIONS IN SOUTHWESTERN LEHIGH COUNTY

Southwestern Lehigh County boasts generally above-average homeownership rates, as well as stable home values. Even accounting for the severe recession and collapse of the real estate market from 2008 to 2012, the high demand for housing in the region has supported higher median home sale prices than in the county as a whole over most of the last decade. Southwestern Lehigh County offers housing, both new and old, though post-recession development has been modest. Vacancy rates in the region are also lower than in the county.

Despite this, during the community outreach for the Southwestern Lehigh County Comprehensive Plan, housing generated more modest rates of participation and discussion than topics like land use or transportation. Survey responses clearly favored farmland protection over aggressive housing development, but they also emphasized expanding homeownership options over widespread growth in rental units. There remains a concern that any shift in demand could result in a glut of quickly constructed housing or, alternatively, a sudden rise in vacancy rates. Furthermore, supporting Census data suggests that several of the Southwestern Lehigh County municipalities have a high proportion of their households that are spending more than 30% (or even more than 35%) of their income on their mortgage or rent. Lastly, recent Supreme Court decisions have shed more light on communities that may fail to comply with the Fair Housing Act or similar state laws, which require zoning, subdivision and land development, and zoning administration proceedings to be free of discrimination toward the Act's protected classes: race, color, religion, sex, disability, familial status or national origin. In light of these important issues, housing must receive prime consideration when developing comprehensive land use visions and strategies.

Through a careful review of existing conditions, community discussions and survey results, the following housing-related themes have emerged:

Quality of Housing Supply

While the development community will always strive to meet demand, construction standards should remain high to ensure that the housing stock will remain viable and desirable for future generations and that the visual character of the region is preserved. Monitoring and managing the condition of existing housing is also essential for a successful housing quality preservation strategy.

Variety of Housing Types

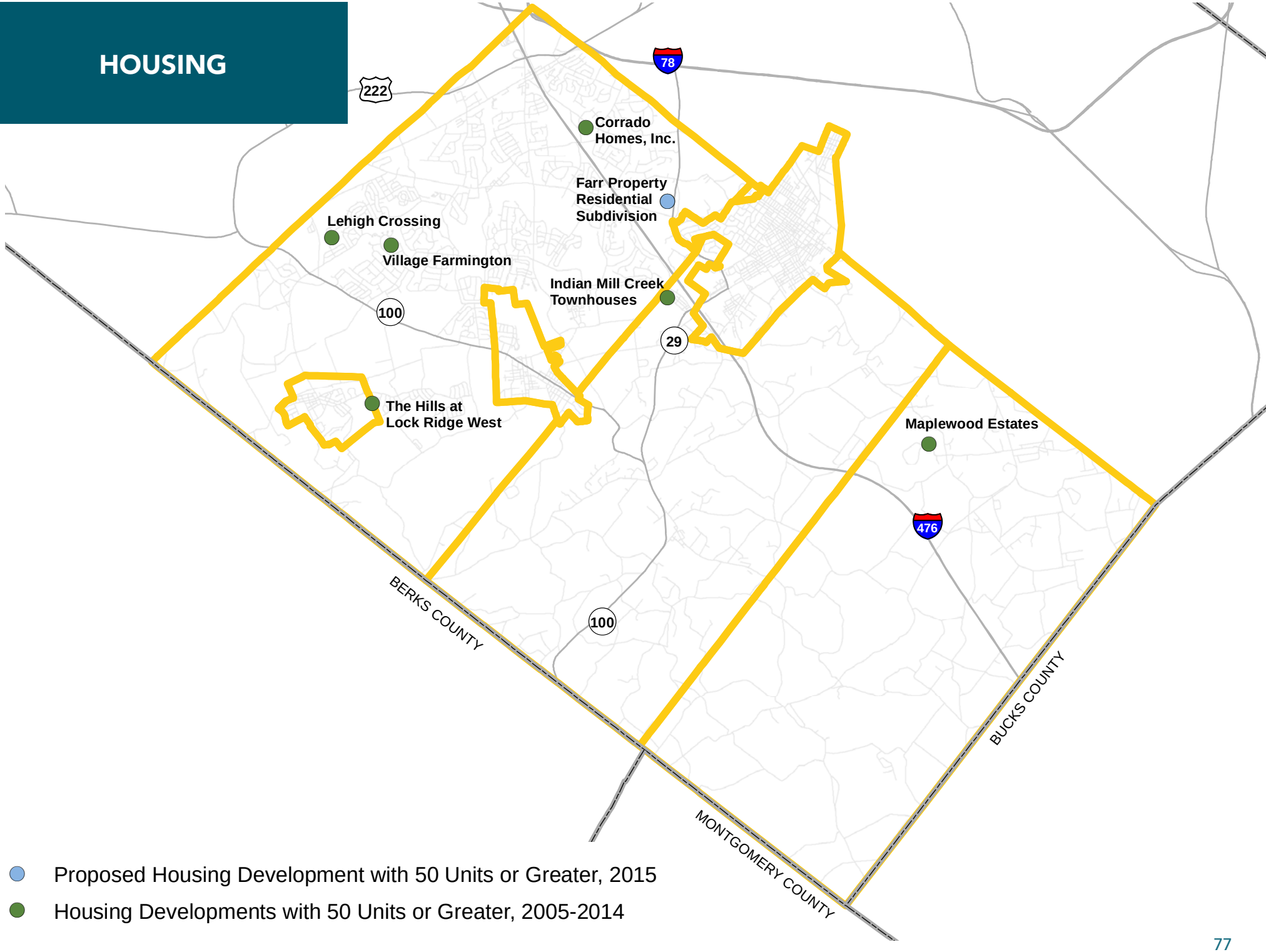
The region can better adapt to shifting tastes and household demands by providing greater variety in housing offerings, helping to prevent oversupply of a certain type, which can result in a repetitious appearance and a housing stock that generally cannot adapt to shifting tastes or demands. By offering a range of home values, the region can promote widespread affordability and opportunities for homeownership. However, promotion of homeownership must be balanced with a recognition that rental units remain an essential component of housing. Finally, the region must anticipate future demand for current development types, such as age-restricted housing developments. Certain

development types may reach a saturation point where the supply significantly outpaces long-range demand.

Distribution and Sustainability

Housing development should be mindful of natural resources and valuable farmland and be concentrated where infrastructure exists to support it. Particular efforts should preserve prime agricultural areas from land-intensive new residential subdivisions. Housing development should be monitored for its impacts on demand for local government services, including water and sewer service, public schools, transportation resources, and parks. In communities that lack a diversity of taxable land uses, the costs of funding municipal and school district services can fall disproportionately onto homeowners. This increased tax burden on homeowners ultimately drives up the cost of homeownership. The region can add resiliency to its tax base by encouraging a healthy mix of uses and fostering appropriately scaled non-residential businesses.

HOUSING



- Proposed Housing Development with 50 Units or Greater, 2015
- Housing Developments with 50 Units or Greater, 2005-2014

cervélo

SUBJECT AREAS: TRANSPORTATION

INTRODUCTION

Southwestern Lehigh County's transportation network includes roads, railways, sidewalks, bike lanes and transit systems serving a mix of residential, commercial and industrial land uses. This network faces numerous challenges serving existing commute patterns as well as anticipated population growth. Successfully addressing current and future congestion will require the development of an integrated and well-connected street network along with alternative modes of travel.

FREIGHT

Freight traffic and its related impacts emerged as the number one transportation priority in survey results and generated the most discussion during the planning process. Participants specifically cited the need to reduce freight traffic on local roads. Warehousing facilities exist throughout the region, typically bringing with them significant truck traffic as well as routing and parking issues. Current development patterns suggest an increase in truck trips as a proportion of future daily traffic volumes. Addressing increased freight-related congestion will require more efficient integration of truck movements into the transportation network.

Southwestern Lehigh County also hosts a major Class One Railroad in Norfolk Southern. This line moves freight on a fixed-system and has raised issues related to material storage, general safety and congestion inhibition, particularly along at-grade crossings. Potential solutions to these issues include neighborhood buffers, grade separated interchanges, at-grade crossing improvements and hazardous material storage near rail lines.

ROAD NETWORK

Any expansion of the roadway network should consider how neighborhoods connect to one another as well as to local destinations such as schools, parks, and shopping areas. A well-designed and well-connected street network can provide numerous mobility benefits and increase travel options for drivers, bicyclists, and pedestrians. An approach that incorporates traffic calming measures and minimizes cut-through

and tractor trailer traffic on residential streets can yield dividends in terms of efficient traffic movement and quality of life. Traffic calming concepts can range from low-cost improvements and signage to larger infrastructure improvements.

While it is important to plan ahead for future infrastructure improvements, managing and maintaining existing road and bridge assets is just as important in addressing existing and anticipated transportation needs. Prioritizing the maintenance and replacement of bridge and road infrastructure should therefore be an integral component of any roadway network strategy. Using the two measures commonly used to indicate road integrity—the International Roughness Index (IRI) and Overall Pavement Index (OPI)—road conditions in Southwestern Lehigh County fair well in comparison to county-wide rates.

The average age of a bridge in the Lehigh Valley is approximately 50 years old, and maintenance is an ongoing priority at the local, state and national levels. Southwestern Lehigh County trails Lehigh County as a whole with respect to overall bridge condition. The primary means of addressing bridges in less than satisfactory condition are through closures or clearly posted restrictions on the maximum gross weight allowed for vehicles using the bridges. Such weight restrictions can serve as an interim measure to prolong the life of a bridge structure and allow for safe passage. A particularly high percentage of bridges in Southwestern Lehigh County are weight restricted, suggesting that attention should be directed toward these infrastructure improvements.

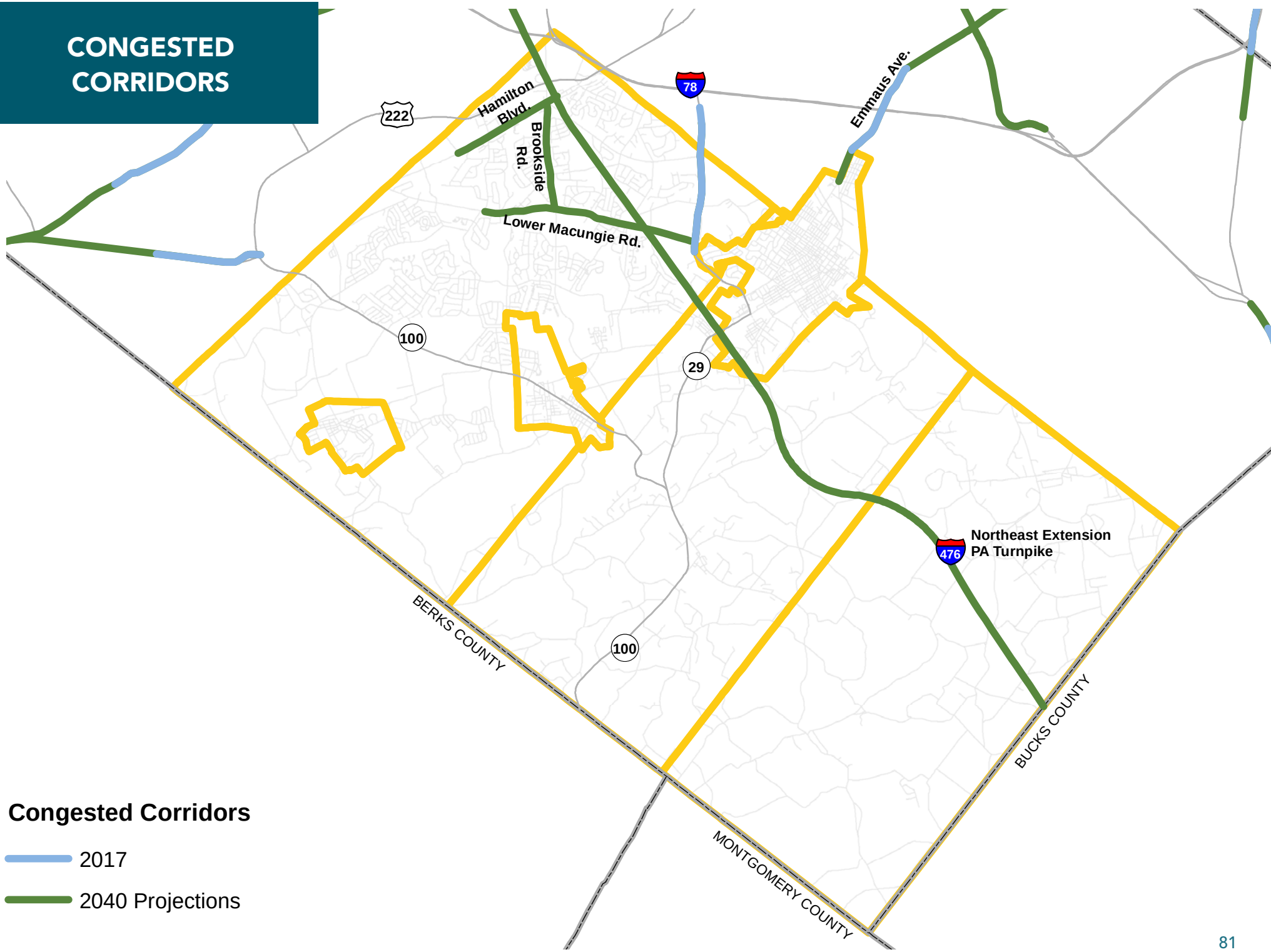
Bridge condition may be classified as:

- **Open** – A bridge that allows for the passage of vehicular and pedestrian traffic, though vehicular weight limits may be posted on open bridges with structural deficiencies, which would restrict vehicle access by size.
- **Closed** – A bridge that is restricted to all vehicular access due to extreme structural deficiencies, potentially resulting in lengthy travel detours.
- **Structurally Deficient** – A bridge that typically requires significant maintenance and repair to remain in service, and eventual rehabilitation or replacement, to address deficiencies.
- **Functionally Obsolete** – A bridge that does not meet current design standards and becomes an impediment to the system network.

Within the Southwestern Lehigh County planning area, the following highway project and three bridge projects are currently funded and programmed in the *2015-2018 Transportation Improvement Program*:

- **Route 222 Median Barrier** (Upper and Lower Macungie townships) – Installation of high tension median barrier from approximately Grim Road to North Brookside Road.
- **SR 29/100 Bridge over Indian Creek** (Upper Milford Township) – Replacement/rehabilitation of the bridge carrying PA 29/100 (Chestnut Street) over Indian Creek.
- **SR 29/Reading Railroad Bridge** (Upper Milford Township) – Replacement/rehabilitation of the bridge

CONGESTED CORRIDORS



carrying PA 29/100 (Chestnut Street) over the Reading Railroad.

- **SR 2029 Bridge over Saucon Creek Tributary** (Lower Milford Township) – Replacement/rehabilitation of the bridge carrying State Route 2029 (Limeport Pike) over the tributary to Saucon Creek.

BIKE/PED

STRUCTURALLY DEFICIENT BRIDGES

Location	State	Local	All
Southwestern Lehigh County	21.7%	53.3%	29.5%
Lehigh County	14.2%	32.2%	19.3%

FUNCTIONALLY OBSOLETE BRIDGES

Location	State	Local	All
Southwestern Lehigh County	21.7%	20.0%	21.3%
Lehigh County	25.2%	14.4%	22.1%

WEIGHT RESTRICTED BRIDGES

Location	State	Local	All
Southwestern Lehigh County	4.3%	57.1%	16.7%
Lehigh County	3.3%	28.7%	10.3%

According to the U.S. Census Bureau, biking is the fastest growing form of transportation for commuters, increasing 62% nationally between 2000 and 2014. However, it is only in those communities that plan for and invest in bicycle infrastructure that rates of bicycle use exceed the national average. Planning and investment strategies can include integration of the trail, bicycle and pedestrian network through the identification of network gaps, the implementation of sound access management provisions, and enhancing bicycle and pedestrian facilities. The rewards for such planning and investment include economic development benefits, improved public health and obesity rates, air quality improvements, enhanced community design and greater real estate investment and value.

While transit was not widely discussed during the planning process, it is important to consider this transportation mode when considering future growth trends. Current transit service in Southwestern Lehigh County includes two LANta fixed routes serving South Mall on Lehigh Street (210 and 323) but only one route serving downtown Emmaus (210). Enhanced transit service could support multimodal planning efforts, particularly if those enhancements also complement bicycle and pedestrian initiatives.

TRANSPORTATION OPTIMIZATION

During the planning process, a land use opportunity analysis was performed using geographic information system technology to determine regional transportation planning preferences. Through this analysis, participants articulated transportation strategies to limit infrastructure expansion, capitalize on existing

infrastructure and enhance the existing transportation network. Over time, effective performance standards can allow the region to assess progress on its transit action items. A careful evaluation of this performance can then be used to modify policies and direct resources to the most appropriate needs or programs.

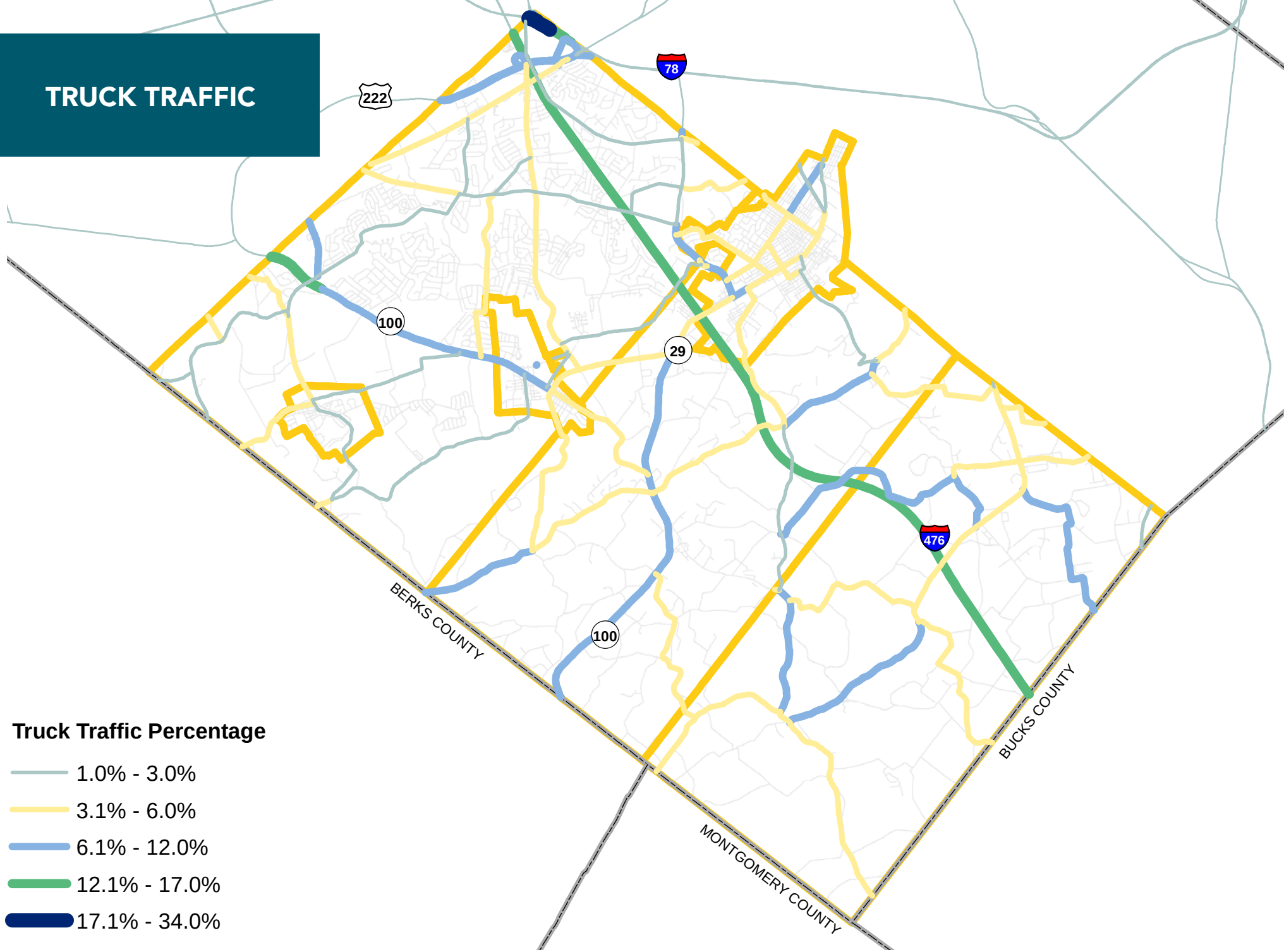
Some discussion centered on the need to work collaboratively with other agencies, such as the Lehigh County Conservation District, LANta and PennDOT, particularly as it relates to infrastructure design and coordination. Enhancing transportation partner relationships is critical to the development review process and for funding infrastructure improvements.

PARKING MANAGEMENT

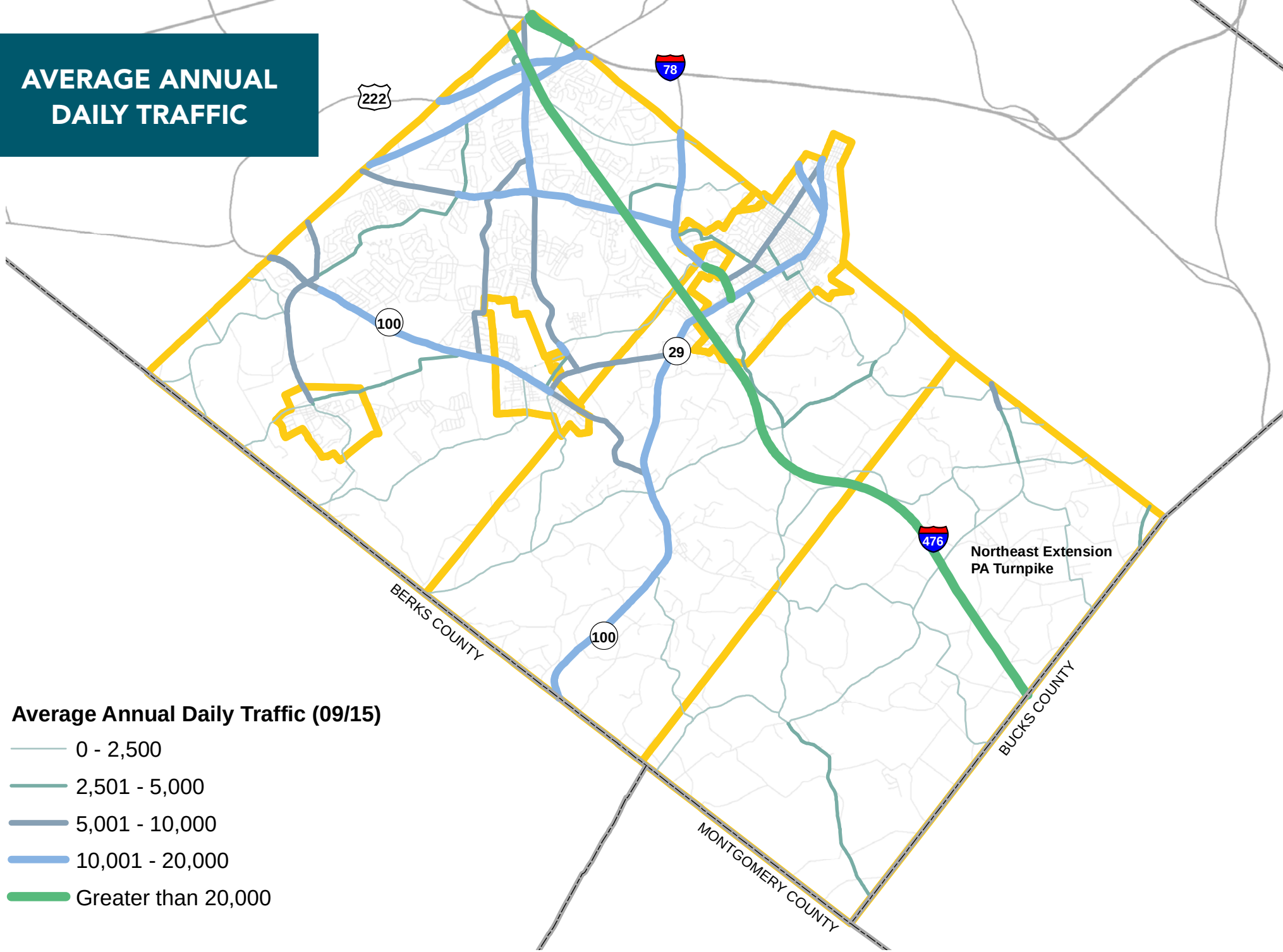
While not widely discussed, this theme emphasizes the importance of helping the general public with identifying and locating available parking spaces, particularly in the boroughs. The number of parking spaces was not cited as an issue, but identification of improvements will assist economic development strategies intended to drive consumers to downtown businesses. This theme emphasizes the importance of identifying mobile phone applications that will help people locate available parking spaces, particularly in the boroughs.

As with manufacturing, the future of strip-mall or commercial retail should be considered by the community. As society evolves towards electronic-based consumer trends and away from brick and mortar type experiences, careful consideration of future retail and commercial development must be considered. Creating site design guidelines that include building arrangements, uses, natural features and landscaping that contribute to the sense of place and character unique to Southwestern Lehigh County is important. Ensuring that each retail and commercial facility connects neighborhoods and maintains safe pedestrian and bicycle options for access will allow these facilities to evolve and attract consumers.

TRUCK TRAFFIC



AVERAGE ANNUAL DAILY TRAFFIC



20

SUBJECT AREAS: CIVIC LEADERSHIP

INTRODUCTION

The Southwestern Lehigh County Comprehensive Plan offers numerous tools for the region's six municipalities to mobilize collaboratively in the implementation of the region's shared goals. However, it is the responsibility of various leaders and public officials to serve as the agents for this implementation. True civic leadership requires a certain level of intuition, so that true civic leaders know when their own jurisdiction's needs are most critical versus when cross-boundary compromises or a broader understanding of key issues and priorities are needed. Public officials, municipal managers, legislators, planning commissions and zoning hearing boards should therefore refer to this plan frequently as a guide for decision making.

PLAN INTERRELATIONSHIPS

The Southwestern Lehigh County Comprehensive Plan should align well with the Comprehensive Plan The Lehigh Valley… 2030 which is currently beginning its own update. The Statement of Plan Interrelationships further articulates the issues of planning that are most likely to extend beyond municipal boundaries. These issues should form the focal point of any future conversations or considerations as they relate to multimunicipal planning and the implementation of this Comprehensive Plan. The most key element of implementing the plan is the creation and adoption of an intergovernmental cooperative planning and implementation agreement that specifies how the municipalities will work together beyond plan adoption. Civic leaders should also routinely review the following documents:

- *Lehigh Valley Long Range Transportation Plan*
- Lehigh County Park, Recreation, Open Space, Agricultural and Historic Lands Plan [forthcoming]
- Act 167 Stormwater Management Ordinances for the watersheds within the municipality
- The municipality's zoning ordinance, subdivision and land development ordinance, and (if it exists) the official map.

PROFESSIONAL DEVELOPMENT

Professional development and a clear process of community education and involvement are the hallmarks of good civic leadership. Education of public servants will nearly always improve the clarity of the administration of government services; furthermore, it can help shed light on how various plans and policies fit together. Well-informed public servants will have the tools they need to transmit their knowledge to the constituency, not just in the form of clearly conveying and promoting key meetings or public hearings, but in communicating details critical to the issues taking place at these meetings. A more engaged populace will better understand how to wield land use and development regulations to maximum impact in shaping the character and quality of life for their municipalities.

LAND USES OF REGIONAL SIGNIFICANCE

The Comprehensive Plan The Lehigh Valley… 2030 devotes significant attention to Land Uses of Regional Significance, which the Pennsylvania Municipalities Planning Code defines as "any land development that, because of its character, magnitude, or location will have substantial effect upon the health, safety, or welfare of citizens in more than one municipality." Since the Municipalities Planning Code does not confer power on any municipality to act upon a development in a neighboring municipality, establishing a standard for Land Uses of Regional Significance can help to ensure that as many stakeholders are at the table as possible when a far-reaching land use decision takes place. It may be one of the strongest means of fusing Civic Leadership with Land Use and Development.

To establish standards for Land Uses of Regional Significance, it is essential to first define the various potential uses as well as the minimum criteria for what constitutes Regional Significance. The table included here broadly resembles similar criteria used in the Comprehensive Plan The Lehigh Valley … 2030. When a developer submits a plan to a municipality, one of the plan recipients can use this criteria to determine if the plan meets the standards for Regional Significance. If it does, this will immediately trigger a series of notifications and conversations among the remaining and neighboring municipalities, so all parties are aware of the proposed development with considerable advance notice.

The review process should include a public hearing process that allows the six municipalities (as well as any other municipalities adjacent to the one where the Land Use of Regional Significance is proposed) to refer to one another and provide comments on the proposed development. All review letters or subsequent correspondence should address a designated representative from each of the municipalities involved in the public hearing process, and the public should be invited and encouraged to participate.

COORDINATED ZONING

A multimunicipal comprehensive plan endows the participating municipalities with the distinct ability to develop intermunicipal zoning strategies. This "zoning across borders" can operate in a variety of forms.

Perhaps the simplest method, and also the method to be used by the Southwestern Lehigh County municipalities, is for adjacent municipalities to coordinate their zoning at their borders. The land use map represents how all land uses across the categories listed are to be coordinated throughout Southwestern Lehigh County. Two municipalities may anticipate a land development that is likely to straddle the boundary line, and they can pair their zoning districts accordingly. Additionally, one municipality may expect a land use of regional significance, and the other may react to this significant development, either by capturing spin-off economic activity, or by shielding its most vulnerable areas (natural features, farms, private residences) from the potential impacts of this large development. Regardless of the desired outcome, the strategy shows clear planning and robust communication between two municipalities, both of which recognize that certain developments will exert an influence well beyond their specific parcels.

PLANNING FOR ALL USES

The Pennsylvania Municipal Planning Code requires that each municipality in Pennsylvania "provide for all uses" and cannot use zoning to completely forbid legally permissible uses from operating within its municipal boundaries. One of the biggest benefits of a multimunicipal comprehensive plan is that it allows participating municipalities to work collectively to strategically meet this statutory requirement to plan for all uses. For example, if one participating municipality finds a land use particularly appropriate or desirable, it can accommodate that land use through its zoning and thereby exempt other participating municipalities from being required to zone for that land use as well. Through effective coordination, negotiation and compromise, participating municipalities can develop a land use strategy that takes into consideration the broader multimunicipal context and allocates land uses throughout that planning area in a manner that is most effective, appropriate and desirable to all participating municipalities.All legally permissible land uses that municipalities need to provide for are accommodated within the land use map that is part of this plan. However, the land use map provides a generalization that the municipalities will have to be more specific about with other zoning requirements. This means, for example, that not every commercial area shown on the land use map will translate into zoning that provides every conceivable type of commercial development. The six municipalities will need to look deeper into the specific uses to be provided in each zoning district and coordinate to ensure that they cumulatively provide for every conceivable land use across the six municipalities. This is a key element to make sure it is clearly spelled out in the intergovernmental cooperative planning and implementation agreement.

LAND USES OF REGIONAL SIGNIFICANCE

Land Use Category	Minimum Criteria
All	Any land developments with estimated traffic generation exceeding: • 200 total large truck trips per day • 500 total car trips per day • 1,000 total vehicular trips per day (cars & trucks)
All	Any subdivisions taking place on tracts of over 50 acres
Airports	All
Hospitals	All, except for Small Hospitals
Landfills and Other Solid Waste Facilities	All
Large Residential Developments	Greater than or equal to 100 dwelling units
Major Industrial Parks	Greater than 50 acres
Major Shopping Centers	Greater than 150,000 square feet of gross leasable area
Mines, Quarries and Related Activities	All
Mixed Use Developments	Greater than 100,000 square feet of gross area
Office Buildings & Office Parks	Greater than 75,000 square feet of gross leasable area
Power Plants	All
Railway and Rail Facilities	All
Regional Entertainment Complexes	All
Regional Recreational Complexes	Identification as a regional recreational facility in the park and recreation inventory
Schools and School Campus Arrangements	All
Warehouses and Storage Facilities	Greater than 250,000 square feet of gross area

FALL FOR GOD
HE IS TRULY
HALLELUJAH

SUBJECT AREAS: LAND USE AND DEVELOPMENT

INTRODUCTION

Land use and development in Southwestern Lehigh County varies in both type and intensity, from the higher-density, mixed-use character in boroughs like Emmaus, to the rapid urbanization in Lower Macungie Township, to the much more agrarian Lower Milford Township. Attitudes toward how Southwestern Lehigh County should grow—or even whether it should grow—often correlate strongly to how local populations value open space preservation in relation to economic activity generated through new development. The region's attractiveness is evidenced in its steady population growth. However, unplanned growth could jeopardize the key characteristics—the natural features, the functionality of major roadways and the architectural character—that determine and help maintain the region's core quality of life. Any visions, strategies and implementation strategies on Land Use and Development should help to articulate zoning ambitions for the municipalities in Southwestern Lehigh County, as well as how leadership in each municipality can coordinate land use decisions across boundaries.

SOUTHWESTERN LEHIGH COUNTY LAND USES

The Future Land Use Plan for Southwestern Lehigh County identifies the locations and recommended development types for broad categories of land uses— agriculture, natural features, rural, restricted/preserved, residential, commercial, industrial and mixed. The Future Land Use Plan was developed by evaluating the suitability of the land for specific land uses and then comparing to existing land uses throughout the region. The natural resources and agricultural areas illustrated are based on visions and strategies recommended elsewhere in this plan, while the accompanying table shows the types of land use activities envisioned in each category.

Below is a summary of each of the land use categories:

- **Agriculture:** Areas of existing parcels used for agriculture identified using 2015 aerial imagery recommended for preservation/continuation of the existing farmland uses for regionally significant farmland and other existing farms identified for preservation by the municipalities.
- **Natural Features:** Areas of high natural resource value and are recommended for preservation. Development is not recommended.
- **Rural:** Low density areas with limited access to infrastructure and services, no existing public sewers and a mixture of low-density housing, scattered businesses and farms. Limited development and agriculture is recommended for these areas. Major residential, employment and institutional development is not recommended in rural areas.
- **Restricted/Preserved:** Public or private-owned land that cannot be developed. In essence, these lands are not applicable to the standards of future zoning and land development considerations, because they are "locked in place" under their current uses, which generally involve either agriculture or open space. These include parklands (both rural and urban), deed-restricted farms and other key conservation areas.
- **Residential:** The most appropriate designation for housing at an urban or suburban level of density, which should, for all new construction, receive public water and sewer service.
- **Commercial:** The classification intended to designate urban or suburban development patterns that offer the sale of goods or services in a typically automobile-oriented, traffic generating setting. While these uses can be intense in terms of economic activity (and vehicle trips per day generated), they should not elicit the same environmental impacts as the industrial or highest-intensity uses. In many cases, these lands can serve to buffer the most intensive industrial uses from the most sensitive residential, natural and agricultural uses.
- **Industrial:** The most intensive land uses of all, with the highest likelihood of environmental impacts or potential nuisances: glare, odor, vibration, noise and so forth. In many cases, these will generate high traffic, particularly through trucks or tractor trailers. These should be contained in very limited areas and should remain separate from the most vulnerable residential, natural and agricultural uses.
- **Mixed:** This category allows for a character that already largely exists in the boroughs and the crossroads villages, in which residences, stores and low-impact services operate in close, walkable proximity to one another. These areas should be particularly conducive to pedestrians or other non-motorized vehicles.

The Future Land Use Plan map shows how these eight categories play out spatially in terms of the most generalized recommended uses of the land. The distribution of these eight categories owes its inspiration to the Future Land Use Plan map in The Comprehensive Plan The Lehigh Valley … 2030; however,

the Lehigh Valley Planning Commission devised a strategy for expanding the four categories in that plan to eight categories

in this plan, based largely on the recommendations and values articulated through the extensive community engagement. Zoning districts can still assume a wide variety of labels and approaches, and, judging from a generalized map of the six municipalities, they currently do. However, they should largely fall within the general prescriptions identified by these eight categories and the Future Land Use Plan map.

The accompanying Future Land Use Plan table interprets these eight categories in terms of a few basic principles. The Objective aligns with one of the primary visions, when applicable. The Recommended Land Uses broadly define how zoning should nestle within these more generalized categories. The Recommended Sewer and Water Systems stipulate how infrastructure and utilities should service any land development or activities that will or are already taking place on lands that fall within that category.

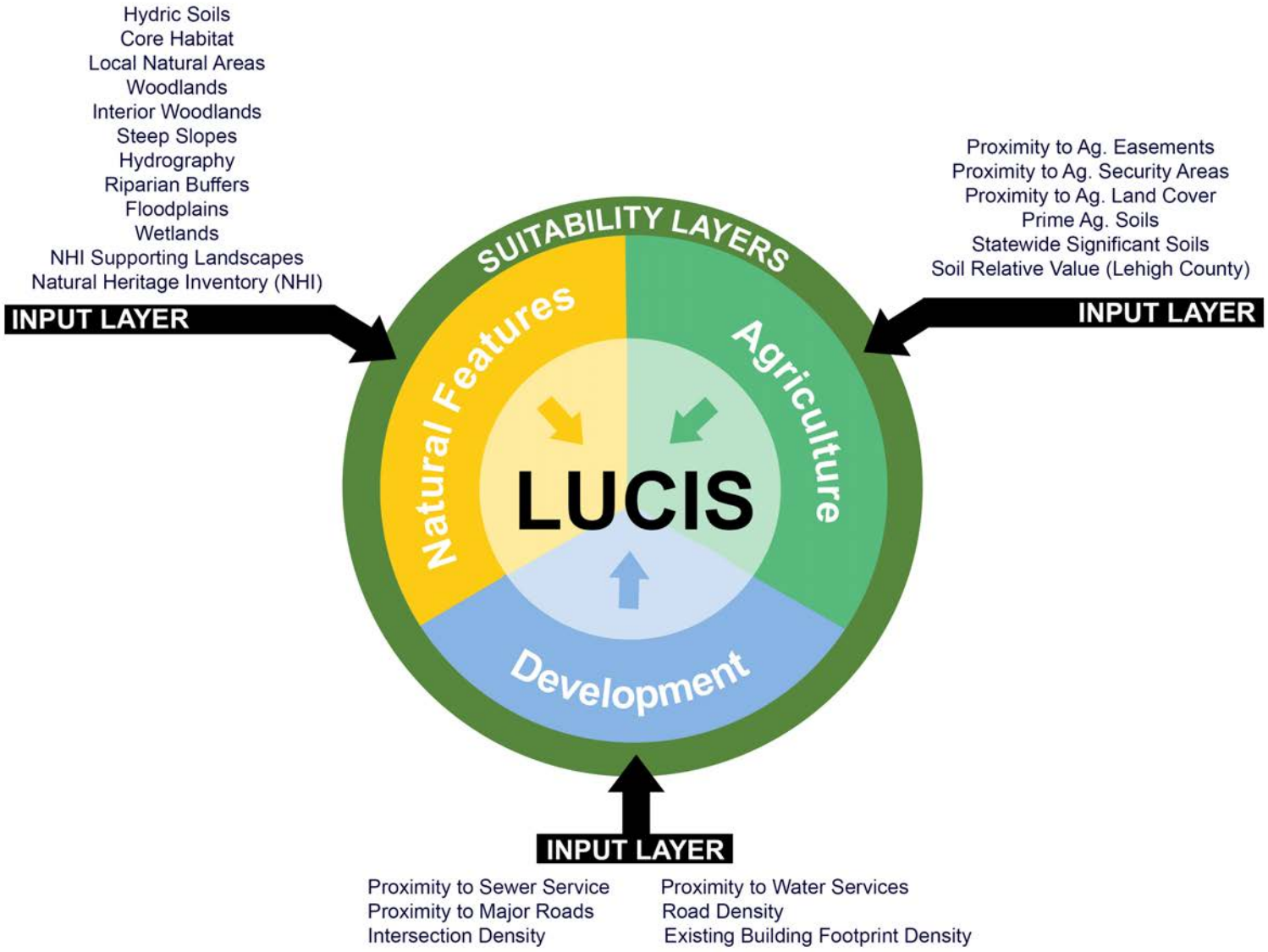
LAND USE AND DEVELOPMENT GOALS

When asked to rate land use strategies for improving quality of life in Southwestern Lehigh County, survey respondents chose "Support farming as an industry" (82%) and "Promote redevelopment in local downtowns" (78%) most frequently as either extremely important or very important. This feedback informed the development of land use goals aimed at balancing the need for intensive land development where it is most appropriate with broader goals of open space/farmland preservation, walkability, preservation of natural and historic features, and the promotion of sustained economic activity. Key themes that the community identified are as follows:

- **Agricultural Preservation:** The community must demonstrate its appreciation for the region's agrarian landscapes through regulations that support farming as a viable industry. Powerful market forces impose escalating challenges on family farms, making them a form of existing development uniquely vulnerable to undesirable encroaching urban or suburban development.
- **Interplay between Developed and Undeveloped Land:** Good regulations can help achieve a suitable balance between the unbuilt, the built and the cultivated, particularly by directing more intense uses where they are most appropriate: specifically, where existing infrastructure allows and supports higher intensity development.
- **Reaffirming Historic Commercial Nodes:** The ideal place for redevelopment is in the traditional downtowns: both the boroughs and crossroads villages, where infrastructure is typically stronger and more conducive to a mixture of uses at greater density and intensity.
- **Education on Zoning and Land Development:** A community that understands the power of land use regulations to shape the physical appearance of the landscape will engage more powerfully when outside influences (both private and public) articulate a desire to invest in ways that will induce major change.

The following pages demonstrate the process for crafting a customized Future Land Use Plan based on the needs and priorities of the six Southwestern

The following pages demonstrate the process for crafting a customized Future Land Use Plan based on the needs and priorities of the six Southwestern Lehigh County municipalities and using a Land-Use Conflict Identification Strategy (LUCIS) model. More information on LUCIS modeling can be found in the Data Companion to this plan.



FUTURE LAND USE CATEGORIES

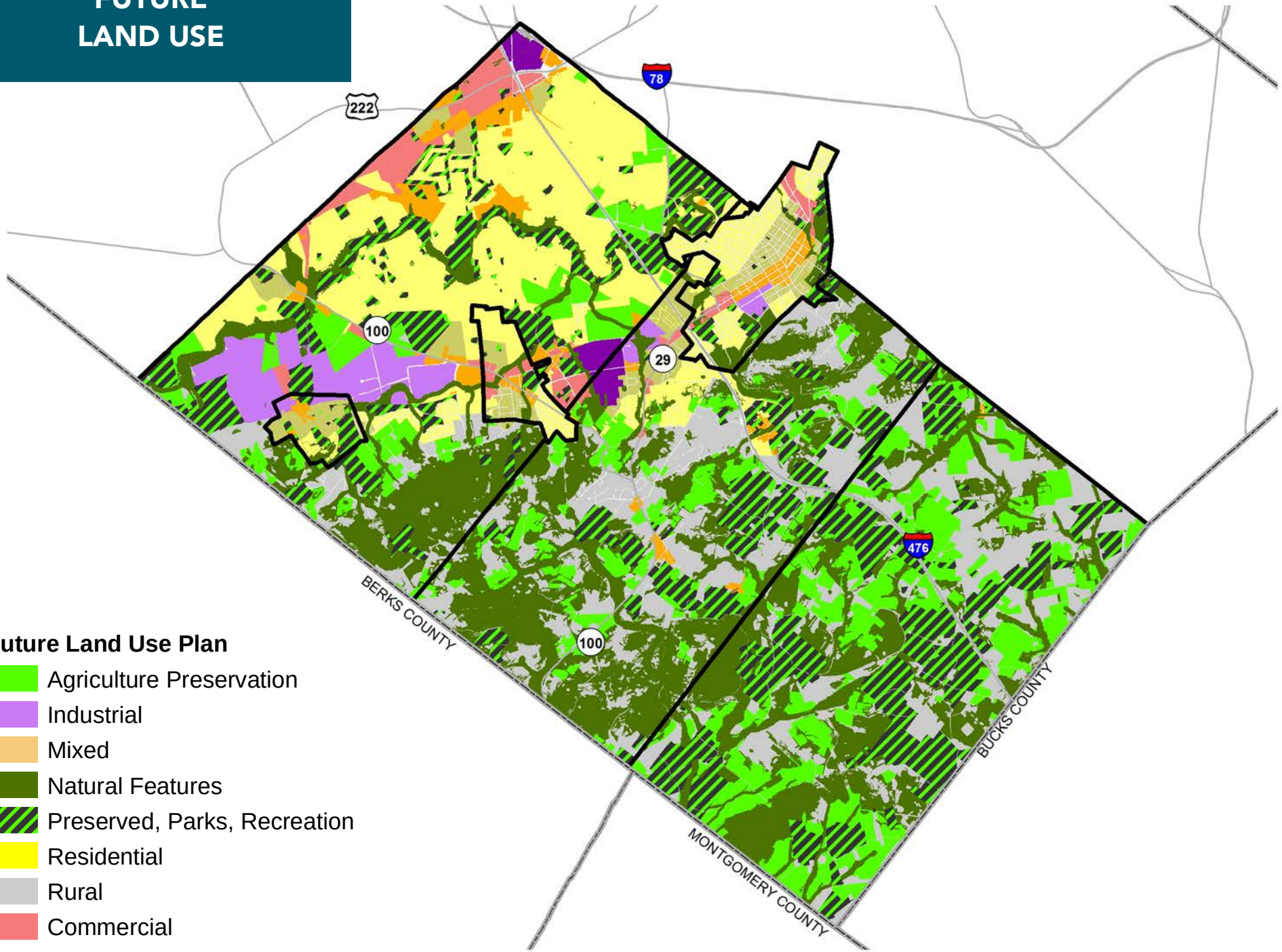
Land Use	Objective	Recommended Land Uses	Recommended Sewer and Water Systems	Strategy
Agriculture	Identical to Southwestern Lehigh Goal II: "To support farming activities and mechanisms to meet local food production needs and to support farming as a sustainable economic activity and valuable asset and industry to the region."	Crop Farming Agriculture Businesses related to agriculture Parks/open space uses Housing related to agriculture Housing not related to agriculture on a very limited scale	On-lot systems	Transfer of development rights Agricultural Security Areas, followed by Agricultural Conservation Easements
Natural Features	Identical to Southwestern Lehigh Goal I: "To preserve and protect the region's valuable natural and scenic resources and open space."	Parks/open space uses Woodlands Single family detached housing on a very limited scale Pastureland Green infrastructure (per the definition)	On-lot systems	Conservation Easements LVPC Model Ordinances: • Riparian Buffers • Floodplains • Steep Slopes • Woodlands
Rural	Same as County Comprehensive Plan: "To provide development opportunities consistent in the context of rural land use patterns and capabilities."	Housing - single family detached dwellings Agriculture Crop farming Businesses related to agriculture Parks/open space uses Businesses and community facilties to serve the surrounding rural area	On-lot systems	Land Use Assumptions Reports, followed by Roadway Sufficiency Analyses & Impact Fees Transfer of Development Rights LVPC Model Ordinance: - Conservation Subdivisions
Restricted/ Preserved	To indicate private- or public-owned land that cannot be developed.	Parks/open space Recreation facilities Crop farming Deed-restricted lands	Whatever systems are currently in place	Strategic expansion of preserved lands, articulated through Official Map

FUTURE LAND USE CATEGORIES

Land Use	Objective	Recommended Land Uses	Recommended Sewer and Water Systems	Strategy
Residential	Inspired by sentence 1 of County Comp Plan objective for Urban Development: "To provide areas where residential development can occur, coordinated with the provision of infrastructure."	Residential Medium Density: Single family detached with a density of less than or equal to 4 dwelling units per acre Community facilities Recreation facilities Parks/open space Crop farming	Public sewer and community water systems for all housing with a density of less than or equal to 4 dwelling units per acre Pre-existing residences served by on-lot water/ sewer should be at a density lower than 1 dwelling unit per acre	Transfer of Development Rights LVPC Model Ordinances: • Cottage Housing • Street Connectivity • Inclusionary Zoning • Density Bonuses • Traditional Neighborhood Development
		Residential High Density: Dwelling units with a density of 5 or more units per acre, including: a. Twins b. Townhouses c. Condominiums d. Apartments e. Mobile home parks f. Mobile homes) Community facilities Recreation facilities Parks/open space Crop farming	Public sewer and community water systems for all housing with a density of 5 or more units per acre Pre-existing residences served by on-lot water/ sewer should be at a density lower than 1 dwelling unit per acre	

Land Use	Objective	Recommended Land Uses	Recommended Sewer and Water Systems	Strategy
Commercial	To meet the needs for commercial development and its supporting uses, when scaled and positioned effectively to buffer the most intense uses (industrial) from the most sensitive (residential, agriculture, natural features).	Stores, businesses, services Offices Community facilities Recreation facilities Parks/open space Crop farming Light manufacturing (artisanal)	Public sewer and community water systems	Land Use Assumption Reports, followed by Roadway Sufficiency Analyses and Impact Fees
Industrial	To meet the needs of goods manufacturing, wholesaling and other activities that involve particularly intensive use of the land, with a high tendency for impacts.	Light Industrial: Industries, manufacturing, processing (includes food processing) Warehousing, wholesaling Community facilities Transportation facilities Parks/open space Crop farming	Public sewer and community water systems	
		General Industrial: Industries, manufacturing, processing (includes food processing) Warehousing, wholesaling Community facilities Transportation facilities Parks/open space Crop farming Mining or public uses needing buffers such as but not limited to quarries, sanitary landfills and power plants		
Mixed	To harmonize or to promote the continued co-existence of residences, stores and low-impact services in an arrangement most conducive to non-motorized vehicles and pedestrians.	Housing (single family detached dwellings, twins, townhouses, condominiums, apartments and mobile home parks) Stores, businesses, services Offices Community facilities Recreation facilities Parks/open space Crop farming	Public sewer and either community or on-lot water systems	LVPC Model Ordinances: • Traditional Neighborhood Development • Mixed Use Zoning and Development • Street Connectivity"

FUTURE LAND USE



Future Land Use Plan

- Agriculture Preservation
- Industrial
- Mixed
- Natural Features
- Preserved, Parks, Recreation
- Residential
- Rural
- Commercial

VISIONS, STRATEGIES AND ACTIONS

INTRODUCTION

The nine subject areas detailed in this plan represent the fundamental themes animating the resulting visions, strategies and actions. While subject areas provide focus to the most prominent issues in Southwestern Lehigh County, they do not correlate on a one-to-one basis to the more numerous visions, strategies and actions. In short, virtually all visions, strategies and actions evoke more than one of the subject areas—several of them evoke the majority of the nine.

Icons for each subject area appear prominently throughout the visions, strategies and actions "toolkit." These icons organize these various tools, illustrating how the planning process frequently spans multiple subject areas. Furthermore, because Public Participation underlies so much of the planning process, it also features as an icon despite its not being a distinct subject area in itself.

NATURAL RESOURCES

VISION: To preserve and protect the region's valuable natural and scenic resources and open space.

1 **STRATEGY:** Protect streams, lakes, ponds and wetlands.

ACTION ONE
Adopt zoning and subdivision and land development ordinances generally consistent with the Lehigh Valley Planning Commission Riparian and Wetland Buffers Guide | Model Regulation to preserve or restore riparian buffers where feasible using a variety of native vegetation.

ACTION TWO
Encourage public and private landowners to use best management practices in forestry, stewardship and lawn care activities.

ACTION THREE
Give higher priority in planning and funding to park and natural area projects that would protect land containing surface waters.

ACTION FOUR
Safeguard wetlands on publicly-owned land to enhance their environmental, scenic and educational values.

2 **STRATEGY:** Protect or restore the quality and quantity of existing groundwater to provide for present and future uses during both drought and non-drought conditions.

ACTION ONE
Identify and map areas critical to maintaining groundwater recharge and quality.

ACTION TWO
Support and promote educational programs about the importance of protecting groundwater resources.

ACTION THREE
Incorporate low impact development design standards in subdivision and land development ordinances to protect groundwater recharge areas.

3 **STRATEGY:** Preserve, manage and restore natural and scenic resources.

ACTION ONE
Adopt zoning and subdivision and land development ordinances generally consistent with the Lehigh Valley Planning Commission Woodlands Guide | Model Regulation to regulate tree removal during subdivision and land development activities.

ACTION TWO
Adopt zoning and subdivision and land development ordinances generally consistent with the Lehigh Valley Planning Commission Floodplain Guide | Model Regulation to prohibit or otherwise control development in the 100-year floodplain.

ACTION THREE
Adopt zoning and subdivision and land development ordinances to regulate grading, construction and earth disturbance generally consistent with the LVPC Steep Slopes Guide Model Regulation to manage development, grading and forestry on steep slopes, limiting construction on grades above 15% and restricting it on grades above 25%. Municipalities may regulate slopes at 8% and above.

ACTION FOUR
Adopt zoning and subdivision and land development ordinances generally consistent with the LVPC Conservation Subdivisions Model Ordinance to set aside undivided, permanently protected open space within residential developments.

ACTION FIVE
Acquire or obtain easements on properties within greenways and blueways identified in the Lehigh Valley Greenways Plan.

ACTION SIX
Coordinate the planning and development of the greenways and blueways network with transportation, economic development, tourism, recreation and open space priorities in the region.

ACTION SEVEN
Coordinate efforts with local land trusts, conservancies, school districts and the private sector to establish natural lands connectivity.

ACTION EIGHT
Use natural lands to provide buffers between non-compatible land uses, where feasible.

ACTION NINE
Consider restricting structures to be located on or extend above hills or ridges to preserve scenic vistas.

ACTION TEN
Acquire or purchase conservation easements to preserve scenic vistas.

ACTION ELEVEN
Designate scenic roadways through the Pennsylvania Byways program.

ACTION TWELVE
Periodically review the Lehigh Valley Planning Commission's GIS database that provides current information about natural resources and conservation priorities.

4 **STRATEGY:** Preserve and manage Natural Heritage Areas.

ACTION ONE
Work with state and federal agencies and conservation organizations to provide information and technical assistance to landowners to encourage conservation and sustainable management of natural heritage areas.

ACTION TWO
Encourage the conservation action recommendations of the Natural Heritage Inventory of Lehigh and Northampton Counties, Pennsylvania – Update 2013.

ACTION THREE
Consider establishing an annual monitoring program of publicly-owned natural heritage areas to maintain the health and quality of the site.

5 **STRATEGY:** Protect natural resource areas as depicted on the Natural Resources Map.

ACTION ONE
Encourage funding for acquisition or easement purposes to preserve lands with priority conservation value.

ACTION TWO
Support conservation organizations in their efforts to acquire priority natural areas.

ACTION THREE
Encourage private landowners to place conservation easements on portions of their property that are located in priority natural resource areas.

ACTION FOUR
Consider establishing a program to purchase or accept donations of land located within priority natural resource areas.

ACTION FIVE
Take advantage of state and federal grant programs for open space preservation.

6 **STRATEGY:** Support and promote natural resource protection as a component of the region's economy.

ACTION ONE
Promote attraction of businesses that serve an outdoor economy.

ACTION TWO
Promote the economic benefits of natural lands documented in the Lehigh Valley Return on Environment study.

AGRICULTURE

VISION: To support agricultural activities and mechanisms to meet local food production needs and to support agriculture as a sustainable economic activity and valuable asset and industry to the region.

1 **STRATEGY:** Preserve and enhance the viability of agricultural production.

ACTION ONE
Encourage education and training to existing and prospective farmers, such as through the Cooperative Extension and The Seed Farm, regarding current technology and farming approaches to maximize land capability, transition to organic production, maximize profitability, expand business opportunities and protect soil resources.

ACTION TWO
Support the efforts of regional institutions and other agencies engaged in agricultural development efforts.

ACTION THREE
Promote new and existing community gardens, school gardens, urban gardens and home gardens.

ACTION FOUR
Provide education to existing farmers towards maintaining the farm, such as agricultural security areas and agricultural conservation easements.

1 **STRATEGY:** Preserve and enhance the viability of agricultural production. (Cont.)

ACTION FIVE
Encourage agri-tourism businesses (e.g. small barn venues, corn mazes, wineries, bakeries, petting zoos) to enhance agricultural viability conducted in a manner consistent with the rural character of the area.

ACTION SIX
Encourage and promote farmers' markets, selling local farm products, and regional value-added efforts.

ACTION SEVEN
Promote education of residents on "right to farm' laws.

ACTION EIGHT
Coordinate with existing agencies to strengthen regional food systems by linking food production, processing, distribution, consumption and waste management to facilitate development and consumption of food resources.

ACTION NINE
Adopt a timber harvesting ordinance in accordance with accepted silvicultural principles and best management practices.

ACTION TEN
Promote and provide support resources for urban/suburban agriculture programs, including food cooperatives, community supported agriculture, on-line markets, farm share programs and mobile grocers.

ACTION ELEVEN
Consider coordinating with Buy Fresh Buy Local to implement a Regional Fresh food Access Plan.

ACTION TWELVE
Promote local farmers markets to the general population.

ACTION THIRTEEN
Look for opportunities to provide ready access to nutritious and healthy food choices in the region's areas of limited food access.

COMMUNITY UTILITIES

VISION: Provide for sewer, water and stormwater infrastructure needs in a safe, cost-effective manner where appropriate.

1 **STRATEGY:** Provide environmentally-sound sewage disposal and adequate quantity and quality of water supplies where appropriate to meet existing and future needs.

ACTION ONE
Adopt ordinance provisions allowing for inspection and enforcement of on-site sewage system maintenance requirements.

ACTION TWO
Monitor sewage disposal facilities and take corrective measures, as appropriate.

ACTION THREE
Maintain an up-to-date Act 537 Official Sewage Plan, as prescribed by law.

ACTION FOUR
Where appropriate, implement surface and groundwater source protection programs to safeguard water recharge areas and to protect central and community water systems based upon the LVPC model wellhead protection ordinance.

ACTION FIVE
Implement water conservation programs for both the system and individual users during both emergency and non-emergency operations for central and community water systems.

ACTION SIX
Provide metering of sources and individual customer use for all central and community water systems.

ACTION SEVEN
Make improvements to central and community water systems to meet the requirements of the current federal and state Safe Drinking Water Act (SDWA).

ACTION EIGHT
Develop capital replacement programs to identify strategies and programs for replacement of public sewer and water system infrastructure.

2 **STRATEGY:** For central and community systems, coordinate economical, efficient sewage disposal and water service with existing and future development.

ACTION ONE
Coordinate official sewage planning and water resource planning with comprehensive planning and zoning.

ACTION TWO
Discourage use of central sewage and water facilities to serve urban land uses in areas not recommended for urban development by this plan.

ACTION THREE
Where appropriate, prepare or update sewage facility and water supply agreements with adjacent municipalities to provide service consistent with the urban development recommendations of this plan.

ACTION FOUR
Arrange for public ownership of privately-owned central water systems. In the event that these systems remain private, require assurances for proper long term operation and maintenance.

ACTION FIVE
Cost-effectively remove excess infiltration and inflow to maximize available sewage facilities capacity.

ACTION SIX
Coordinate with Lehigh County Authority for the provision of community water supply and public sewage disposal as appropriate and consistent with the land use recommendations of this plan.

3 **STRATEGY:** Manage the rate, volume and quality of storm runoff for protection of public safety and welfare, property and the environment.

ACTION ONE
Implement the provisions of approved stormwater management plans through adoption of ordinances and enforcement of runoff control criteria.

ACTION TWO
Prepare capital improvement programs to solve existing drainage problems in accordance with Act 167 stormwater management plans.

3 **STRATEGY:** Manage the rate, volume and quality of storm runoff for protection of public safety and welfare, property and the environment. (Cont.)

ACTION THREE
Ensure the proper construction of storm drainage facilities in accord with approved subdivision and land development plans.

ACTION FOUR
Ensure continued operation and maintenance of storm drainage facilities through regular inspections and enforcement of maintenance plans.

ACTION FIVE
Adopt ordinance provisions to regulate standing water on construction sites and routinely inspect construction sites for standing water

ACTION SIX
Manage stormwater associated with municipal separate storm sewer systems consistent with federal law.

COMMUNITY SERVICES

VISION: To provide high quality community facilities and services for all residents.

1 **STRATEGY:** Provide and maintain a high quality park, trail and recreation system to meet existing and future residents' needs.

ACTION ONE
Use an official map to proactively plan for future parks and trails.

ACTION TWO
Require the dedication of land or money for parks as a condition for subdivision or land development approval as provided in the Pennsylvania Municipalities Planning Code.

1 **STRATEGY:** Provide and maintain a high quality park, trail and recreation system to meet existing and future residents' needs. (Cont.)

ACTION THREE
When improving existing or designing new outdoor recreation facilities, ensure safety and accessibility for all.

ACTION FOUR
Educate elected officials, the business community and the public on the economic benefits of providing outdoor recreation facilities for residents and visitors.

ACTION FIVE
Consider opportunities to use floodplains and riparian buffers for trails.

ACTION SIX
Coordinate with schools, public and non-profit organizations to provide adequate recreational space for residents.

ACTION SEVEN
Coordinate with rail, utility companies and private landowners on the use and/or acquisition of existing or abandoned rights-of way for trail development.

ACTION EIGHT
Promote tourism activities that build upon the area's recreational assets, heritage, arts and culture.

2 **STRATEGY:** Support high-quality local public library services and educational resources.

ACTION ONE
Coordinate with public libraries to assess current and future program needs a nd funding opportunities.

ACTION TWO
Meet with the East Penn and Southern Lehigh School Districts periodically to discuss development trends that could impact the timing and need for school facility expansion.

3 **STRATEGY:** Encourage environmentally responsible and economical solid waste disposal.

ACTION ONE
Continue to implement the recycling requirements set forth in the Pennsylvania Municipal Waste Planning, Recycling and Waste Reduction Act (Act 101).

ACTION TWO
Educate residents to encourage a higher commitment to recycling.

ACTION THREE
Provide a municipal program for yard waste collection.

ACTION FOUR
Advocate that Lehigh County reestablish a program for collection of household hazardous wastes, oil and similar items.

4 **STRATEGY:** Provide reliable, responsive and efficient community emergency services.

ACTION ONE
The Southwestern Lehigh County municipalities should collectively evaluate police, ambulance, emergency management and fire operations and efficiency to identify needs and recommend options for improvements. Regionalized options will be considered. Major disaster preparedness will also be considered.

ACTION TWO
Encourage retention of existing and recruitment of new firefighter and emergency management volunteers.

ACTION THREE
Develop municipal outreach programs to increase public awareness and interest in volunteering.

ACTION FOUR
Develop a strategy to address water needs of our fire services, both on new land development and redevelopment.

ACTION FIVE
Work with area emergency management agencies, Lehigh County Authority and local fire departments to assess the needs to properly fight fires.

ACTION SIX
Adopt ordinances to establish fire department reviews of subdivision and land development plans.

DIRECT USES WHERE APPROPRIATE

VISION: To direct development toward existing infrastructure and away from agricultural or environmentally sensitive areas.

1

STRATEGY: Municipalities should support proven farmland protection tools, integrating whenever possible with parks, recreation, and open space and agricultural lands planning.

ACTION ONE
Work with local property owners and county to permanently preserve farmland in the areas designated for farmland preservation.

ACTION TWO
Identify and pursue more funding for the acquisition of new Agricultural Conservation Easements.

ACTION THREE
Apply zoning to limit non-agricultural uses in areas recommended for farmland preservation./Adopt exclusive agricultural zoning in areas recommended for farmland preservation.

ACTION FOUR
Establish concurrence between the forthcoming Lehigh County Parks, Recreation, Open Space and Agricultural Lands Plan and agriculturally supportive zoning or easements.

ACTION FIVE
Refine zoning regulations to define appropriate intensity and scale of allowable agricultural uses.

ACTION SIX
Mediate conversations between farmers and the surrounding community to help arrive at suitable compromises where farmland preservation is more contentious, which should include Right-to-Farm laws and intensity-specific agricultural zoning.

2

STRATEGY: Municipalities should minimize the land that is consumed by development, both residential and non-residential.

ACTION ONE
Utilize official maps that detail proposed infrastructure (roads, water and sewer) to direct development to appropriate locations and to retain viability of natural and agricultural lands.

ACTION TWO
Encourage density levels (particularly housing density) that align with contemporary demand through strategic zoning amendments, where medium-intensity and mixed-use is most appropriate, thereby discouraging either high-intensity growth in sensitive areas or land-intensive, invasive low-density uses.

2 **STRATEGY:** Municipalities should minimize the land that is consumed by development, both residential and non-residential. (Cont.)

ACTION THREE
Direct new commercial uses to the downtowns and other selected locations along major arterials, which will allow for safe and efficient traffic access.

ACTION FOUR
Discourage intensive, high density land use and development where current infrastructure is inadequate or non-existent.

ACTION FIVE
When regulations allow for two potentially conflicting uses adjacent to one another, ensure through zoning and land development regulations that screening will protect from nuisances (light, odor, noise, vibration, etc.).

3 **STRATEGY:** Planning officials and legislators should ensure that open space in land development proposals avoids adverse environmental impacts and serves a genuine public good.

ACTION ONE
Carefully monitor the natural features and open spaces most widely cherished by the community, and target these areas for protection or most restrictive zoning.

ACTION TWO
Revise or clarify definitions on "open space" so that developments either cannot include stormwater management infrastructure as the definition or must design them in ways to merit inclusion.

ACTION THREE
Develop separate standards for passive versus active recreation when defining open space and recreation requirements.

ACTION FOUR
Create separate regulations to distinguish protection of agricultural or pasture land versus other natural lands.

ACTION FIVE
Adopt zoning and subdivision and land development ordinances generally consistent with the Lehigh Valley Planning Commission Minimizing Sinkhole Occurrences model regulation to identify and mitigate risks of development in areas with carbonate bedrock.

4 **STRATEGY:** Municipalities should coordinate land uses at boundaries to yield the most harmonious region-wide results between developed, cultivated and undeveloped lands.

ACTION ONE
Establish an administrative system so that zoning map amendments or land development proposals that touch a municipal boundary should involve regular communication with that municipality during the planning process for the proposed change in land use or land development.

ACTION TWO
Through regular meetings with all municipalities in the shared comprehensive plan, devise zoning amendments that achieve the ultimate goal of "providing for all uses" across the Southwestern Lehigh County region, allowing some municipalities to provide for certain uses so that others may completely restrict them.

ACTION THREE
Coordinate regulations across municipal boundaries, including zoning and subdivision and land development regulations.

ACTION FOUR
Consider density, population projections and surrounding developments when reviewing new land development proposals to allow for seamless rather than shock transition between the different uses.

5 **STRATEGY:** Land uses of regional significance can exert profound impact on a community's appearance, resource consumption and navigability; therefore they warrant particular scrutiny.

ACTION ONE
Create separate administrative proceedings that meet the criteria established for land uses of regional significance, emphasizing involvement of all Southwestern Lehigh communities in the process.

ACTION TWO
Enact appropriate impact fees to ensure that developments of regional significance pay for the necessary improvements to offset traffic impacts or utility expansion attributable to these developments.

ACTION THREE
Establish design guidelines for non-residential and residential developments of regional significance to protect nearby areas from undesirable impacts.

EXISTING DEVELOPMENT

VISION: To protect and enhance the character and economic viability of Southwestern Lehigh County's older and historic settlements: the traditional downtowns, crossroads villages, historic farmsteads and other significant structures.

1 **STRATEGY:** Regional leadership should collaborate to protect and support the economies of the traditional downtowns and crossroads villages.

ACTION ONE
Coordinate economic and community development efforts to revitalize the economy of urban places through visible improvement to the built environment.

ACTION TWO
Incentivize (financially or through density bonuses) redevelopment and reuse of existing vacant buildings before greenfield development, particularly when a developer might favor a greenfield site over redevelopment.

ACTION THREE
Provide a suitable--but not excessive--level of parking, which meets the needs of the public, facilitates their access to their core commercial areas, and supports local economic development goals.

ACTION FOUR
Work with business organizations to develop a context sensitive sign program that fits with marketing strategies.

ACTION FIVE
Develop wayfinding methods using available technology that will help people locate available parking spaces and maximize existing parking resources.

2 **STRATEGY:** Clear, accessible regulations should promote infill and redevelopment, particularly in areas where infrastructure can support higher densities.

ACTION ONE
Re-evaluate zoning ordinances to see where obstacles may exist to adaptive alterations of existing homes, particularly in side and back yards.

ACTION TWO
Support higher density development in historic centers of core commercial areas where water/sewer already exists.

ACTION THREE
Provide for efficient administration of any proceedings needed for the renovation of older structures to comply with local ordinances; minimize financial and time burdens.

ACTION FOUR
Identify and provide for opportunities to increase intensity of use and flexibility of design to allow for more vibrancy and creative reuse of existing buildings.

ACTION FIVE
Support the rehabilitation of low and moderate income occupied housing for energy efficiency and preservation of neighborhood character.

ACTION SIX
Encourage and provide for adaptive reuse of historic buildings as a strategy for historic preservation and revitalization.

3 **STRATEGY:** Encourage development standards that promote a suitable balance (as determined by the community) between historic integrity and contemporary best practices in architecture and construction.

ACTION ONE
Zone appropriately to promote compatible infill development in villages and boroughs.

ACTION TWO
Give high priority to infrastructure projects and programs that will reinvest or renew within the existing community, particularly if they encourage preservation.

ACTION THREE
Promote connectivity (both motorized and non-motorized) between older and newer residential areas—as well as among other non-intensive uses—through zoning amendments, subdivision and land development, and the official map.

ACTION FOUR
Establish design guidelines for borough downtowns and crossroads villages that promote a suitable balance (as determined by the community) between regard for historic integrity and contemporary best practices in architecture and construction.

3 **STRATEGY:** Encourage development standards that promote a suitable balance (as determined by the community) between historic integrity and contemporary best practices in architecture and construction. (Cont.)

ACTION FIVE
Study the forms in historic neighborhoods and consider allowing similar design standards in new neighborhoods.

ACTION SIX
Encourage site designs that consider building arrangements, uses, natural features, and landscaping that contribute to a sense of place and character that is typical to Southwestern Lehigh County.

ACTION SEVEN
Emphasize placemaking elements and examine opportunities to create destinations and connect existing places.

4 **STRATEGY:** Identify and target investment toward those areas of the community that show the greatest evidence of disinvestment.

ACTION ONE
Monitor population change at the block or block group level, identify specific areas of continued loss, and analyze socioeconomic conditions contributing to depopulation.

ACTION TWO
Identify and target districts or properties with historic or aesthetic significance for restoration and preservation.

ACTION THREE
Identify and target districts or properties whose land uses and/or structure have become obsolete for redevelopment.

ACTION FOUR
Develop an inventory of underutilized properties and develop strategies (such as rezoning, rehabilitation, collaboration with local organizations, and development incentives) that will move these properties back into productive uses that will support increased commercial or residential activity.

ACTION FIVE
Harness citizen participation on proposed redevelopment/revitalization sites to ensure widespread participation in managing potentially sensitive investment decisions.

5 **STRATEGY:** Identify and make available incentives and tools to encourage historic preservation.

ACTION ONE
Continue to support public sector and local historical societies' ongoing education programs to include notification of property owners and potential property owners that their property is historic, situated in a historic district, or historic conservation landscape, or is listed on the National Register of Historic Places.

ACTION TWO
Update zoning and subdivision and land development ordinances to meet preservation goals, and impacts on the historic structures and character of neighborhoods.

ACTION THREE
Continue to interpret historic resources to the community through markers, publications, events, and other means, which include the narratives and resources of underrepresented groups and areas significant in local history.

ACTION FOUR
Continue to support downtown revitalization initiatives, local historical societies and their partners in efforts to coordinate communication among local, regional, and state preservation organizations.

ACTION FIVE
Support participation of municipal staff, elected and appointed officials in local, regional and statewide preservation and design educational opportunities.

ACTION SIX
Make information available to property owners and developers regarding federal and state rehabilitation tax incentives--including Pennsylvania's rehabilitation tax credit program--and context-sensitive design.

ACTION SEVEN
Support property owners in pursuit of National Register of Historic Places designation for significant individual properties and historic and cultural landscape districts.

ACTION EIGHT
Consider establishing local historic districts and boards or commissions to review the most significant historic and cultural places.

ACTION NINE
Coordinate with local historical societies, Main Street programs and neighborhood groups to develop interest and participation in documentation of buildings and history through architectural and historic surveys.

ACTION TEN
Support the creation and maintenance of a list of significant individual properties located outside historic districts, such as significant buildings from the recent past (less than 50 years old), structures such as sculptures, landscapes such as public spaces and cemeteries, archaeological sites, publicly owned properties (including schools and parks) or a revision to existing historic district boundaries along with individual historic properties.

5 **STRATEGY:** Identify and make available incentives and tools to encourage historic preservation. (Cont.)

ACTION ELEVEN
Require developers contemplating land-disturbing activities in architecturally or archaeologically sensitive areas to notify the Pennsylvania Historical and Museum Commission or any other applicable agency, document historic architecture and undertake archaeological studies prior to development.

ACTION TWELVE
Identify financial incentives or funding sources for local architectural and archaeological inventories and studies.

ACTION THIRTEEN
Develop narratives that provide the historical and architectural context for evaluating their significance and integrity.

ACTION FOURTEEN
Determine locations for Conservation Districts as an alternative, more flexible type of local historic district in designated neighborhoods.

ACTION FIFTEEN
Consider creating historic and cultural preservation plans, historic district ordinances, entrance and transportation corridor ordinances and design guidelines and review them every five years to ensure that goals for preservation and compatible new construction are being addressed.

COMMUNITY DESIGN

VISION: To promote creative, high quality design in new development that is compatible with existing development while also advancing long-range planning and community design goals

1

STRATEGY: Maintain existing traditional design features while encouraging creative, context-sensitive, contemporary planning and design.

ACTION ONE
Emphasize the importance of public buildings, public spaces, and other public improvements as opportunities to promote a sense of place and a welcoming environment for residents and visitors.

ACTION TWO
Promote Southwestern Lehigh County's diverse architectural and cultural heritage by recognizing, respecting, and enhancing the distinct characteristics of each neighborhood.

ACTION THREE
Identify potential nodes of density and vitality in Southwestern Lehigh County's mixed use corridors, and encourage vitality, pedestrian movement, and visual interest throughout the communities.

ACTION FOUR
Where practical, develop pedestrian-friendly environments that connect neighborhoods to community facilities, to commercial areas and employment centers, and that connect neighborhoods to each other, to promote a healthier community.

ACTION FIVE
Encourage community vitality and interaction through the incorporation of art in public spaces, neighborhoods, signage, and gateways.

ACTION SIX
Encourage the incorporation of meaningful public spaces into community design efforts.

ACTION SEVEN
Promote design excellence for public and private projects and installations at all scales.

2 **STRATEGY:** Ensure high quality development in Southwestern Lehigh County's community gateways and transportation corridors compatible with existing historic, architectural and cultural resources.

ACTION ONE
Emphasize placemaking elements and examine opportunities to create destinations and connect existing places.

ACTION TWO
Encourage site designs that consider building arrangements, uses, natural features, and landscaping that complement the community character of its surrounding environment.

ACTION THREE
Ensure that new development, including franchise development, complements the community character of its surrounding environment.

ACTION FOUR
Use street trees and landscaping along pedestrian routes to provide shade, enclosure, and accessibility in streetscapes. Encourage retaining and replenishing shade trees, particularly large trees where possible, in all neighborhoods.

ACTION FIVE
Protect and enhance access routes to community facilities, especially, parks and recreation facilities and schools to recognize their significance as cultural and economic assets.

ACTION SIX
Ensure that public facilities are located where there is good access.

ACTION SEVEN
Designate key transportation corridors as community gateways and critical corridor districts.

ACTION EIGHT
Promote Community Gateway and Transportation Corridor guidelines and coordinate these with historic resources to encourage continuity of land use, design, and pedestrian orientation between contiguous corridors.

3 **STRATEGY:** To modify commercial corridors to create a maintainable balance of uses.

ACTION ONE
Promote mixed-uses subject to guidelines that foster design quality and appropriate density.

ACTION TWO
Support the creation of multi-modal commercial design, especially in commercial corridors, to reflect current and future market demand, where appropriate.

3 **STRATEGY:** To modify commercial corridors to create a maintainable balance of uses. (Cont.)

ACTION THREE
Support regulations that allow for the easy addition to, reuse, mixing of uses and evolution of commercial strip centers.

4 **STRATEGY:** To promote the orderly development of new, well-planned residential environments.

ACTION ONE
Encourage the utilization of innovative residential development techniques such as conservation design, traditional neighborhood development, cottage housing, or contemporary infill to provide high quality residential living while minimizing impact upon natural features of a site.

ACTION TWO
Amend zoning ordinances to allow innovation in residential development.

ACTION THREE
Evaluate existing infrastructure and its relation to commercial and medium/high density residential zoning districts, maximizing the interplay between the two to concentrate new development into well-planned, aesthetic, mixed-use nodes.

HOUSING

VISION: To balance the preservation of vital landscapes with the accommodation of diverse needs.

1 **STRATEGY:** Housing supply and diversity should evolve to accommodate future housing demand.

ACTION ONE
Assess how regulations affect the balance between housing affordability and other objectives, such as environmental quality, urban design, maintenance of neighborhood character and increasing the tax base.

ACTION TWO
Develop zoning that encourages a mixture of housing at varying sizes and densities, along with appropriate supportive uses, to avoid over-dependence and excessive uniformity of residential development within the region.

ACTION THREE
Review existing zoning, subdivision, land development ordinances and zoning administration practices to ensure compliance with the Fair Housing Act or any applicable non-discrimination laws and revise as needed.

2 **STRATEGY:** Municipalities should create land use regulatory arrangements that distribute housing appropriately, balancing the preservation of vital landscapes with population growth.

ACTION ONE
Craft zoning regulations to maintain an appropriate distance between the conflicting land uses (generally industrial or high-traffic commercial) versus housing and agriculture.

ACTION TWO
Develop zoning and subdivision and land development regulations that, whenever possible, ensure screening, buffers or other methods of separating intensive uses.

2 **STRATEGY:** Municipalities should create land use regulatory arrangements that distribute housing appropriately, balancing the preservation of vital landscapes with population growth. (Cont.)

ACTION THREE
Apply the thresholds for land uses of regional significance, which will allow a higher level of scrutiny for development proposals that are likely to exert the greatest impact on nearby housing.

ACTION FOUR
Support residential development in areas where the land use plan recommends housing, with special effort devoted to concentrating higher density housing in areas with strong pre-existing infrastructural support.

ACTION FIVE
Coordinate across municipal boundaries to foster strong intermunicipal communication amidst contentious housing development proposals, as well as to "provide for all uses" at a regional—rather than a municipal—level.

3 **STRATEGY:** The region will work to stabilize or improve the municipal property tax base in older settled areas.

ACTION ONE
Develop and maintain an inventory of historic properties, with careful observation for clusters of contiguous properties that could form districts, including those that cross municipal boundaries.

ACTION TWO
Create a system and roster for monitoring both owner-and-renter-occupied units.

ACTION THREE
Develop a system for tracking persistent building code violations to determine patterns in the nature of the violations or in the landowners; share findings with adjacent municipalities to determine best practices in addressing these violations.

ACTION FOUR
Analyze code violations to determine patterns in the nature of those violations; share findings with adjacent municipalities to determine best practices in addressing the violations.

ACTION FIVE
Assess the conditions of infrastructure (roads, lighting, sidewalks, storm sewers), with particular attention to communities with declining median home sale prices.

ACTION SIX
Research both available grants and socioeconomic considerations in census tracts/block groups with higher levels of vacant or dilapidated housing to determine the optimal sub-regions for targeted economic development initiatives.

FREIGHT

VISION: To provide a transportation network that safely and efficiently accommodates freight traffic while preserving community character.

1 **STRATEGY:** Work collectively to encourage routing of regional freight traffic to the most appropriate and efficient roadways.

ACTION ONE
Keep track of industrial and commercial tenants and their employees and freight traffic generation to ensure that freight traffic is routed to appropriate locations and avoids impacts on local roads.

ACTION TWO
Plan for freight nodes that are strategically located to have convenient access to major thoroughfares and adequate infrastructure.

2 **STRATEGY:** Address trucking patterns to ensure facilities remain located exclusively in existing locations.

ACTION ONE
Ensure that ordinances address the need for on-site truck waiting areas, driver amenities, and necessary infrastructure to minimize idling, parking on public roads and impact on adjoining properties.

3 **STRATEGY:** Improve road network connectivity and safety related to freight traffic.

ACTION ONE
Create a formal process and develop a plan and/or zoning strategy that identifies and prioritizes freight infrastructure improvements. This should include policy guidance supported by engineering studies and/or recommendations for necessary first/last mile infrastructure improvements supported by relevant data such as crash statistics, intersection performance, percent of truck traffic, turning movement counts, pavement ratings, bridge ratings, and other indicators in support of a priority ranking.

ACTION TWO
Identify appropriate freight corridors and develop a program for road improvements that accommodates truck movements, including weight bearing materials and turning radii.

ACTION THREE
Work with PennDOT to develop a freight traffic map depicting routes trucks should utilize.

ACTION FOUR
Identify the most cost-effective measures to improve safety, mobility and capacity for freight.

4 **STRATEGY:** Identify the most cost-effective measures to improve safety, mobility and network capacity for freight.

ACTION ONE
Evaluate and/or consider regulatory provisions for buffering residential subdivisions from active rail lines.

ACTION TWO
Identify and prioritize at-grade rail intersections for both safety improvements and grade-separated rail crossings.

ROAD NETWORK

VISION: To provide a safe, well-maintained road network that facilitates the movement of traffic, capitalizes on existing road infrastructure, and enhances the integrity of the built and natural environment.

1 **STRATEGY:** Promote and develop a connected street network.

ACTION ONE
Develop ordinance amendments that prohibit cul-de-sacs in new residential developments as appropriate.

ACTION TWO
Where possible have all new development connect with nearby existing and planned residential subdivisions, schools, parks, and other neighborhood facilities.

ACTION THREE
Advocate the Turnpike Authority to consider trail connections and to incorporate a unique, context sensitive design into planned improvements for sound barriers, bridges, and signage.

ACTION FOUR
Develop a regional official map to identify necessary future improvements.

ACTION FIVE
Review transportation access management regulations and amend to reflect best available practices and techniques.

2 **STRATEGY:** Promote a proactive traffic calming and asset management program.

ACTION ONE
Actively pursue traffic calming and asset management funding and technical assist opportunities to implement projects and programs.

ACTION TWO
Consider implementing comprehensive traffic calming techniques that, at a minimum, discuss how the region will address complaints, perform studies, develop alternatives, and select and implement appropriate measures for local roads.

ACTION THREE
Develop a comprehensive traffic calming plan that discourages through traffic, including freight traffic, on strategically selected roadways. This includes the implementation of modern roundabouts, neighborhood traffic circles and curb bump-outs in strategic locations.

ACTION FOUR
Consider establishing and providing resources to a Transportation Advisory Committee or ombudsman that actively studies, prioritizes, and manages regional asset management and active multi-modal transportation programs.

ACTION FIVE
Require all new development proposals and redevelopment proposals to study adjacent roadways and demonstrate that volume to capacity ratios (LOS) are maintained or improved.

ACTION SIX
Identify opportunities and require green infrastructure and low-impact development techniques where infrastructure design opportunities arise.

BIKE/PED

VISION: To create a region that offers safe alternative transportation options to all residents and visitors.

1

STRATEGY: Promote walking and biking opportunities that offer safe and convenient routes to popular destinations, trail networks and parks.

ACTION ONE
Consider partnerships with bicycle oriented businesses and organizations to develop educational programs/materials for bikers and motorists alike.

ACTION TWO
Require bicycle and/or pedestrian design in all new developments and retrofits.

ACTION THREE
Establish goals and performance measures that create separated bike lanes on strategically selected local roadways.

ACTION FOUR
Develop a comprehensive sidewalk inventory to identify sidewalk and trail gaps, assess sidewalk condition, and plans for improvements where appropriate.

ACTION FIVE
Consider developing a regional bicycle and pedestrian plan.

ACTION SIX
Use temporary pilot projects to create and test new bicycleand pedestrian strategies where appropriate.

ACTION SEVEN
Use regulatory ordinances to require pathways be installed on at least one side of the street for all new development.

2 **STRATEGY:** Continually explore opportunities that offer enhanced accessibility and mobility and that support the travel demand needs of the region.

ACTION ONE
When and where appropriate, schedule discussions with LANta to explore enhanced transit services in appropriate places and where ridership is evident.

ACTION TWO
Consider using commuter data in support of implementing transportation demand management strategies (e.g. carpooling, park and rides) that reduce congestion.

TRANSPORTATION PROGRAM OPTIMIZATION

VISION: To work cooperatively as a region to create a robust transportation strategy that maximizes investment and efficiently responds to regional travel demand need.

1 **STRATEGY:** Collaborate with the appropriate federal agencies, state agencies, and adjacent communities to assure consistent and constant coordination related to transportation infrastructure projects.

ACTION ONE
Consider an organized approach for the review of new PennDOT construction projects that would be mutually beneficial and allow for constructive project design feedback, agency coordination, and construction oversight.

ACTION TWO
Consider developing a contribution program that assists PennDOT with design, right-of-way acquisition, utility work and/or environmental work in order to advance regionally significant projects.

2 **STRATEGY:** Create and maintain a transportation program that is dynamic and maximizes transportation funding investment.

ACTION ONE
Develop and evaluate performance measures related to transportation programs and infrastructure.

ACTION TWO
Utilize impact fees, aggressively pursue grant opportunities and utilize a coordinated capital improvement program to direct funding to prioritized improvements.

EFFICIENCY/ENGAGEMENT

VISION: To improve clarity, accessibility and coordination of Southwestern Lehigh County zoning, land use, preservation and design practices.

1 **STRATEGY:** To improve clarity, accessibility and coordination of Southwestern Lehigh County zoning, land use, preservation and design practices.

ACTION ONE
Review the successes and failures of prior public hearings to determine the best approach in terms of location, time of day/week, means of promotion, and organization of the hearing's proceedings.

ACTION TWO
As appropriate, establish a consistent approach to the administration of public hearings that corresponds to the administration of zoning and subdivision/land development.

ACTION THREE
When needed, communicate and coordinate public hearings with neighboring municipalities to allow trans-municipal promotion and to minimize conflicting schedules.

2 **STRATEGY:** Public entities should encourage or offer instructional opportunities on land use matters to boost civic engagement, awareness, and overall knowledge of community planning practices.

ACTION ONE
Set a budget for professional development and encourage that all planning/land use officials or administrators take at least one course sponsored by Pennsylvania Municipal Planning Education Institute (PMPEI) in their specialized topic.

ACTION TWO
Encourage coordination with other municipalities or the county planning agency on classes in community planning, through the Lehigh Valley Government Academy or similar services.

3 **STRATEGY:** Public entities should encourage or offer instructional opportunities on land use matters to boost civic engagement, awareness, and overall knowledge of community planning practices. (Cont.)

ACTION THREE
Consider building a shared municipal, publicly-viewable calendar for tracking the sequence of land development proposals or zoning/subdivision amendments, ensuring that the processes adhere to the sequence and deadlines stipulated by the Municipalities Planning Code (MPC).

ACTION FOUR
Ensure that new staff receive basic training on the MPC and the practices it dictates as they pertain to community planning.

4 **STRATEGY:** Leaders and elected officials should coordinate the actions of government, the private sector, and non-profit organizations to achieve environmental preservation and urban design goals.

ACTION ONE
Facilitate periodic meetings with local historical societies, municipal officials, planning commissions, environmental advisory councils, Main Street programs and interestedparties, organized under clearly articulated topics, to promote an excellent and consistent design vision for the Southwestern Lehigh County community.

ACTION TWO
Consider the effects of decisions by all publicdecision making bodies on historic and cultural resources.

ACTION THREE
Evaluate transportation decisions on state roads or those that pass through multiple municipalities, particularly for their effects on historic districts and individually protected properties.

ACTION FOUR
Work with local green building advocacy groups to develop sustainable and green building practices as complementary goals to historic preservation and model urban design.

ACTION FIVE
Coordinate across municipal boundaries and with other programs, such as affordable housing initiatives, to encourage preservation and rehabilitation of historic resources, including low income housing more than 50 years old.

ACTION SIX
Educate public works officials regarding maintenance and construction that would affect historic and cultural features.

ACTION SEVEN
Adopt a policy of applying the Secretary of the Interior Standards for Historic Rehabilitation for all publicly-owned property more than 50 years old, and apply appropriate preservation technologies in all additions and alterations, while also pursuing sustainable and energy conservation goals.

5685

WELCOME TO
LIMEPORT
STADIUM
PARKING
PARKING
PARKING

INTERNAL PLAN CONSISTENCY

INTRODUCTION

Due to the routine overlapping of subject areas, the Pennsylvania Municipalities Planning Code requires a demonstration of how interrelated plan components are integrated with one another and do not present conflicting visions, strategies or recommended actions. Ideally, there should also be a high level of consistency between the Southwestern Lehigh County Comprehensive Plan, the County Comprehensive Plan *(Comprehensive Plan The Lehigh Valley … 2030)* and municipal zoning.

The Pennsylvania Municipalities Planning Code requires that comprehensive plans also include a statement concerning compatibility with contiguous portions of neighboring municipalities and that school districts serving the six Southwestern Lehigh County municipalities be given the opportunity to provide comment on the various plan components.

This section summarizes procedures used to achieve consistency among all plans and plan components and ensure compatibility with neighboring municipalities and local school districts. The section then concludes with final steps necessary for municipalities to attain the full visions outlined in this plan.

INTERNAL PLAN CONSISTENCY

The following section briefly summarizes where the chapters and sub-chapters of this plan blend together most powerfully and express broader, overarching visions.

- Both the Natural Resources section and the Future Land Use Plan (Land Use and Development) indicate that little to no development should take place in the most sensitive areas, including floodplains, steep slopes and wetlands.
- Areas recommended for farmland preservation (Agriculture) must not overlap with areas recommended for internal growth (Land Use and Development).
- Urban development and economic development projects should locate where they can be served by existing or proposed sewer and water systems and highways (Economic Development, Land Use and Development, Transportation).

- Future water and sewer service expansions (Community Utilities) should only take place in areas where urban development should occur (Land Use and Development).
- Commercial and industrial development is not recommended in rural areas unless it is mainly to serve the surrounding rural residents. These developments should not put strain on existing infrastructure, which most likely involves low-traffic roads, on-lot sewer and on-lot water (Transportation, Land Use and Development, Community Utilities).
- A variety of housing types and densities can help promote diversity of housing choice, but not at the expense of natural resource protection areas or areas recommended for farmland preservation (Housing, Natural Resources, Agriculture).
- The redevelopment of vacant industrial and commercial sites (brownfields) is recommended as one way to improve the economy of the region's boroughs, with particular consideration to alignment with the existing architectural features and historic character (Economic Development, Community Design).
- Land uses or developments that exceed a certain threshold should be treated as regionally significant and serve as a benchmark for communication across all municipalities participating in the Comprehensive Plan (Land Use and Development, Civic Leadership, Housing, Economic Development).
- New civic buildings or structures to house municipal services should integrate with the design characteristics most reflective of the community's heritage or clearly articulated aesthetic values (Public Particicpation, Community Services, Community Design).

CONSISTENCY WITH THE COUNTY PLAN

The proper function of the county plan should be to establish an overall Lehigh Valley growth strategy that takes into consideration conservation of natural resources, logical areas for economic growth and proper planning for future infrastructure coordinated with land use considerations. The county plan does not strive to manage every land use activity in the Lehigh Valley. Correspondingly, municipal or multimunicipal comprehensive plans should hone in on "tip of the spear" issues that matter specifically to those municipalities. Most municipal plans account for subject areas such as farmland, development, natural resources and economic development at a level that is more detailed and often more stringent than the County Comprehensive Plan, while also nesting firmly within the County Plan's more generalized statements.

In terms of methodology and specificity, the Southwestern Lehigh County Comprehensive Plan differs from the County Comprehensive Plan in the following three areas:

- Natural Resources plan for the Southwestern Lehigh County Comprehensive Plan is based on a methodology for prioritizing natural resources modeled after the County Comprehensive Plan and uses more up-to-date mapped information.
- Areas recommended for farmland preservation in the Southwestern Lehigh County Comprehensive Plan are

based on more specific mapping of lands in agricultural production than used in the County Comprehensive Plan. However, both plans share a similar approach for evaluating the suitability and desirability for continued farming, which generally aims to preserve farming in larger blocks on better soils while also contributing to a more connected "green" system that includes parks and natural resource areas.

- The land recommended for urban development in the Southwestern Lehigh County Comprehensive Plan is based on development suitability factors that mirror the approach used for the County Comprehensive Plan to locate more intense land uses near existing sewer, water and road infrastructure.

COMPATIBILITY WITH NEIGHBORING MUNICIPALITIES AND LOCAL SCHOOL DISTRICTS

Pursuant to the Pennsylvania Municipalities Planning Code (Act of 1968, P.L. 805, No. 247, §301.3), copies of the draft Comprehensive Plan were forwarded to the chief executive in each of the following municipalities and the superintendent of each of the following public school districts for their review and comment. Additionally, the draft plan was sent to the planning commissions and major organizations of any neighboring county interested in the future of the Lehigh Valley. The required 45 day review period began on July 21, 2017 and ended on September 4, 2017 with comments forwarded to the Lehigh Valley Planning Commission.

NEIGHBORING MUNICIPALITIES

In Lehigh County:

- Upper Saucon Township
- Salisbury Township
- City of Allentown
- South Whitehall Township
- Upper Macungie Township

In Berks County:

- Hereford Township
- Longswamp Township
- Maxatawny Township

In Bucks County:

- Milford Township
- Springfield Township

In Montgomery County:

- Upper Hanover Township

School Districts

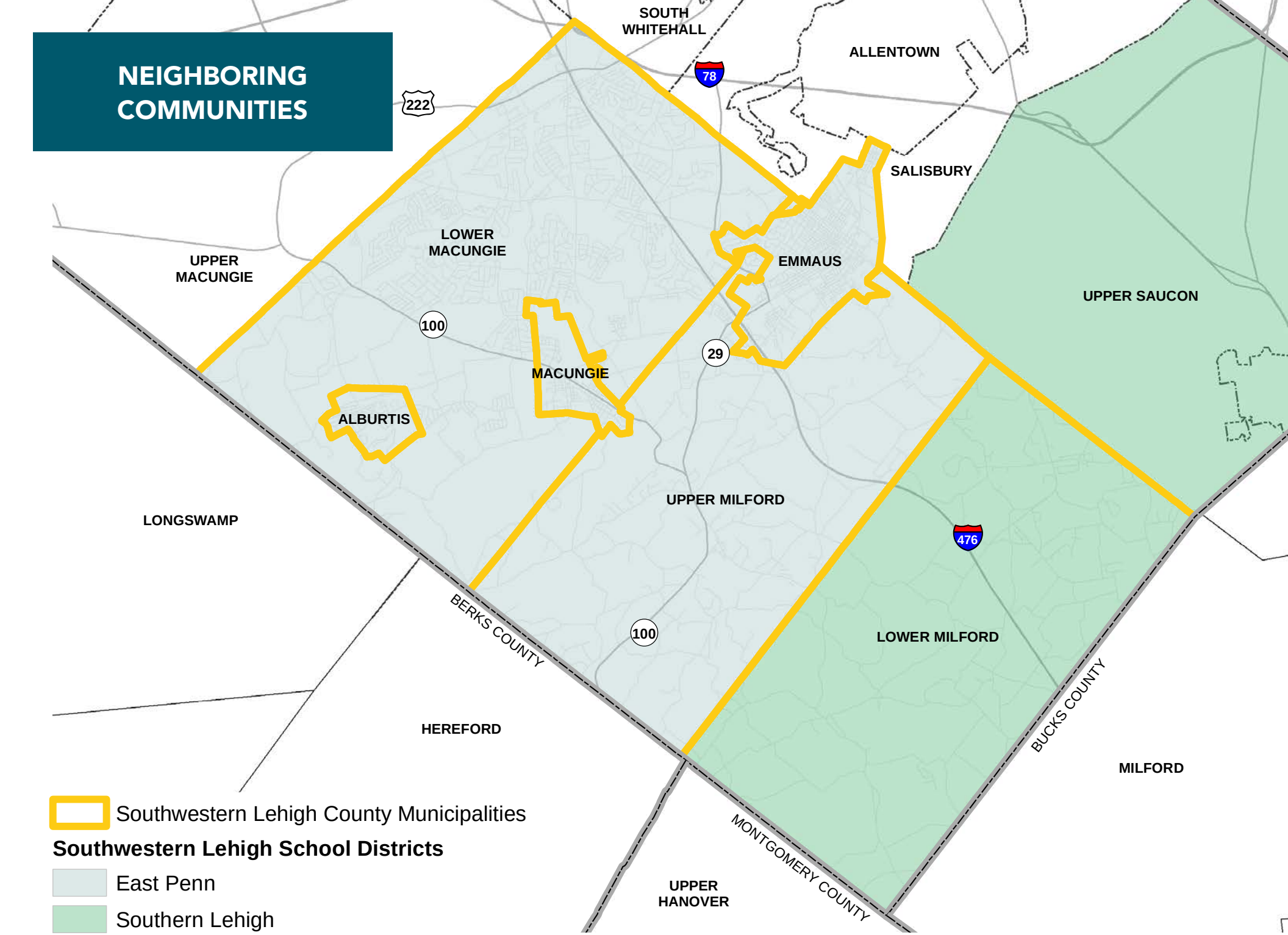
- Southern Lehigh School District (Lower Milford Township)
- East Penn School District (the remaining five municipalities).

ADDITIONAL ACTIONS

In addition to the visions, strategies and actions detailed in this plan, there are other steps municipalities can take to more fully achieve the local and regional goals outlined here. Issues the municipalities may wish to address include the following:

- Some municipalities can be more proactive in preserving environmentally sensitive areas. Key implementation measures include property acquisition and environmental zoning protection.
- This plan recommends farmland protection in a number of townships. Most areas recommended for farmland preservation are zoned for agriculture, and many of these lands enjoy protections through Agricultural Security Areas or Conservation Easements. However, where such protections do not exist or are not strong enough, municipalities that intend to preserve large, contiguous areas of farmland should adopt effective agricultural zoning of the type recommended in the Comprehensive Plan The Lehigh Valley … 2030 (p. 37). Furthermore, preservation of smaller noncontiguous agricultural parcels may require additional, more specialized programs and approaches.
- Suburban municipalities should update their zoning ordinances and other plans as needed to allow for the variety of housing types and densities recommended in the county plan, thereby increasing the availability and affordability of housing to a wide array of the population.
- Municipalities should proactively address local transportation issues and take into consideration the transportation impacts of their land use plans. Furthermore, municipalities should avoid relying too heavily on PennDOT for access management controls and set realistic expectations concerning the availability of federal and state funds for new interchanges on major highways and bypass roadways around their communities. The Lehigh Valley Planning Commission will continue assisting municipalities in ensuring consistency between their land use and transportation plans, as well as with the County Comprehensive Plan.
- Municipal planning for sewer infrastructure through Act 537 planning is generally consistent with the development goals and policies of the County Comprehensive Plan. Municipalities need to ensure that Act 537 plans are updated as needed to address existing and future needs.
- Municipalities should encourage community public water suppliers to develop and implement source water and well water protection plans.
- Municipalities should be proactive in their planning and zoning and make fuller use of planning tools enabled by the planning code. Municipal plans should articulate and address the goals of the municipality and should anticipate proposed development rather than simply react to it.

NEIGHBORING COMMUNITIES



CONCLUSION

The update of this Comprehensive Plan comes at an opportune time for Southwestern Lehigh County, allowing its municipalities to coordinate among themselves and respond to emerging trends shaping its future. Changes in the housing market and residential preferences have resulted in fewer single family housing developments, increasing suburban apartment living opportunities and the growing popularity for living in the region's downtowns and historic cores. Likewise, the growth of the Lehigh Valley's logistics and manufacturing industries have brought attendant changes in local land use and development patterns. The visions, strategies and actions outlined in the updated plan will enable the region to manage and coordinate its growth, while also preserving the characteristics cherished by its citizens.

Over the course of the plan development process, citizens clearly expressed their concerns about severe negative impacts that high-intensity development has had in Southwestern Lehigh County, particularly in terms of congestion and roadway conditions. The updated plan provides the region and its contributing municipalities with a variety of approaches for developing an integrated and connected transportation network, managing increased freight traffic and making the most efficient and effective use of the region's transportation resources.

Reflecting the citizens' desire to protect agricultural and natural resources, the plan provides effective tools and approaches for preserving the region's cherished natural resources, ensuring the continued existence and viability of local agriculture, and avoiding unplanned or undesirable incursions into these landscapes. The updated plan includes visions, strategies and actions to minimize the land that is consumed by both residential and non-residential development, manage the intensity of such development, and direct development where it is most appropriate in terms of infrastructure and desired land uses.

Finally, as the de facto downtowns of the region, the boroughs of Alburtis, Emmaus and Macungie, as well as other crossroads villages in the townships, will play an increasingly vital role in Southwestern Lehigh County's evolving and blended built environment. With their traditional form and scale, these "historic core" communities can provide a blueprint, as well as the building blocks, for more compact and pedestrian-oriented patterns of development. Furthermore, these downtowns can also anchor larger transportation and economic networks, while showcasing the region's aesthetic and cultural heritage.

The cumulative vision articulated in this plan and supported through the accompanying strategies and actions serves as a powerful tool for guiding future land use decisions and ensuring the retention of the region's high quality of life in the years ahead.

PLANSWL MUNICIPALITIES INFORMATION

Alburtis – Emmaus – Lower Macungie – Lower Milford – Macungie – Upper Milford

ALBURTIS

Supervisor/Council
Ronald Delaco
Steven Hill
Kathleen Raines
Vanessa Taggart
Stephen Kaufman
Sherryann Oels
John Aleszczyk

Planning Commission
Robyn Petrie
Jason Douglas
Steven Mehl
Ron Delaco
Brain DeRienzo
Sharon Trexler
Bernard Servagno

Zoning Hearing Board
Nick Evans
June Claydon
Thomas Miller

Manager/Mayor/Administrator
Mayor Kathleen Palmer
Manager Sharon Trexler

EMMAUS

Supervisor/Council
Brent Labenberg
Wesley Barrett
Roy Anders, Jr.
Nathan Brown
Chris DeFrain
Lee Ann Gilbert
Jeff Shubzda

Planning Commission
Michael Gibson
Robert Toth, Sr.
Jackie Parks
Todd Ackerman
JP Raynock
David Weidman
Brent Stringfellow

Zoning Hearing Board
Roger Steinmayr
Susan Schmidt
Theodore Iobst II
Ronald Gilbert
Don Nickerson
Ronald Corkery
James Farnsworth

Manager/Mayor/Administrator
Mayor Winfield Iobst

LOWER MACUNGIE TOWNSHIP

Supervisor/Council
Douglas Brown
Benjamin Galiardo
Brian Higgins
Ronald R. Beitler
Ronald W. Beitler

Planning Commission
Maury Robert
Brent McNabb
Ann Bartholomew
Jon Hammer
Thomas Beil
George Doughty
Robert Rust

Zoning Hearing Board
Scott Aquila
Thomas Sesta
E. Keller Kline, III
Richard Ward
Melissa Burchett

Manager/Mayor/Administrator
Manager Bruce Fosselman

LOWER MILFORD

Supervisor/Council
Donna Wright
Michael Snovitch
John Quigley

Planning Commission
Lois Gadek
Ellen Koplin
Cathleen Bannon
Alicia Johnson
Gail Linde
Bernard McManus
Donna Wright

Zoning Hearing Board
Sheila Quigley
Girard Graham
Roger Hall
Denise Holub
James Stango

Manager/Mayor/Administrator
Manager Ellen Koplin

MACUNGIE

Supervisor/Council

Chris Becker
Roseann Schleicher
Greg Hutchison
David Boyko
John Yerman
Alma Akinjiola
Marvin Moyer

Planning Commission

Allen Crawford
John Yerman
Linn Walker
Chris Becker
Betty Silfies

Zoning Hearing Board

John Horner Jr.
Ronald Karboski
Barry Bloch

Manager/Mayor/Administrator

Mayor Gary Cordner
Manager Chris Boehm

UPPER MILFORD

Supervisor/Council

George DeVault
Daniel Mohr
Robert Sentner

Planning Commission

Matthew Hunter
Joyce Brown
Phil Hartranft
Susan Smith
Henry Kradjel
Ronald Guth
Angelika Forndran
Judith Parker
Robert Sentner

Zoning Hearing Board

Francis Caputo
Thomas Roland
Edward Martin
Linda Feiertag
Bennett Kohler
Dannell Macilwraith
Lawrence Butler

Manager/Mayor/Administrator

Manager Daniel DeLong

LEHIGH COUNTY EXECUTIVE

Tom Muller

LEHIGH COUNTY COUNCIL

Thomas Creighton III
Percy Dougherty
David Jones
Geoff Brace
Michael Schware
Brad Osborne
Amanda Holt
Dan Hartzell
Marty Nothstein

EAST PENN SCHOOL DISTRICT

Superintendent

Michael Schilder

SOUTHERN LEHIGH SCHOOL DISTRICT

Superintendent

Kathleen Evison

STATE REPRESENTATIVES

Ryan Mackenzie (Alburtis, Lower Macungie, Macungie)

Justin Simmons (Emmaus, Lower Milford, Upper Milford)

STATE SENATORS

Patrick Browne (Alburtis, Lower Macungie, Macungie, Lower Milford, Upper Milford)

Lisa Boscola (Emmaus)

FEDERAL REPRESENTATIVE

Charlie Dent

FEDERAL SENATORS

Bob Casey
Pat Toomey

SWL Noun Project Icon Illustrators: Diego Naïve, Danil Polshin, OCHA Visual Information Unit, Chameleon Design, Tinashe Mugaye, Gregor Črešnar and SooAnne. All other images were free, designed, or modified

LEHIGH VALLEY PLANNING COMMISSION

Liesel Dreisbach, Chair

Stephen Repasch, Vice Chair

John N. Diacogiannis, CPCU, Treasurer

Christen T. Borso

John Brown

Gordon Campbell

Eugene Clater

Robert Donchez

Percy H. Dougherty, PhD

Karen Duerholz

Charles W. Elliott, Esq.

George F. Gemmel

Steven L. Glickman, RA, NCARB

Armand V. Greco

Darlene Heller, AICP (alt.)

Tim Herrlinger (alt.)

Kent H. Herman, Esq.

Edward D. Hozza, Jr.

Robert A. Lammi

Kevin Lott

Richard Molchany (alt.)

Christina V. Morgan

Thomas Muller

Steven L. Neratko (alt.)

Thomas J. Nolan

David O'Connell

Brad Osborne

Sara Pandl, AICP, RLA

Salvatore J. Panto, Jr.

Edwin Pawlowski

Pamela Pearson, MBA

Hayden Phillips

Lynn Prior

Kathy Rader

Michael Reph

Tina Roseberry (alt.)

Kevin A. Schmidt

Julie Thomases

Christine Weaver

Donna Wright

LEHIGH VALLEY PLANNING COMMISSION STAFF

Becky A. Bradley, AICP, Executive Director

Bruce R. Rider, Director of Administration

Geoffrey A. Reese, P.E., Director of Environmental Planning

George G. Kinney, AICP, Director of Transportation Planning

Amanda L. Raudenbush, AICP, Director of Community Planning

Matt Assad, Managing Editor

David E. Manhardt, AICP, Chief Planning Consultant

Tracy L. Oscavich, Associate Director of Development

Justin Barclay, Senior Geographic Information Systems Planner

Michael S. Donchez, Senior Transportation Planner

Teresa Mackey, Senior Environmental Planner

Susan L. Rockwell, Senior Environmental Planner

John D. von Kerczek, Principal Community Planner

Jillian Seitz, Community Planner

Whitney A. Burdge, Urban Design Planner

Brian Hite, Senior Planning Technician

Bowen Liu, Geospatial and Economic Systems Developer

Craig Kackenmeister, Graphic Designer/Publication Coordinator

Dharam Paul Nohar, Accountant

Erin Willis, Executive Secretary

Kevin McGowan, Hazard Mitigation Intern

PUBLIC PARTICIPATION

Dave Ainoz
Scott Alderfer
Steve Althouse
Steve Altmorgo
Jim Baker
Chuck Ballard
Thomas Bartholomew
Chris Basile
Trey Bianco
Bernie Bojnowski
Troy Bower
Eric Boyle
Joe Colosi
Chris Cope
Bill Coyle
La Belle Cuisine
Judy Darher
Dave Detwiler
Bill Devdy
Risa Donegan
Kate Durso
Ron Eichenberg
Melody Engel
Diane Fleming
Jane Fretz
Sonya Fullerton
Dawn Gorham
Chris Greb
Liesel Gross
Trai Guzie
Virginia Haas
Tim Haas
Tracy Hausknecht
John Hayas
Joe Hayes
Lisa Heineman
Kirsten Hess
Amy Hillegass
Bruce Hillegass
Karen Holt
Donna Hosfeld
Dan Hunsicker
Adam Jaindl
David Jaindl
Nancy Jo Mulry
Jeremy Jones
Elizabeth Judge Wyant
Ryan Kern
Dain King
David Knerr
Thomas Kociuba
Randy Kraft
Marian Lanshe
Dave Laubach
Frederick Learey
Mark Lichtenwalner
Houstin Lichtenwalner
Lowell Linde
Dave Lobak
Joyce Marin
Steve Markowitz
Kenneth Mattos
Joe McAndrew
Michael McCready
Laura McCready
Julie McDowell
Jeff McElhaney
Douglas McNair
Joyce Moore
Neil Moser
Nancy Jo Mulry
Vince Mulry
Ken Navitsky
John Neilson
Susan Nenstiel
Nancy O'Keef
Kevin Oldt
Jeffrey Ott
Jim Palmquist
Leah Papp
Shane Pepe
Roger Phillips
Steve Pohowsky
Dustan Raines
Doug Reichley
Edward Rekai
Frances Rekai
Kathee Rhode
Christopher Sacchi
Lynn Sallash
John Schlener
Donald Scott
Bill Sellers
Anton Shannon
Carol Sheen
Lori Sickenberger
Michael Siegel
Matt Skekel
Tracy Smith
Teri Sorg-McManamon
Nicole Steirer
Chris Steirer
Sybil Stershic
Mike Stershic
Nicole Stierer
Matt Szuchyt
Chris Takacs
Lindsay Taylor
Julie Thomases
Ron Thornton
Jeff Titchenal
Beth Titchenal
Monica Trilli
Philip Vanim
Andy Wagaman
Steve Walsh
Andy Werner
Sarajane Williams
Elizabeth Wyant
Vincent Yeakel
Brad Youst
Fred Zahradnick
Jeff Zehr

PLAN
SWL
SOUTHWEST LEHIGH COUNTY