



US 422 CORRIDOR MASTER PLAN

US 422 CORRIDOR MASTER PLAN SUMMARY REPORT



December 2010

Prepared for:



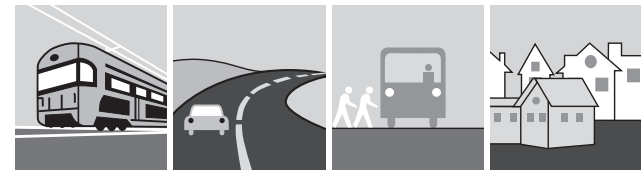
In partnership with:

Berks County Planning Commission
Chester County Planning Commission
Montgomery County Planning Commission
PennDOT District 5-0
PennDOT District 6-0

Prepared by:



GVF Transportation
SEPTA
The Pennsylvania Turnpike Commission
Pottstown Area Rapid Transit



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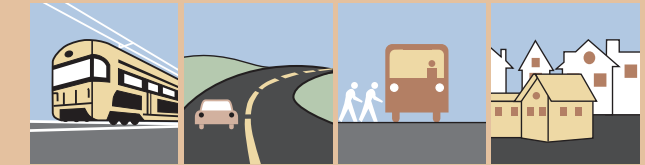


The **Delaware Valley Regional Planning Commission** is dedicated to uniting the region's elected officials, planning professionals and the public with a common vision of making a great region even greater. Shaping the way we live, work and play, DVRPC builds consensus on improving transportation, promoting smart growth, protecting the environment, and enhancing the economy. We serve a diverse region of nine counties: Bucks, Chester, Delaware, Montgomery and Philadelphia in Pennsylvania; and Burlington, Camden, Gloucester and Mercer in New Jersey. DVRPC is the federally designated Metropolitan Planning Organization for the Greater Philadelphia Region — leading the way to a better future.

The symbol in our logo is adapted from the official DVRPC seal, and is designed as a stylized image of the Delaware Valley. The outer ring symbolizes the region as a whole. The diagonal line represents the Delaware River and the two adjoining crescents represent the Commonwealth of Pennsylvania and the State of New Jersey.

DVRPC is funded by a variety of funding sources including federal grants from the U.S. Department of Transportation's Federal Highway Administration (FHWA) and Federal Transit Administration (FTA), the Pennsylvania and New Jersey departments of transportation, as well as by DVRPC's state and local member governments. The authors, however, are solely responsible for the findings and conclusions herein, which may not represent the official views or policies of the funding agencies.

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US 422 CORRIDOR MASTER PLAN

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CHAPTER 1 - INTRODUCTION

The US 422 Corridor planning area, from King of Prussia to southeastern Berks County, includes a considerable planning area encompassing over 200 square miles in southern Montgomery, northern Chester and southern Berks Counties, Pennsylvania. The corridor is approximately 25 miles long, spanning three counties and encompassing 24 local municipalities:

- Amity Township
- Bridgeport Borough
- Collegeville Borough
- Douglass Township
- East Coventry Township
- East Pikeland Township
- East Vincent Township
- Limerick Township
- Lower Pottsgrove Township
- Lower Providence Township
- Norristown Borough
- North Coventry Township
- Phoenixville Borough
- Pottstown Borough
- Royersford Borough
- Schuylkill Township
- Spring City Borough
- Trappe Borough
- Tredyffrin Township
- Union Township
- Upper Merion Township
- Upper Providence Township
- West Norriton Township
- West Pottsgrove Township

The corridor begins 20 miles west of Philadelphia in Upper Merion Township, and extends west to Amity Township in Berks County (see **Figure 1**).

The study area, a landscape of rolling hills, is bisected by the Schuylkill River. The river valley was an important transportation route in the eras of canals and railroads, connecting Philadelphia and its port with the rich coal, iron ore and lumber regions to the north and west. The older communities within the planning area (now boroughs) are either river towns or are located along Ridge Pike.

The general land use of the corridor is depicted in **Figure 2**. The most densely developed and heavily populated area is King of Prussia to the east. Home to one of the nation's largest shopping malls, King of Prussia is located at the interchange of the Pennsylvania Turnpike (I-76/276) and the Schuylkill Expressway (I-76). This edge city grew extensively after the completion of the interchange between the two expressways and is now a major retail and employment center. This growth extends along the US 202 corridor. Similarly, the growth of newer and emerging suburban areas is being fueled by access to US 422.

US 422 is probably the single most important and fastest growing suburban expressway in the Philadelphia suburban region, carrying over 100,000 vehicles (AADT) on some eastern sections. US 422 is the central artery of the region connecting older cities and towns along the Schuylkill River, as well as newer and emerging suburban communities to destinations to the east like King of Prussia, Plymouth Meeting, Great Valley and Philadelphia.

US 422 also serves as a local expressway for short trips to commercial centers and major interconnecting routes, such as PA 23 and PA 100. This corridor follows the Schuylkill River, historically a transportation route served by canals, freight rail and a non-expressway road network.

US 422 is an integral part of the inter-regional highway network. At the western end of the corridor near Reading, US 422 provides connections to US 222, PA 61 and I-176. At the eastern end of the corridor, US 422 provides connections to US 202, I-76, I-276 and I-476.

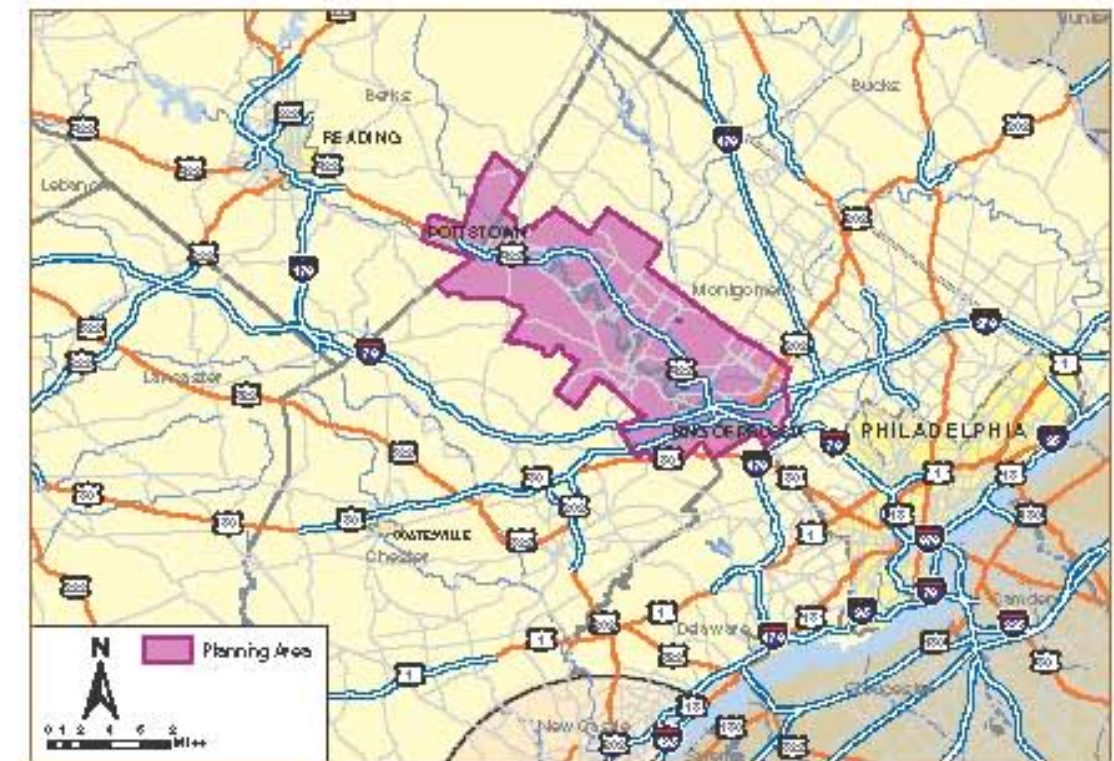
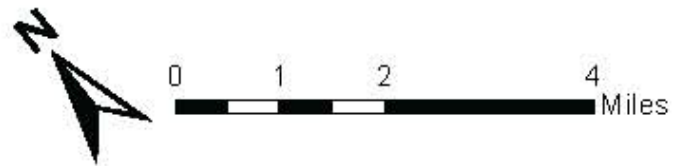
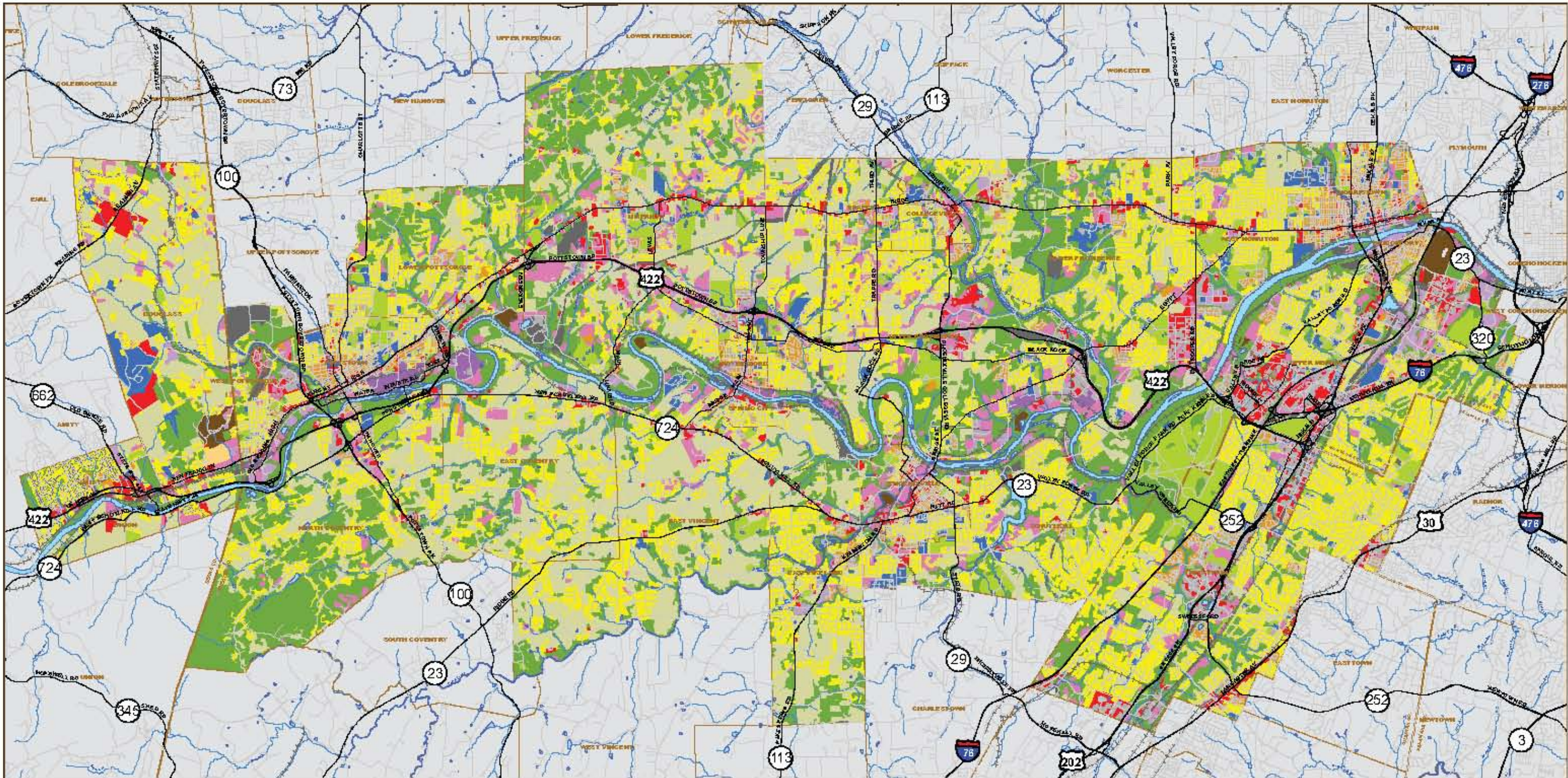


Figure 1 – Location of US 422 Corridor within Region (Prepared for DVRPC; Prepared by McCormick Taylor)



Legend

- | | | |
|---------------------|------------------------------------|--------------------------|
| Agriculture | Mining | Residential-Mobile Home |
| Commercial | Recreation | Parking |
| Community Services | Residential-Single Family Detached | Transportation & Utility |
| Light Manufacturing | Residential-Single Family Attached | Vacant |
| Heavy Manufacturing | Residential-Multi-Family | Wooded |

US 422 Corridor Master Plan

EXISTING LAND USE 2005

Source: DVRPC Land Use, 2005 & Berks County Parcels, 2008.

Figure 2

Prepared for: **DELAWARE VALLEY DVRPC REGIONAL PLANNING COMMISSION**
 Prepared by: **McCormick Taylor**
 Engineers & Planners Since 1946
 December, 2009

PURPOSE OF THE CORRIDOR PLAN

The US 422 Corridor Master Plan is needed to provide a unified framework and vision for land use and multi-modal transportation planning to deal with rapid growth and heightening traffic congestion in the corridor. The plan is intended to:

- Improve the safety and efficiency of the area's transportation system by analyzing the condition of the network
- Identify mobility needs throughout the corridor
- Strengthen the linkage between land use and transportation

The Corridor Master Plan identifies existing conditions and development activity, assesses projected development/redevelopment trends and their impacts on the transportation network, and develops a corridor-wide implementation plan for integrating transportation and land use.

The plan considers capital improvements such as interchange redesign, operational improvements such as Intelligent Transportation Systems (ITS), and incident management activities, as well as potential transit opportunities such as developing bus rapid transit (BRT) and reestablishing passenger rail service. The plan proposes a range of implementation strategies for highways, transit, pedestrian and bicycle improvements;

intermodal connections; agricultural preservation; riverfront access; and land use planning tools and strategies. The plan also considers the use of alternative funding sources such as electronic tolling and public-private partnerships.

Many organizations, both public and private, have recognized the need for a new approach to managing transportation in the corridor. Significant investments have already been made at various locations that begin to address the transportation problems and many studies have been done that identify other potential solutions. However, this is the first that integrates prior studies and ongoing projects to provide a long-term vision for the future land use and transportation system of the overall corridor.

THE NATURE OF THE PROBLEM AND NEED FOR BETTER PLANNING

Traffic congestion in the US 422 Corridor has been increasing in recent years. There are many reasons why. The corridor's pace of growth picked up dramatically after the opening of US 422, driven by a wave of commuters willing to drive longer distances for more land and housing at lower prices. From 1990 to 2000, the population of many communities in the corridor increased at double- and even triple-digit rates. So too, scattered land development consumed vast acreage. The development pattern that emerged is almost totally dependent on the automobile for mobility. As a result, the subsequent demand for transportation facilities and services has greatly exceeded any agency's ability to add sufficient roadway capacity.

Traffic problems are a direct result of land development. Land use patterns influence travel patterns and largely



Typical suburban growth pattern along the US 422 Corridor.

CHAPTER 1

dictate modes of transportation taken. Land development in the corridor is becoming increasingly suburbanized. Suburb development is typically low density, single-use and automobile dependent. A 1998 study for the National Resources Defense Council showed that low density sprawl is costly, inefficient and inequitable. Sprawl uses more resources, such as fuel, than traditional city and town development, and requires costly expansions of infrastructure, such as public water and sewer service. This development trend has significant impacts on the area's transportation system. Simply, sprawl is



Scattered, low density residential development is prevalent throughout the US 422 Corridor.

not an efficient use of land or a transit-friendly form of development. Without other transportation options, the corridor's roadways will become increasingly congested.

Today's mobile society places increasing burdens on our roadways. Congestion is the result. So we end up sitting in traffic instead of driving in it, which delays and frustrates us all. The Texas Transportation Institute (TTI) reports that Americans waste more than 4.3 billion hours a year stuck in traffic. That's about 34 hours per driver. Consequently, traffic congestion is considered a growing threat to the nation's economy and, locally, to the quality of life of residents in the corridor.

The US 422 Corridor represents a unique set of challenges for:

- Commuters who drive the road everyday
- Planners and engineers who try to anticipate future travel demands
- Public officials to find fundable solutions and modal alternatives to a growing demand for mobility and access

The traditional approach to transportation planning seeks to respond to travel demand and congestion relief with additional capacity. Yet, the rate of road building has been unable to keep pace with the increase in demand. The magnitude of this problem is large enough to affect when and where people will travel. Over the last decade it has been clear that planning must now address the travel demand side of the equation through trip reduction, modal alternatives and smart growth/land use planning.

Despite progress with growth management, and better land use planning and potential transit enhancements, the US 422 Corridor continues to attract population, commercial growth and sprawl. Some growth is concentrated in designated growth areas, but much continues to occur in a dispersed pattern where transportation and other infrastructure are inadequate and often incompatible with the surrounding land uses. Despite Commonwealth policies for Smart Transportation and county growth management strategies, it is primarily the current lack of transportation funding for large scale highway expansion that forces a more strategic approach to mobility along the US 422 Corridor.

Because the US 422 Corridor extends through such an expanse of land area and diverse local jurisdictions in three counties, a comprehensive Master Plan with a strategic focus for the corridor is critically needed. Any plan for US 422 must include the regional, inter-regional and local functions of this roadway, as well as its relationship to transit modes, future transit opportunities, population trends and future land use changes in this high growth corridor.

PLAN DEVELOPMENT

Development of the US 422 Corridor Master Plan proceeded through a number of phases. The first phase was an examination of existing conditions, including a review of previous reports and studies. Data was collected from a number of sources and analyzed. The Delaware Valley Regional Planning Commission (DVRPC) compiled available traffic information, conducted background research, and assembled appropriate reports from in-house and corridor sources. DVRPC also prepared thematic mapping, illustrating information such as:

- Average annual daily traffic volumes
- Transit services
- Highway classifications
- Existing land use
- Human and natural environmental features
- Sewer and water service areas
- Current Transportation Improvement Program (TIP) projects
- The 2030 Long-Range Plan
- Population and employment forecasts (2030)
- Commuter trip destinations from corridor communities
- Recent development applications and proposals

The results of this planning stage were documented in *Technical Memo #1: Background Materials and “Developments Exercise”* and in the “Supporting Analysis and Maps” section of *Technical Memo #2: Assets, Constraints and Opportunities*.

An analysis of the corridor’s transportation and land use assets, constraints, and opportunities followed. This second phase of plan development focused on analysis. Growth and development trends were examined, and future transportation conditions forecasted. During this time, members of the Steering Committee toured the corridor to better understand challenges and opportunities from a corridor perspective rather than from a more narrowly defined set of local interests. The results of this planning stage were documented in *Technical Memo #2: Assets, Constraints and Opportunities*.

The third phase of plan development was an exploration of alternative land use and transportation futures. Future land use and transportation needs were determined. The continuation of existing trends would result in the Trend Alternative. The Sustainable Alternative was developed

as an alternative future in which municipalities manage and direct growth to meet community needs while reducing future strain on the transportation infrastructure. The results of this planning stage were documented in *Technical Memo #3: Future Land Use and Transportation Conditions*.

The fourth phase was the development of potential strategies and an implementation plan. The implementation plan identifies associated costs and other programmatic considerations. The Master Plan focused on a 2030 time horizon to ensure that the recommendations remain reasonably valid for at least 10 years. The recommendations for implementation of the plan are phased to include immediate, short-term, and long-term land use and transportation improvements over a 20-year period. During this phase, representatives of the corridor’s municipalities toured the corridor to see how and where the strategies would be applied as recommendations.

Throughout plan development, workshops were held with the Steering Committee and the US Route 422 Corridor Coalition to develop the Master Plan. The public outreach program was a driving force for the direction of the Master Plan. In February 2009, DVRPC conducted two identical public plans displays at locations at each end of the corridor to encourage public input into the Corridor Master Plan. In June, a second set of public meetings was held to display the draft plan’s preliminary recommendations. All meetings were well attended. Copies of the displays, handout and questionnaire from the public meetings were also made available to the broader public through the US Route 422 Corridor Coalition website. Public Opinion Reports were prepared that summarize the comments received at the public meetings, as well as through the Coalition’s website.

The ultimate implementation of the US 422 Corridor Master Plan requires that it reflect a shared view for the future of the corridor communities. This vision must be practical in that it considers today’s challenges, recognizes the diversity of needs along the corridor, and identifies implementation steps toward realizing that future.

STAKEHOLDER COORDINATION

To bolster its successful implementation, the US 422 Corridor Master Plan was developed by DVRPC in partnership with a multi-jurisdictional Steering Committee comprised of staff from the planning commissions of Berks, Chester and Montgomery Counties; PennDOT District 5-0; PennDOT District 6-0; the Greater Valley Forge Transportation Management Association (GVF Transportation); SEPTA; the Pennsylvania Turnpike Commission; and Pottstown Area Rapid Transit.



Steering Committee tour of the US 422 Corridor.

CHAPTER 1

In addition, the US Route 422 Corridor Coalition was used as a sounding board, reviewing and providing feedback on work efforts. The Corridor Coalition is a longstanding open forum where transportation and planning organizations, corporations, municipal governments and elected officials meet to discuss transportation and land use issues relevant to the US 422 Corridor. The Coalition brings together various organizations with one common goal:

solving the transportation issues facing the corridor. Often, development in one community has adverse effects on the transportation systems of the neighboring communities. Since traffic congestion is a regional problem, the solutions will only be effective if they are regional in scope. The Coalition provides the region with the means to solve these transportation issues.



Many boroughs in the corridor have charming Main Streets. Phoenixville is shown above.

SMART CORRIDOR THEMES

What is Smart Transportation? In Pennsylvania, Smart Transportation is defined as “partnering to build great communities for future generations of Pennsylvanians by linking transportation investments and land use planning and decision-making.”

The Guiding Principles for Smart Transportation include:

- Tailor solutions to the context
- Tailor the approach
- Plan in collaboration with the community
- Plan for alternative modes
- Use sound professional judgment
- Scale the solution to the size of the problem

A number of smart corridor themes, consistent with the Guiding Principles, were considered during development of the Master Plan.

Leverage and preserve existing investments – The planning area includes a number of regional transportation routes, including US 422, the Pennsylvania Turnpike, US 202, a number of state routes, the Schuylkill River Trail, and the potential future R6 Regional Rail line. The area also has an extensive network of arterial and collector roadways. This study examined ways to maximize the utility of these investments and expand on transportation alternatives in the corridor so that these investments continue to serve in an efficient manner.

One of the tenets of Smart Growth is investing (and reinvesting) in older, developed areas. Redevelopment,

infill development and development that is mixed or at higher densities can lead to less reliance on the private automobile, slowing the growth of traffic congestion.

High value/price ratio – The planning area and its vicinity include some of the most highly valued cultural, historic, environmental and employment-based destinations in the region. By planning cooperatively for the coordination of a number of private and public investments in the area, the US 422 Corridor Master Plan leverages these investments to improve the value of these destinations. The Master Plan looks at ways to enhance access to recreational sites and activities along the Schuylkill River, preserve open space and greenway connections, reduce commuting times and improve quality of life for local residents.

Look beyond level-of-service – A number of transportation changes may be considered as land development continues in the corridor. Before commitments are made for significant investments, implications of both land use and transportation changes to the area need to be examined. The US 422 Corridor Master Plan looks well beyond a single performance measure and includes an integration of land use and multi-modal transportation opportunities.

Accommodate all modes of travel – The area includes federal and state highways, local road networks, freight rail lines, a potential passenger rail line, bus routes, and multi-use trails for pedestrians and bicyclists. This plan integrates land use and transportation and examines the best possible alternatives for improving safety, access, travel times and quality of each of these modes of travel.

Enhance local network – The presence of the Schuylkill River, Perkiomen Creek, railroad lines, and US 422 each create obstacles to travel. Recognizing the high cost of bridges, the US 422 Corridor Master Plan considers ways to enhance the local street network in a cost-effective way.

Plan and design within the context – A future vision for this area must be responsive to the area’s unique attributes and character.

The potential strategies for achieving a sustainable future for the US 422 Corridor were developed with these themes in mind. In addition, the US 422 Corridor Master Plan was developed to be consistent with Pennsylvania’s *Keystone Principles for Growth, Investment and Resource Conservation*. For more information about the Keystone Principles, see box at right.

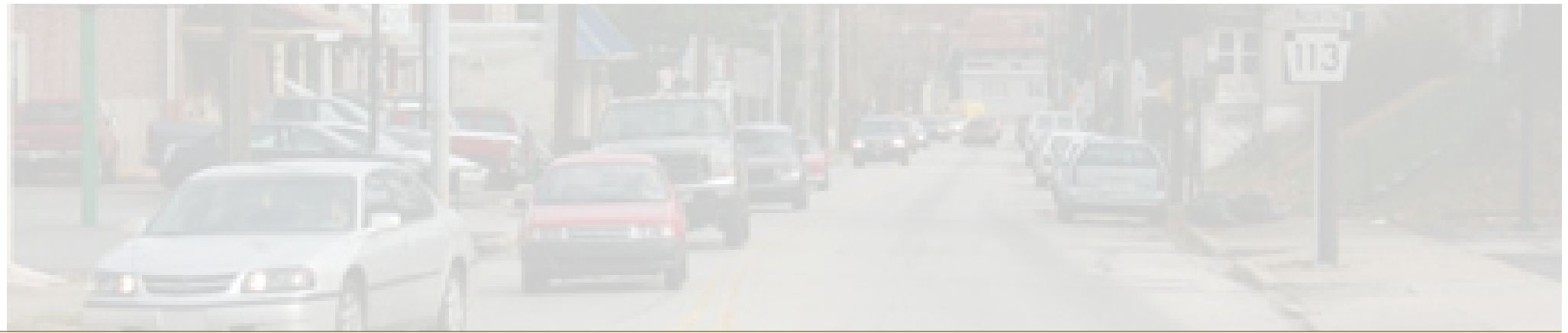


The US 422 Corridor is attracting major retail development.

COMMONWEALTH OF PENNSYLVANIA KEYSTONE PRINCIPLES FOR GROWTH, INVESTMENT AND RESOURCE CONSERVATION

The Keystone Principles represent a coordinated interagency approach to fostering sustainable economic development and conservation of resources through the state’s investments in Pennsylvania’s diverse communities.

- Redevelop first
- Provide efficient infrastructure
- Concentrate development
- Increase job opportunities
- Foster sustainable businesses
- Restore and enhance the environment
- Enhance recreational and heritage resources
- Expand housing opportunities
- Plan regionally; implement locally
- Be fair



CHAPTER 2 - ANALYSIS OF TRENDS

If current growth and development trends continue, they could have a profound effect on the future of the US 422 Corridor.

POPULATION, HOUSING AND EMPLOYMENT GROWTH

Since 1985, when the US 422 Expressway was completed, the corridor has experienced significant

growth. The population of Limerick Township has more than doubled between 1990 and 2000 (see **Figure 3**). Significant growth has also been experienced in Upper Providence Township (59%), Trappe Borough (52%), Amity Township (38%) and East Vincent Township (32%).

This significant growth is expected to continue in all three counties within the planning area. During the 30-year period between 2000 and 2030, the population within the planning area is expected to grow by 20% to 25%. According to the Delaware Valley Regional Planning Commission (DVRPC), based on employment forecasts for the same 30-year period, a total of 28,000 new jobs will be located within the US 422 Corridor planning area. Using DVRPC data, it is anticipated that during the 21-year period between 2009 and 2030, the corridor will see the construction of 21,000 new housing units.

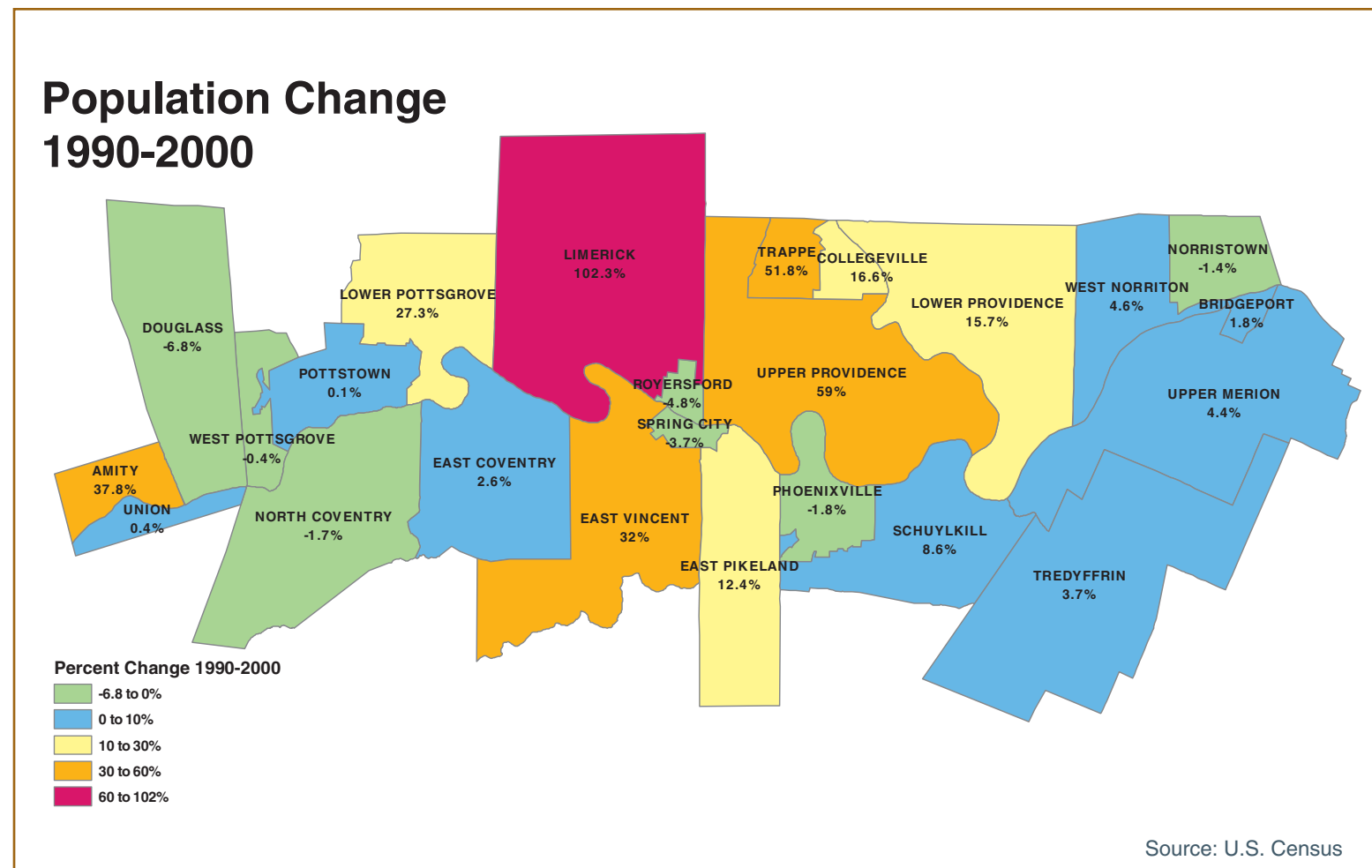
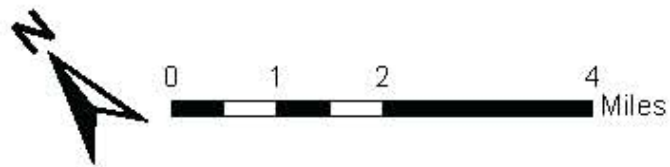
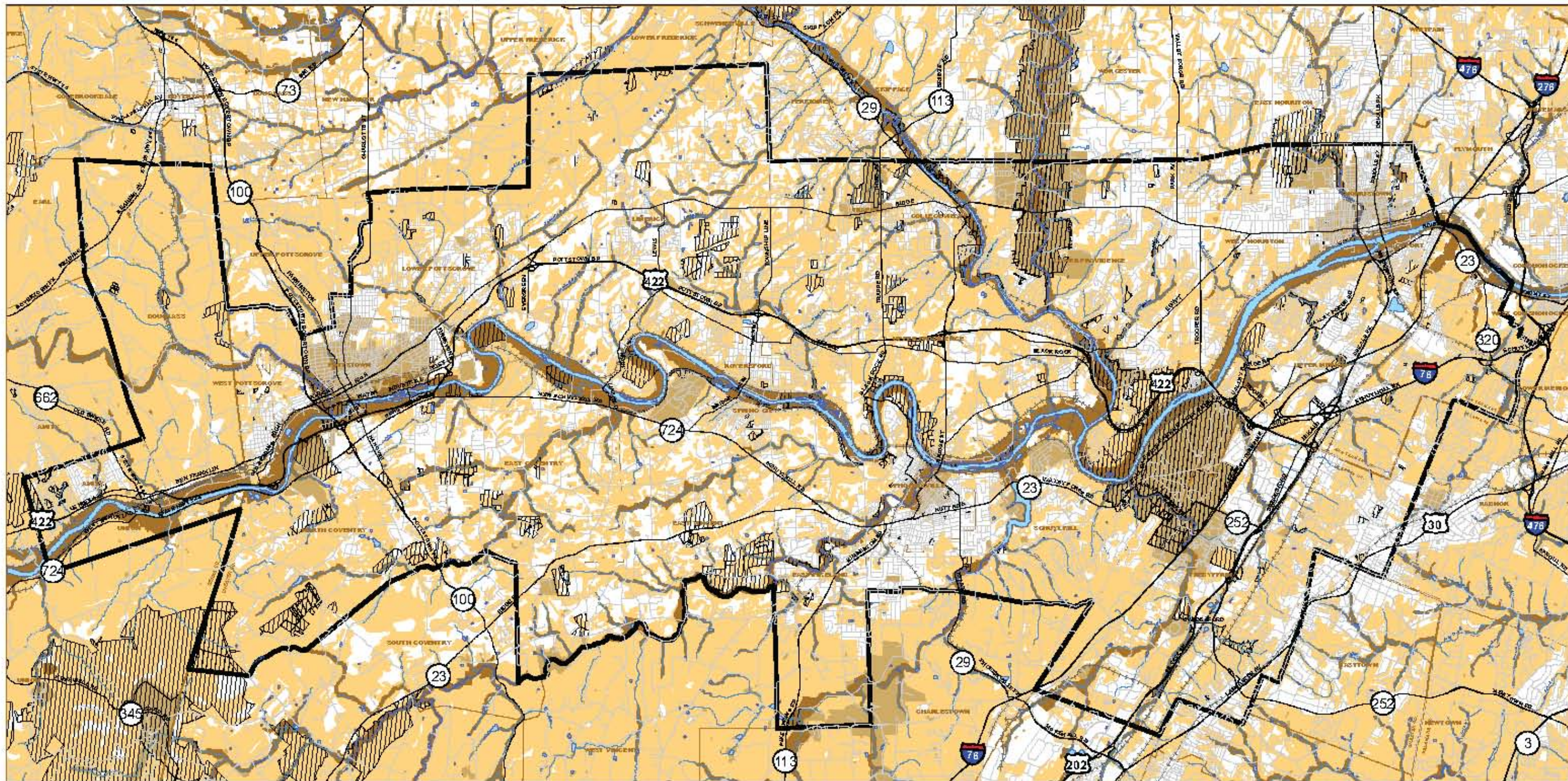


Figure 3 – Population Change from 1990-2000
(Prepared for DVRPC; Prepared by McCormick Taylor)

LAND USE CHANGES

Existing land uses were mapped (**Figure 2**, shown previously) to assess the current pattern and intensity of development in the planning area. **Figures 4 and 5** show the extent of environmental constraints and the extent and location of land suitable for future development. The vast majority of the corridor is covered with low density residential neighborhoods and undeveloped land. Large office and retail complexes have located near several of the interchanges along US 422. Notably, the PA 29 interchange serves as home to several of the area's



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 DELAWARE VALLEY
 REGIONAL
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 December 2009

Prepared by:

 McCormick
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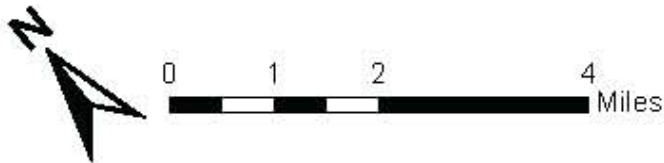
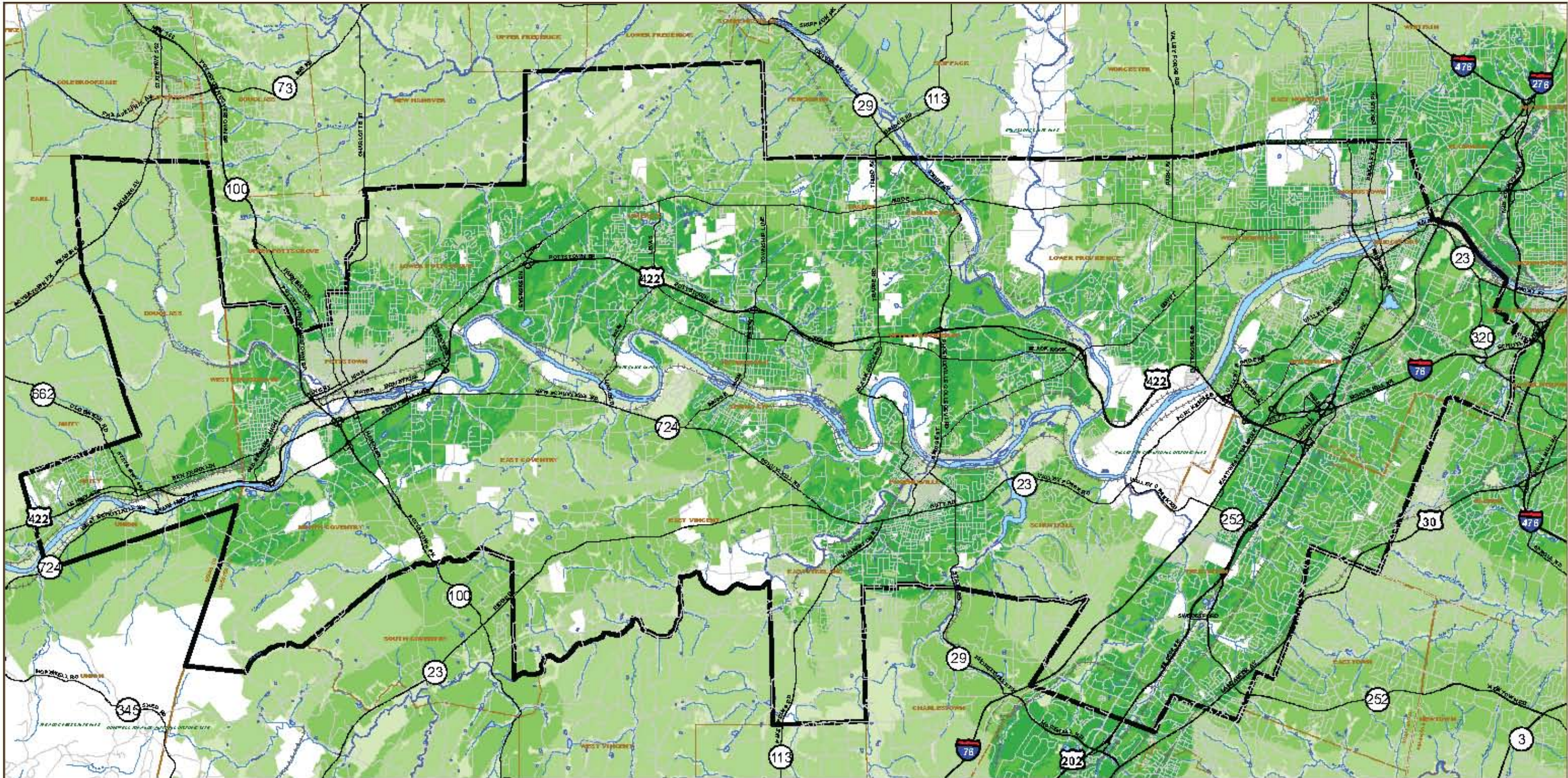
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- Level 1: FEMA Floodplains
- Level 2: CRGIS Historic Properties & NVM Wetlands
- Level 3: Steep Slope (Greater than 8%), Prime Agricultural Soils, Soils of Statewide Importance, Forested Areas & Hydric Soils
- Level 4: Slight, General Unconstrained Lands
- Study Corridor
- Parks & Protected Lands

 **US 422 Corridor
 Master Plan**

COMPOSITE CONSTRAINTS

Figure 4



Prepared for:
DELAWARE VALLEY
dvrpc
 REGIONAL
 PLANNING COMMISSION
 December, 2009

Prepared by:
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Taylor
 Engineers & Planners
 Since 1946

Legend

- Most Suitable
- Least Suitable
- Land Unavailable for Development
- Study Corridor

Suitability determined by combining Composite Constraints and Accessibility data. See Composite Constraints mapping for constraints. Accessibility determined by the following:
 Central Places: 5,280 ft (small), 10,560 ft (large)
 Interchanges: 7,920 ft
 Major Roadways: 3,960 ft (Ridge Pk, Rts 23, 29, 100, 252, 320 & 724)
 Rail Stations: 1,320 ft
 Water & Sewer Coverage

US 422 Corridor
Master Plan

SUITABILITY
FOR DEVELOPMENT

Figure 5

premier pharmaceutical companies: Pfizer (formerly Wyeth), Glaxo SmithKline and Quest Diagnostics. These companies employ approximately 13,000 employees. The Sanatoga exit is the location of Philadelphia Premium Outlets, 150 stores with 545,000 square feet of retail space.

The corridor has seen significant growth in recent years. This has resulted in an 18% increase in residential acreage, as shown in **Figure 6**. Residential growth has come largely at the loss of farmlands; over 8,000 acres of farmland has been converted to other uses between 1995 and 2005, a 29% decrease in agricultural acreage

in the corridor. The extent of woodlands has decreased by 14%. While efforts have been made to preserve individual farms, the rural countryside has been rapidly disappearing.

To further understand current development trends, the planning team examined where recent development has occurred (see **Figure 7**). The municipalities in the corridor were asked to provide information concerning recently approved developments and pending development proposals. The broad patterns of land use change confirm that dispersed residential development is a major factor in changing the character of formerly rural municipalities.

Significant land development projects are currently being planned for the US 422 Corridor:

- In Oaks, the Greater Philadelphia Expo Center is open and 250,000 square feet of retail uses are scheduled to be completed over the next couple of years.
- The Village at Valley Forge, a mixed-use urban style town center with retail, residential and hotel under construction on the former Valley Forge Golf Course site.
- The soon-to-open Providence Town Center at PA Route 29.
- The 1,000-unit planned Lofts at Valley Forge development.
- A potential slots parlor at the Valley Forge Convention Center.
- A number of sizable retail developments have been proposed for the “Gateway” to Limerick Township at the Sanatoga exit of US 422.

The nature and size of these projects means that their impacts will be considerable.

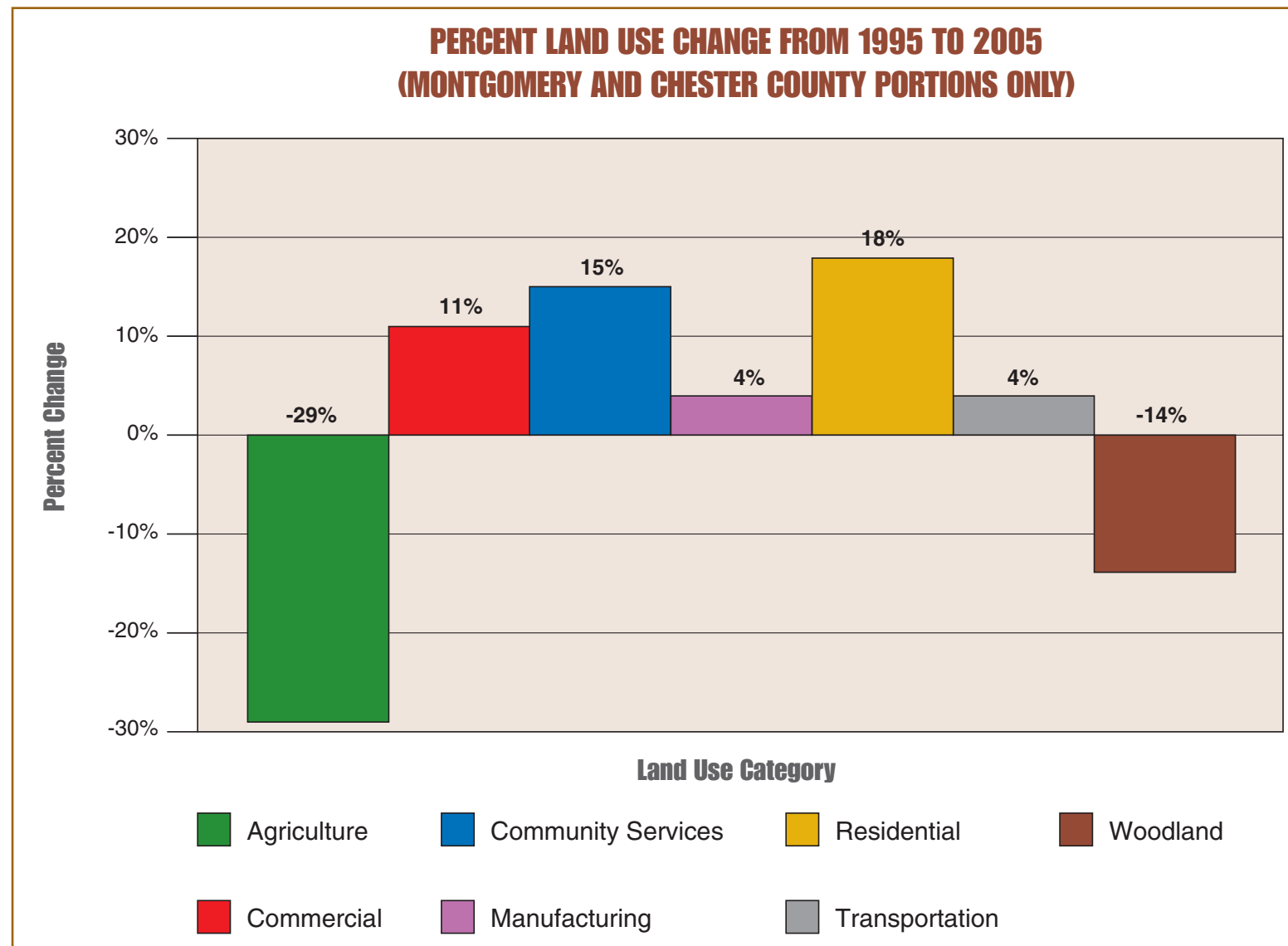
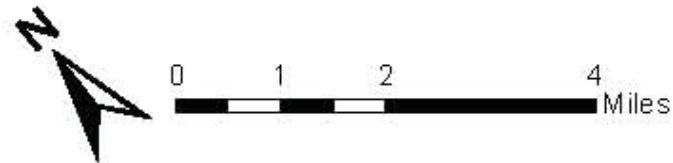
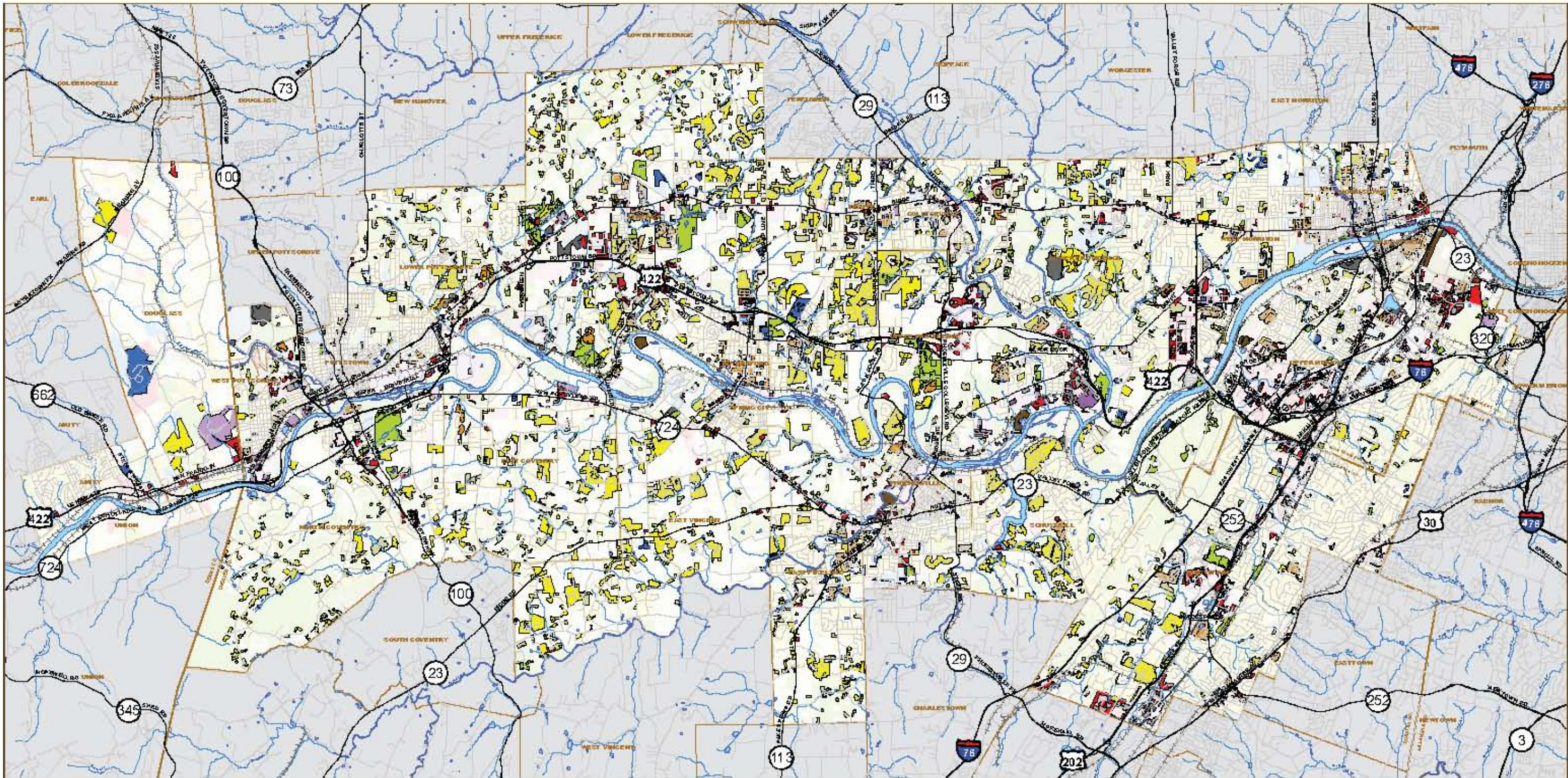


Figure 6 – Percent Land Use Change from 1995-2005
(Prepared for DVRPC; Prepared by McCormick Taylor)



Legend

- | | | |
|---------------------|------------------------------------|--------------------------|
| Agriculture | Mining | Residential-Mobile Home |
| Commercial | Recreation | Parking |
| Community Services | Residential-Single Family Detached | Transportation & Utility |
| Light Manufacturing | Residential-Single Family Attached | |
| Heavy Manufacturing | Residential-Multi-Family | |

**US 422 Corridor
Master Plan**

**RECENT DEVELOPMENT
1995-2005**

Source: DVRPC Land Use, 1995 & 2005.

Figure 7

Prepared for: **dvrpc**
REGIONAL PLANNING COMMISSION
December, 2009

Prepared by: **McCormick Taylor**
Engineers & Planners
Since 1946

TRAFFIC GROWTH AND CONGESTION

Average daily traffic has increased throughout the planning area, resulting in congestion on US 422 and other important routes. In Upper Providence Township,

US 422 has experienced the largest increase in traffic volumes (48%) between 1995 and 2005. Significant growth in traffic on US 422 has also been experienced in the other municipalities along the expressway (see **Figure 8**). Current daily traffic counts for key roadways throughout the corridor are shown on **Figure 9**.

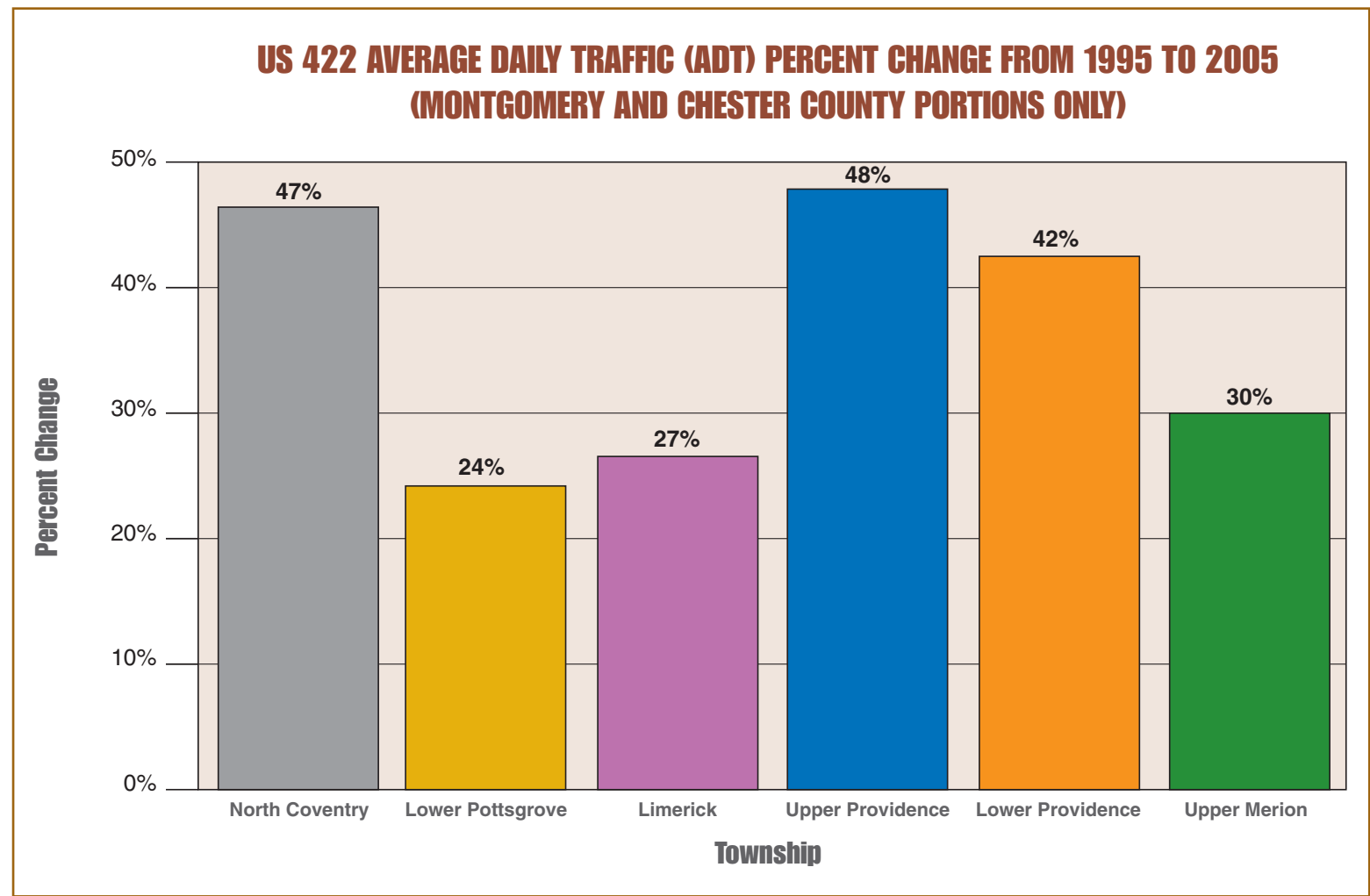


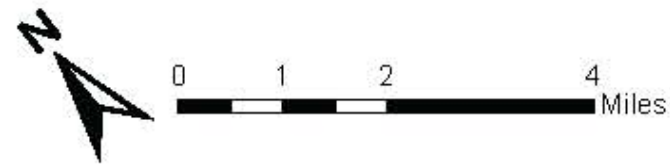
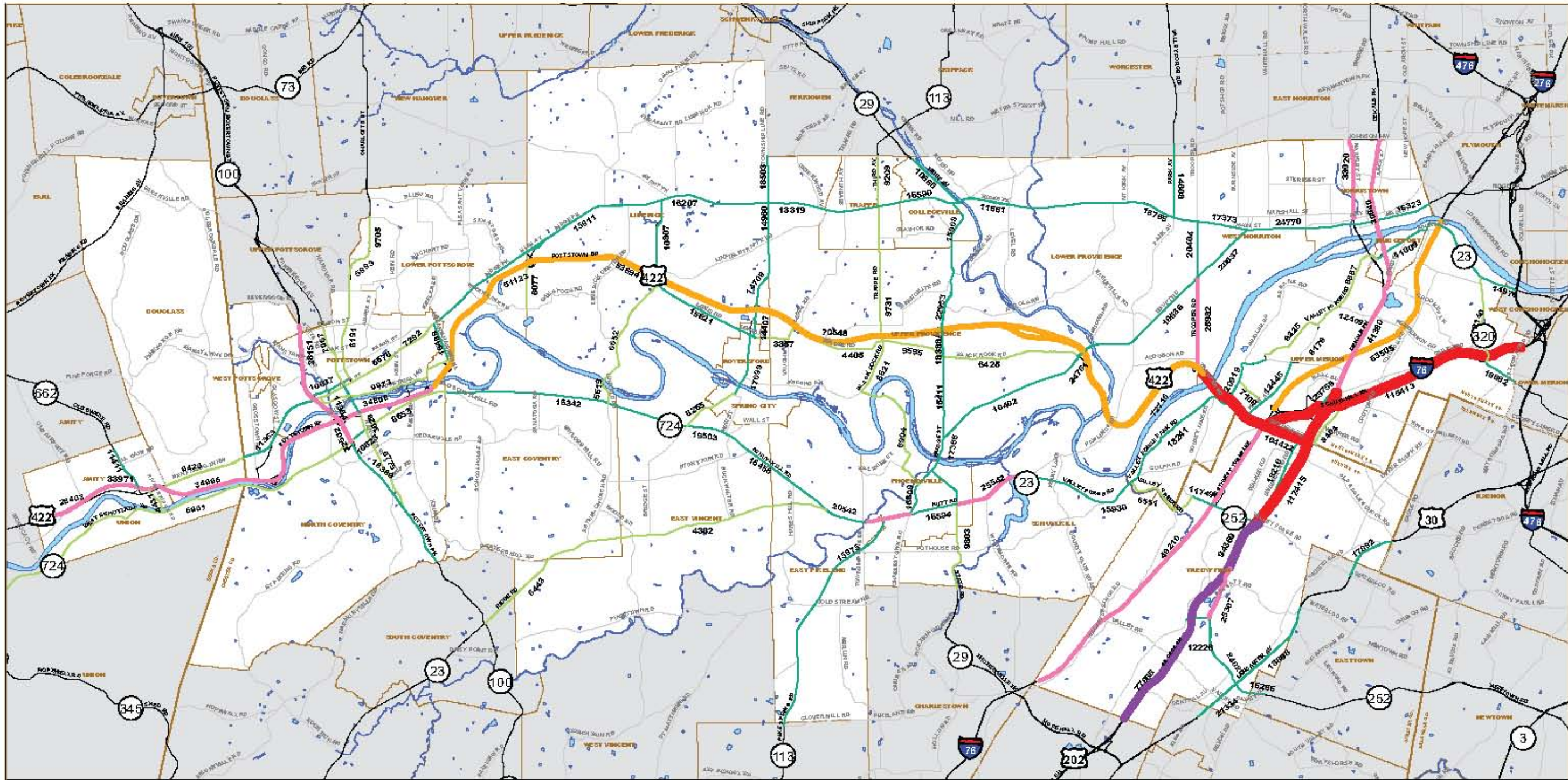
Figure 8 – Average Daily Traffic (ADT) Percent Change from 1995-2005
(Prepared for DVRPC; Prepared by McCormick Taylor)

Over the last 24 years, traffic volumes on the expressway have continued to grow while acute congestion, especially in the eastbound direction in the morning peak hours, is a fact of life for commuters who use this highway.

To meet the access needs for the new land developments in the corridor, a variety of transportation investments have been proposed. These include reconfiguring the ramps at the Sanatoga interchange and providing complementing access at Airport Road and US 422. “Slip” ramps between US 422 and Pawlings Road and an access road from the US 422 interchange at Egypt Road on the north side and parallel to US 422, with an underpass of that highway close to Perkiomen Creek, have been discussed to support development surrounding the Oaks and Trooper Road interchanges and reduce through-travel on PA 23 through Valley Forge National Historical Park. Additionally, restoration of passenger rail service from Norristown through Pottstown to Wyomissing as a potential extension to SEPTA’s R6 Regional Rail line is being seriously considered, using the existing tracks and right-of-way of Norfolk Southern’s Harrisburg line. Montgomery County recently completed a feasibility study of the R6 extension.

Adding capacity to the US 422 expressway would be expensive and will be limited to projects relatively modest in scope unless new sources of funding can be found.

Additional information concerning existing conditions can be found in *Technical Memo 2: Assets, Constraints and Opportunities*.



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 December, 2009

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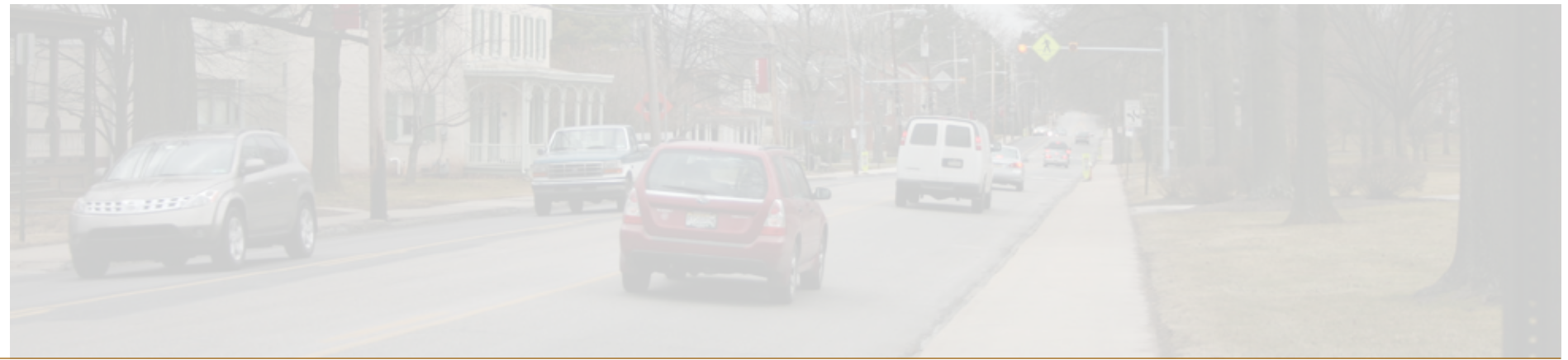
Legend			
	2008 ADT < 10,000		Interstate
	10,000 - 25,000		US Route
	25,000 - 50,000		PA Route
	50,000 - 75,000		Other Major Road
	75,000 - 100,000		
	> 100,000		

US 422 Corridor Master Plan

2008 ADT (AVERAGE DAILY TRAFFIC)

NOTES:
 1. ADT DATA FROM PENNSYLVANIA DEPARTMENT OF TRANSPORTATION INTERNET TRAFFIC MONITORING SYSTEM (ITMS)
 2. US 422 ADT DATA IN MONTGOMERY AND CHESTER COUNTIES FROM DVRPC

Figure 9



CHAPTER 3 - ASSETS, CONSTRAINTS AND OPPORTUNITIES

The planning team has taken a corridor-wide perspective of the challenges and opportunities facing the area. The important assets, constraints and opportunities have been characterized and mapped. Each map has an organizing framework for its legend and mapped graphic icons, with transportation, land use, natural resources and quality of life categories.

ASSETS

The corridor is rich with assets (see **Figures 10A and 10B**) that make it attractive for residents and employers, as well as future growth and development:

■ Transportation

- A well-connected network of roadways, including expressways and state routes
- Available capacity along portions of roadways
- Good access throughout the corridor
- Existing railroad rights-of-way and tracks
- A system of multi-use trails
- Park-and-ride facilities

■ Land Use

- Established and still vital downtowns
- Major retail destinations, some of regional significance
- Major employment centers

■ Natural Resources

- National and state parks
- Farms and woodlands

■ Quality of Life

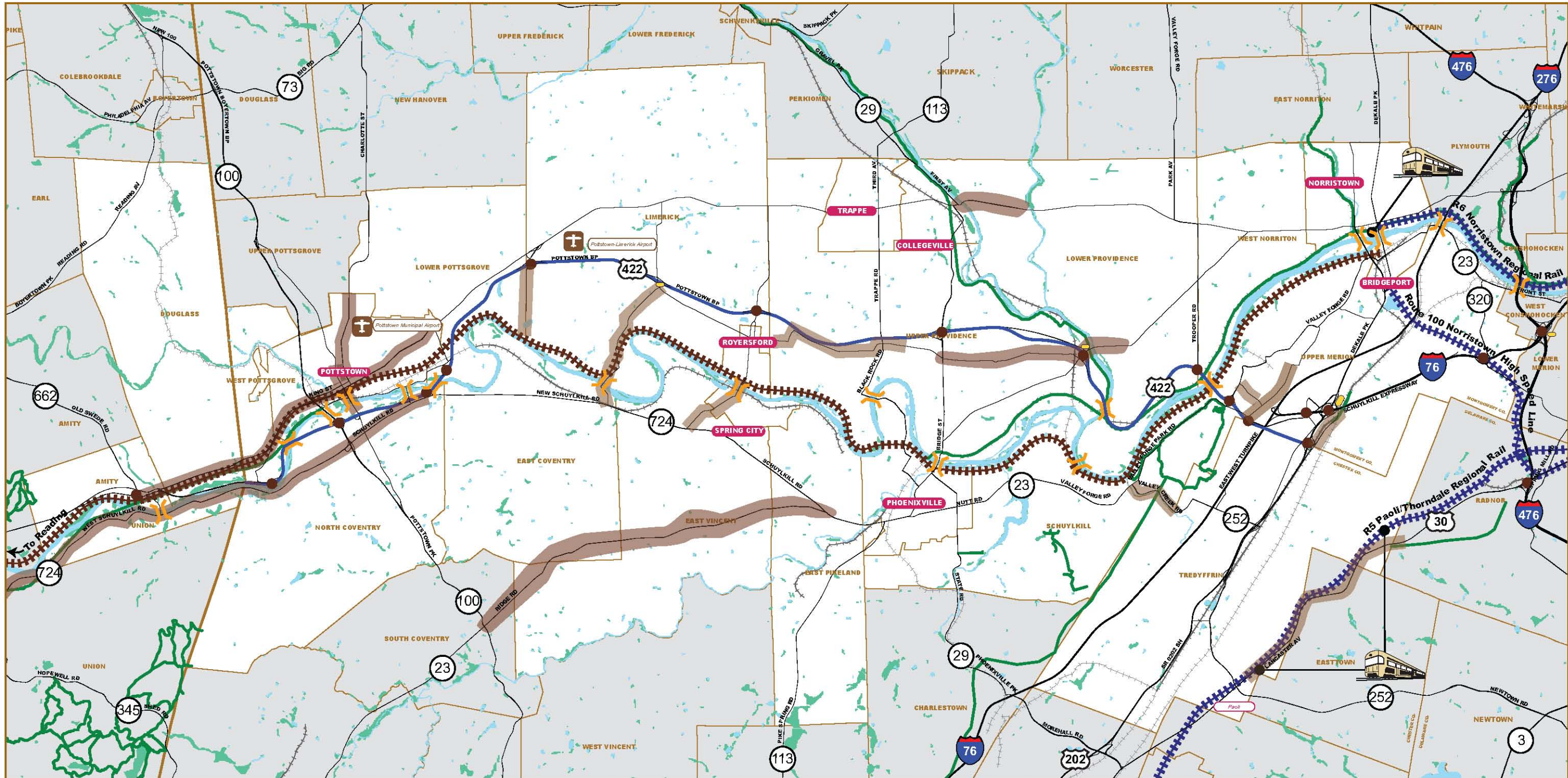
- Important heritage resources
- Areas with available water and sewer capacity



The tow path in Mont Clare is part of the Corridor's extensive trail network.



Valley Forge National Historical Park is one of the notable assets of the study area.



Legend

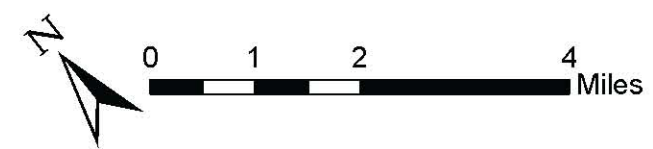
- | | | |
|--|---|-------------------------------------|
| Transportation | | Existing High-Speed Transit Service |
| Southeastern Pennsylvania Emergency Transportation Plan Routes | Railroad Track That Could Connect Downtowns | Bridges |
| Passenger Rail Service | | |
| Multi-Use Trails – Existing | | |
| Interchange | | |
| Available Roadway Capacity | | |
| Park & Ride | | |

US 422 Corridor Master Plan

ASSETS
(Transportation)

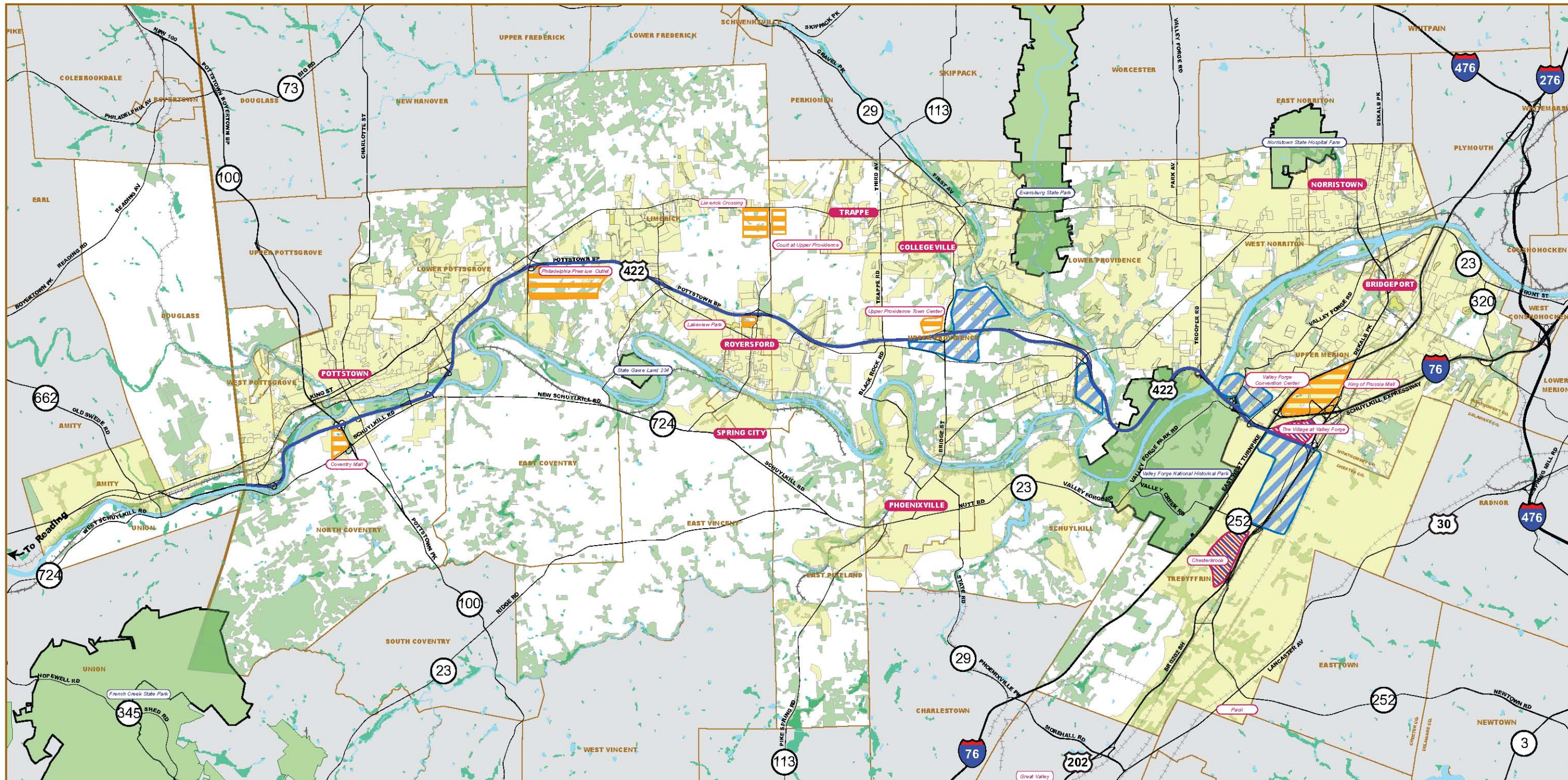
Assets are aspects of the current situation that are positive factors for the corridor and that may form a foundation upon which to capitalize.

Figure 10A

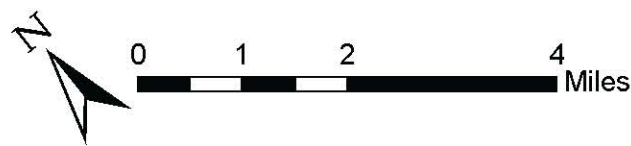


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Legend



Land Use

- TOWN Established Downtown
- Retail Center
- Employment Center
- Mixed Use Center
- Areas with Water and Sewer Service

Natural Resources

- Regional Parkland
- Surface Water
- Wetlands
- Woodland



US 422 Corridor Master Plan

ASSETS

(Land Use, Natural Resources)

Assets are aspects of the current situation that are positive factors for the corridor and that may form a foundation upon which to capitalize.

Figure 10B

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CHAPTER 3

CONSTRAINTS

There are a number of notable constraints that restrict or limit current activity and are impediments to sustainability and a high quality of life (see **Figure 11**):

■ Transportation

- Peak period traffic congestion is frequent
- Crash rates are 150% higher than the state average at a number of locations
- The Schuylkill River and Valley Forge National Historical Park restrict transportation development
- There is no passenger rail service west of Norristown
- The only transit service between downtowns is infrequent bus service
- The long-planned Intermodal Transportation Center in Paoli still does not exist
- Large, low-density, single-use development patterns mean limited mobility options

■ Land Use

- The major retail destinations and employment centers in the corridor are single use areas

■ Natural Resources

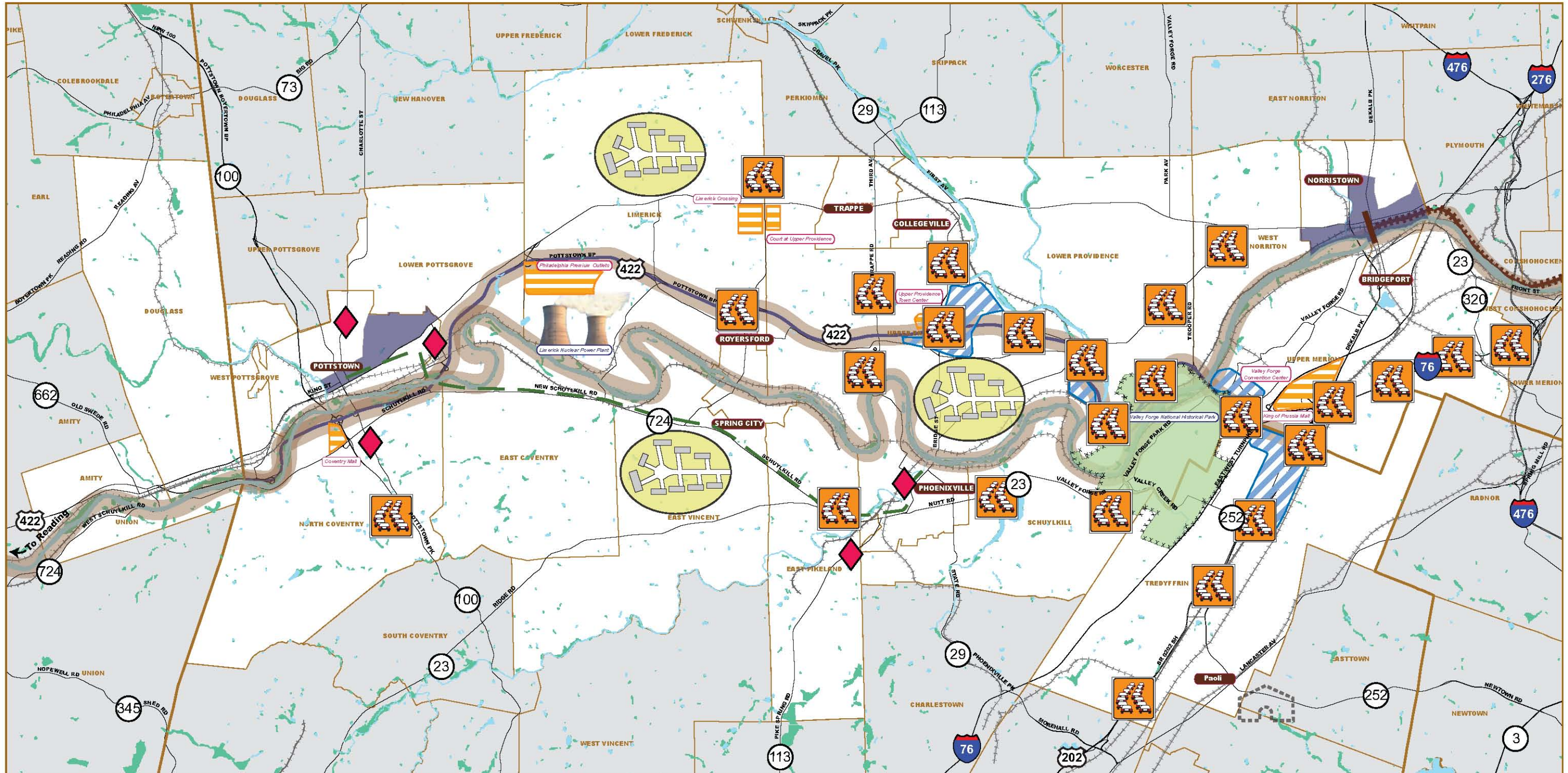
- Wetlands and floodplains limit mobility and land use options

■ Quality of Life

- The nuclear power plant in Limerick is a visual intrusion in the landscape
- A large percentage of the population in Norristown and Pottstown are disadvantaged



Located at the Sanatoga exit, Philadelphia Premium Outlets is an example of a large, single-use, freestanding development with few transportation options. The cooling towers of Limerick nuclear power plant can be seen in the distance.



Legend

Transportation

- Restricted Options for Transportation Improvements
- Traffic Congestion
- Lack of Rail Service Beyond Norristown
- Gap in Schuylkill River Trail

- High Concentration of Crashes
- Low-Density Single Use Development Pattern with Limited Mobility Choices
- Lack of New Intermodal Transportation Center at Paoli

Land Use

- Single Use (Retail)
- Single Use (Employment)

Natural Resources

- Surface Water
- Wetlands

Quality of Life

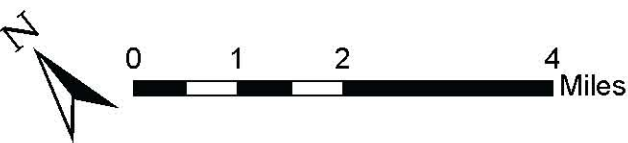
- Nuclear Power Plant
- High Degree of Disadvantaged Population



US 422 Corridor Master Plan

CONSTRAINTS

Constraints are aspects of the current situation that are negative factors for the corridor and that will have to be overcome in some manner to realize an improved future.



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Figure 11

CHAPTER 3

OPPORTUNITIES

Opportunities are what is known about the corridor and the range of possibilities for the future in terms of a Corridor Master Plan. The opportunities (see **Figures 12A and 12B**) include:

■ Transportation

- Extend R6 passenger rail service from Norristown through Pottstown to Wyomissing
- Add capacity to US 422 where needed
- Dedicate a portion of the US 422 right-of-way to Bus Rapid Transit (BRT)
- Provide new roadway linkages where needed
- Enhance river crossings
- Improve intersection geometry and operations
- Develop a section of Township Line Road (Upper Providence/Limerick) into a complete street
- Build new park-and-ride facilities
- Expand the multi-use trail system

■ Land Use

- Provide a mix of land uses and intensify land uses at existing single-use retail and employment centers
- Revitalize downtowns
- Locate new stations along the extended R6 line that incorporate Transit-Oriented Development (TOD)
- Conduct a master planning study of the Oaks/Audubon area

■ Natural Resources

- Preserve large areas of farmland, open space and woodlands

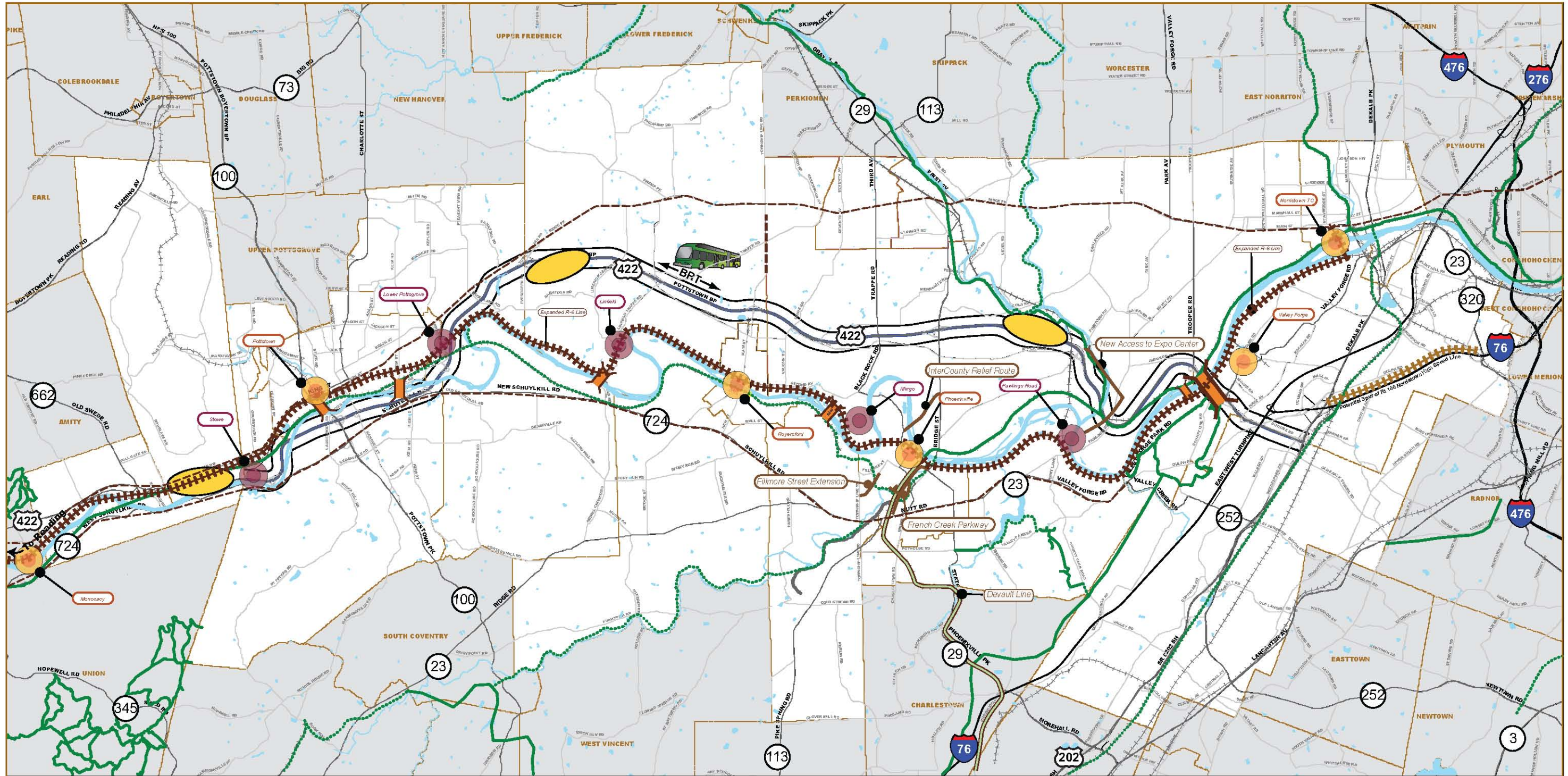
■ Quality of Life

- Increase recreational uses along the Schuylkill River

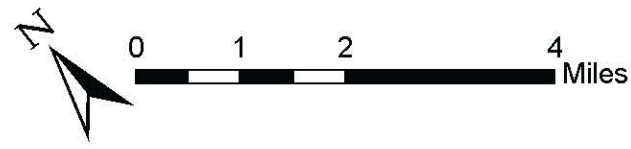
Additional information and supporting mapping can be found in *Technical Memo 2: Assets, Constraints and Opportunities*.



Phoenixville is one local example of a revitalized older downtown with new restaurants and pedestrian amenities.



Legend



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Transportation

- Extend R6 Passenger Rail Services
- Devault or "Green" Line Connection (Potential Passenger Rail Service between Phoenixville, Great Valley and Paoli)
- Enhanced River Crossing
- BRT Potential New Capacity and BRT Service

- Expand Multi-Use Trail System
- Multi-Use Trails - Existing
- Multi-Use Trails - Planned/Proposed
- Potential Park & Ride Facility
- Make "Complete Street"
- New Linkage

- Proposed Station Locations and Transit-Oriented Development From the R6 Norristown Service Extension Study
- Potential Future Station Locations and Transit-Oriented Development

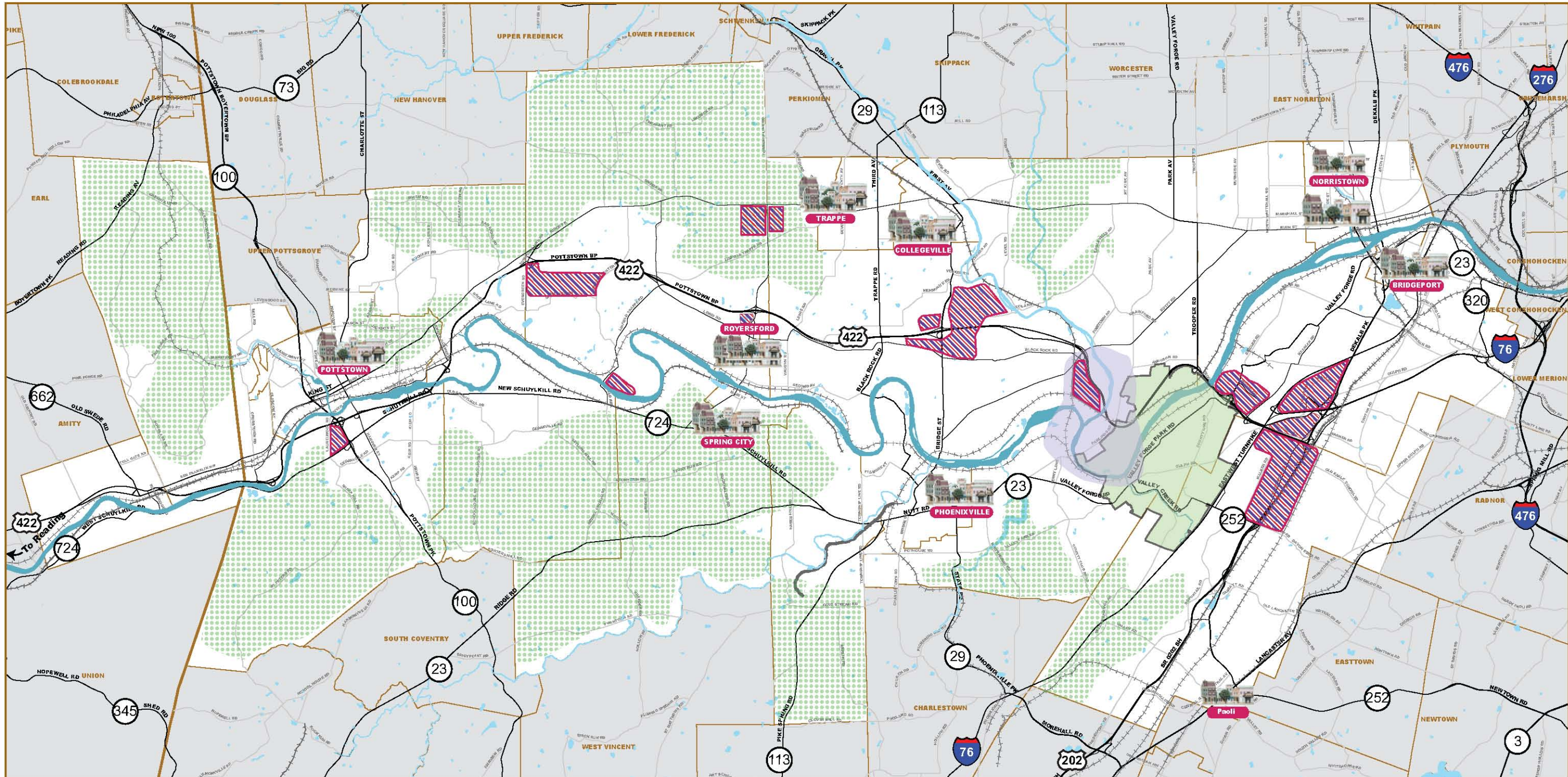


US 422 Corridor Master Plan

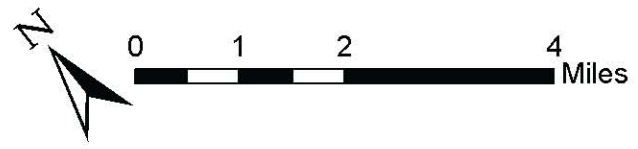
OPPORTUNITIES
 (Transportation)

Opportunities are the identification of potential possibilities toward an improved future.

Figure 12A



Legend



- Land Use**
- Vary & Intensify Land Uses
 - Revitalize Downtowns
 - Prepare Master Plan for Development
 - Preserve Remaining Farmland, Open Space and Woodlands

- Natural Resources**
- Increase Recreational Use of the Schuylkill River & its Frontage
 - Create Riparian Buffers along Tributary Streams
- Quality of Life**
- Improve Access & Use of Valley Forge National Historical Park

US 422 Corridor Master Plan

OPPORTUNITIES
(Land Use, Natural Resources, Quality of Life)

Opportunities are the identification of potential possibilities toward an improved future.

Figure 12B

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CHAPTER 4 - TOWARD A SUSTAINABLE FUTURE

What kind of future will communities in the US 422 Corridor create? Will it be similar to the past, or will a new direction be taken? Land use and transportation policies and investment decisions help to shape the future. Past policies and investments have shaped current land use patterns. Changes in these policies and different priorities for investment will be needed in order to create a different future.

The material contained in this chapter was developed and presented in support of public involvement and the open houses held in February and June 2009.

SEEING THE FUTURE THROUGH OPPORTUNITIES

In order to develop a sense of the magnitude, characteristics and distribution of future development within the US 422 Corridor, DVRPC population forecasts for corridor communities were used to represent future housing, employment growth and land development. These “potential futures” were used to estimate the number of acres of development that would be required to support this growth. Through an analysis of recent development patterns, a spatial distribution of future growth was completed. Traffic growth rates and

demographic forecasts were used to develop future traffic conditions for the corridor.

This continuation of past directions is called the *Trend*, and it presents a picture of the expected amount and expected location of future development and of anticipated traffic conditions. Past directions can be changed, however, to take advantage of opportunities within the corridor. There is a strong connection between the opportunities described in the previous chapter and the Sustainable Alternative described later in this chapter.



Scattered, low-density development on land that was recently in agricultural production.

CHAPTER 4

THE TREND

The Trend provides a snapshot of what the future could look like if past trends continue. It is not the preferred direction for the corridor, nor is it a plan. The Trend does, however, present an informed “base case” against which alternative scenarios of future growth and development may be compared and evaluated.

The Trend assumes that 21,000 new housing units will be constructed during the 21-year period between 2009 and 2030. At residential densities ranging from 0.2 to 8.0 units per acre, depending on the municipality, this would result in the development of about 18,300 acres. Based on DVRPC employment forecasts for the 30-year period between 2000 and 2030, a total of 28,000 new jobs will be located within the US 422 Corridor planning area. This would require 1,100 acres for commercial, office and industrial uses. These values are represented as “chips” or blocks on the maps that follow in this chapter. Each chip represents 20 acres of development at varying densities.

The Trend can be further illustrated for both its land use and transportation elements. The 2030 Land Use Trend is a picture of potential future land development if trends continue (see **Figure 13**). The trend shows continued low density residential development on remaining open lands throughout the corridor. **Figure 14** presents estimates of future (2030) daily traffic volumes along the roadway network if trends continue.

Traffic operating conditions on major roadways if trends continue were estimated and are shown on **Figure 15**. The

graphic indicates peak hour volume to capacity ratios which are a measure of traffic operations – between free-flowing conditions (≤ 0.3) and forced or breakdown flow (≥ 1.0) – and indications of likely regular congestion. This analysis assumes no new capacity-adding projects other than the projects on the FY09-FY12 Transportation Improvement Program (TIP) as of July 2009. The trend would result in a highway system that is stressed and with few mobility choices. Major new roadway investments would be required beyond those in the pipeline and the funding anticipated to be available from traditional sources.

TOWARD A MORE SUSTAINABLE ALTERNATIVE

The Trend can be contrasted with an alternative future, one recommended by members of the Steering Committee and the US Route 422 Corridor Coalition. This alternative, named the Sustainable Alternative, proposes a different pattern and density of development and a mix of land uses for the corridor as well as a more complete set of transportation strategies to provide options for mobility. The Sustainable Alternative, like the Trend, is an informed assumption as to what the US 422 corridor could be like in 20 years. Both the Trend and the Sustainable Alternative use the same DVRPC forecasts of population, housing and employment. The sustainable option encourages more compact development and opportunities to mix uses and maintain open space.

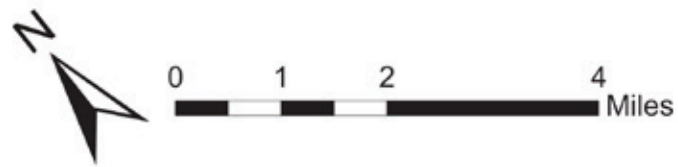
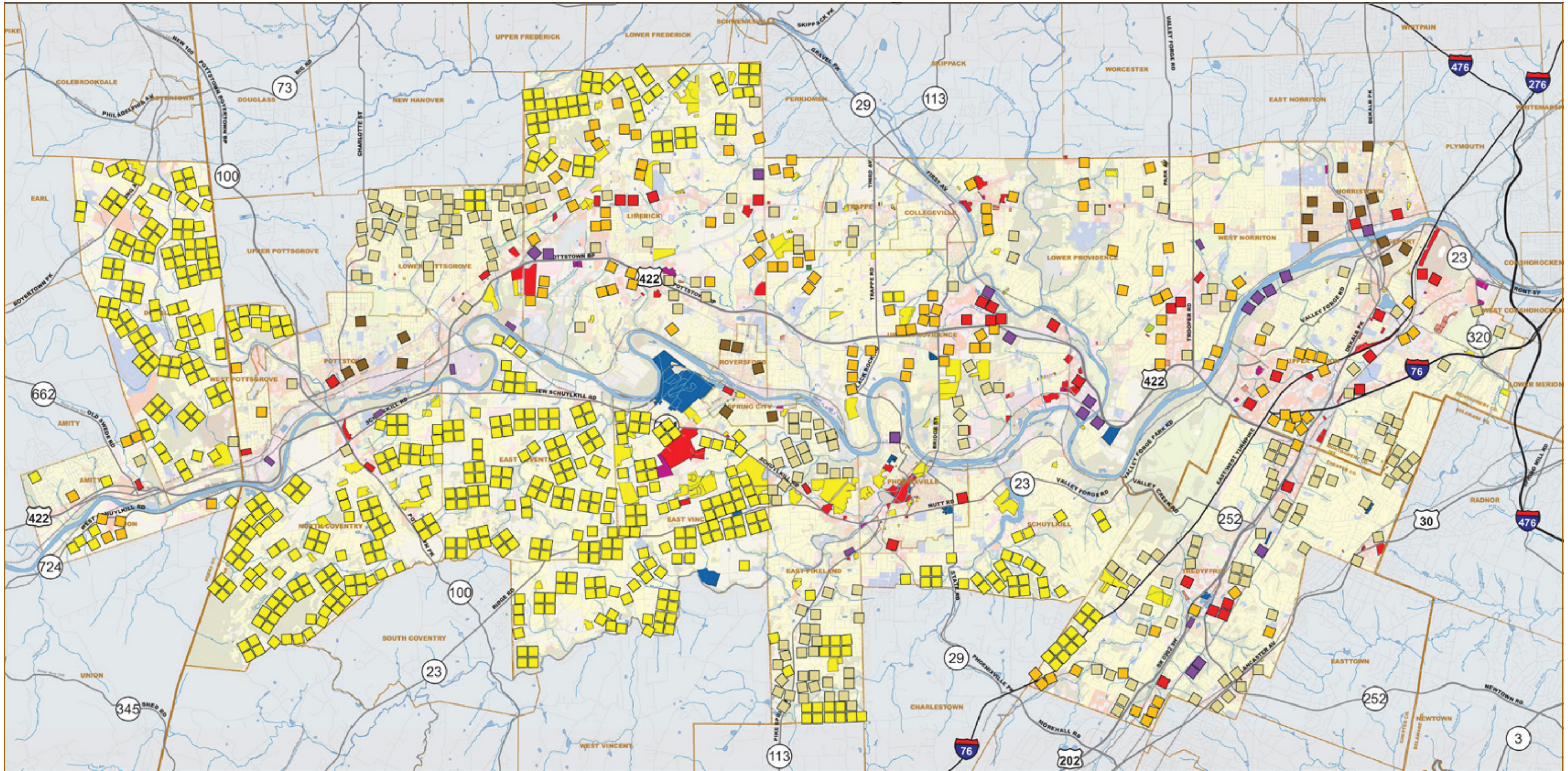
As with the Trend, the Sustainable Alternative assumes that 21,000 new housing units will be constructed during the 21-year period between 2009 and 2030. At residential

WHAT IS THE TREND?

The Trend as an “informed picture” of future land use.

Communities develop, expand and take shape due to the influence of many factors. Among these are regional economic forces, topography and natural resources, land values, access to transportation, and the vision of residents and local officials. The history of development and land use change in a given area can be represented as patterns of growth that can be characterized and quantified. If these patterns of land use change are tied to future population growth estimates, we can establish the probable future land use as a scenario or *trend*.

The trend presented for the US 422 corridor is not a prediction or scientific forecast of the future. Nor is it an assessment of what a community wants to be or look like twenty years from now. The “trend” is merely a tool used to visualize a potential future that may be a set of intentional or unintended development actions. These actions can have adverse consequences limiting future mobility if no effort is made to create a more efficient, and sustainable future. The trend is a speculative but informed vision of future conditions if we let future land use occur as it has in the past.



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 December, 2009

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Pending & Proposed Land Use

- Agricultural
- Commercial
- Industrial
- Institutional
- Office
- Open Space
- Recreational
- Residential

Other Future Land Use

- 20 Acres Residential (approx. 4-10 dwelling units)
- 20 Acres Residential (approx. 11-50 dwelling units)
- 20 Acres Residential (approx. 51-100 dwelling units)
- 20 Acres Residential (approx. 101-165 dwelling units)
- 20 Acres Commercial (approx. 25 employees per acre)
- 20 Acres Industrial (approx. 20 employees per acre)

Existing Land Use

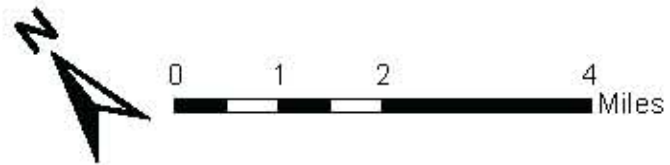
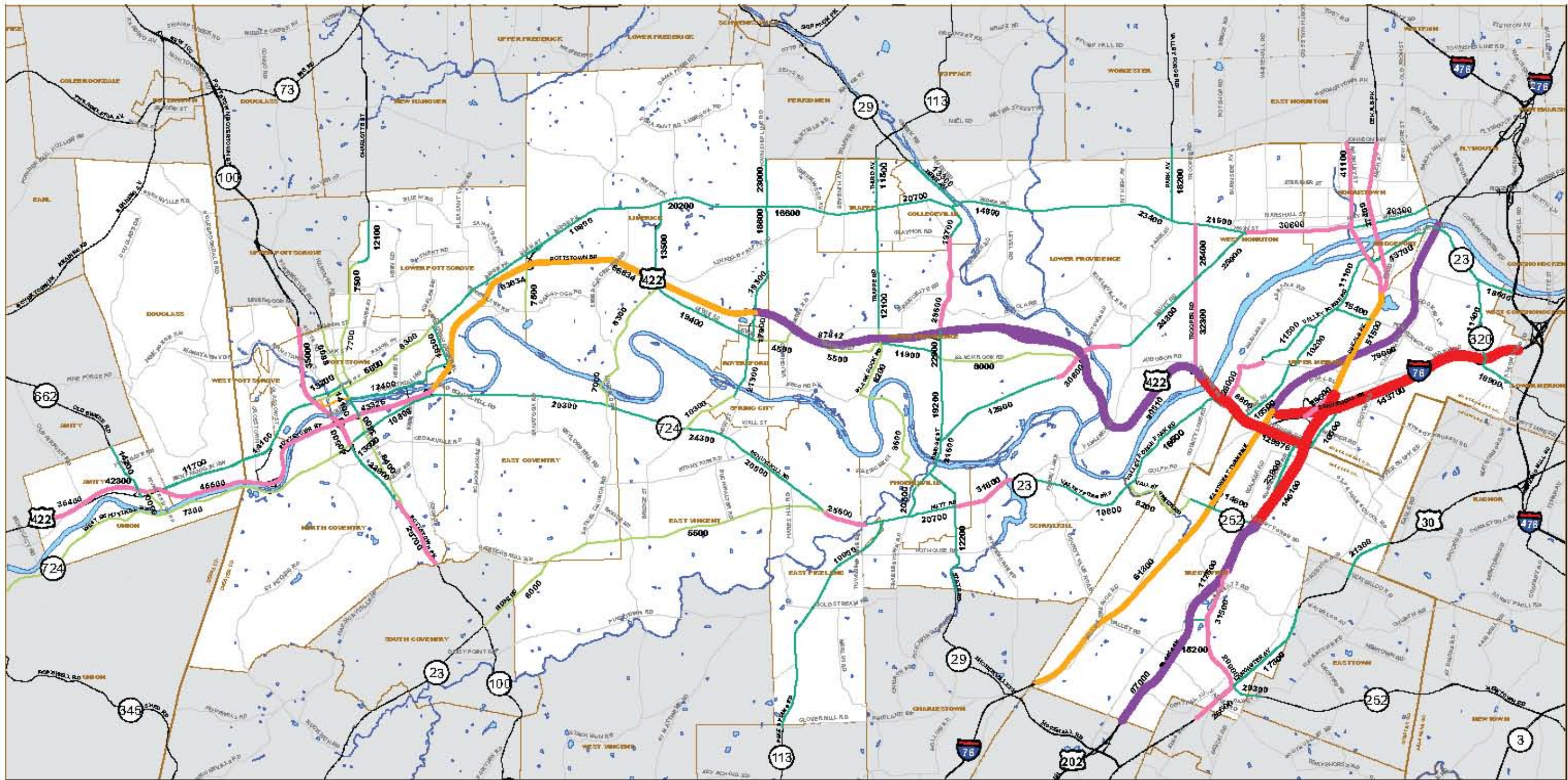
- Agriculture
- Commercial
- Community Services
- Light Manufacturing
- Heavy Manufacturing
- Parking
- Transportation & Utility
- Vacant
- Mining
- Recreation
- Residential-Single Family Detached
- Residential-Single Family Attached
- Residential-Multi-Family
- Residential-Mobile Home
- Wooded



**US 422 Corridor
 Master Plan**

2030 TREND: LAND USE

Figure 13



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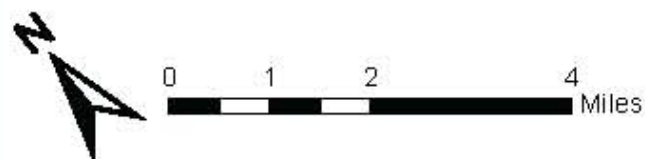
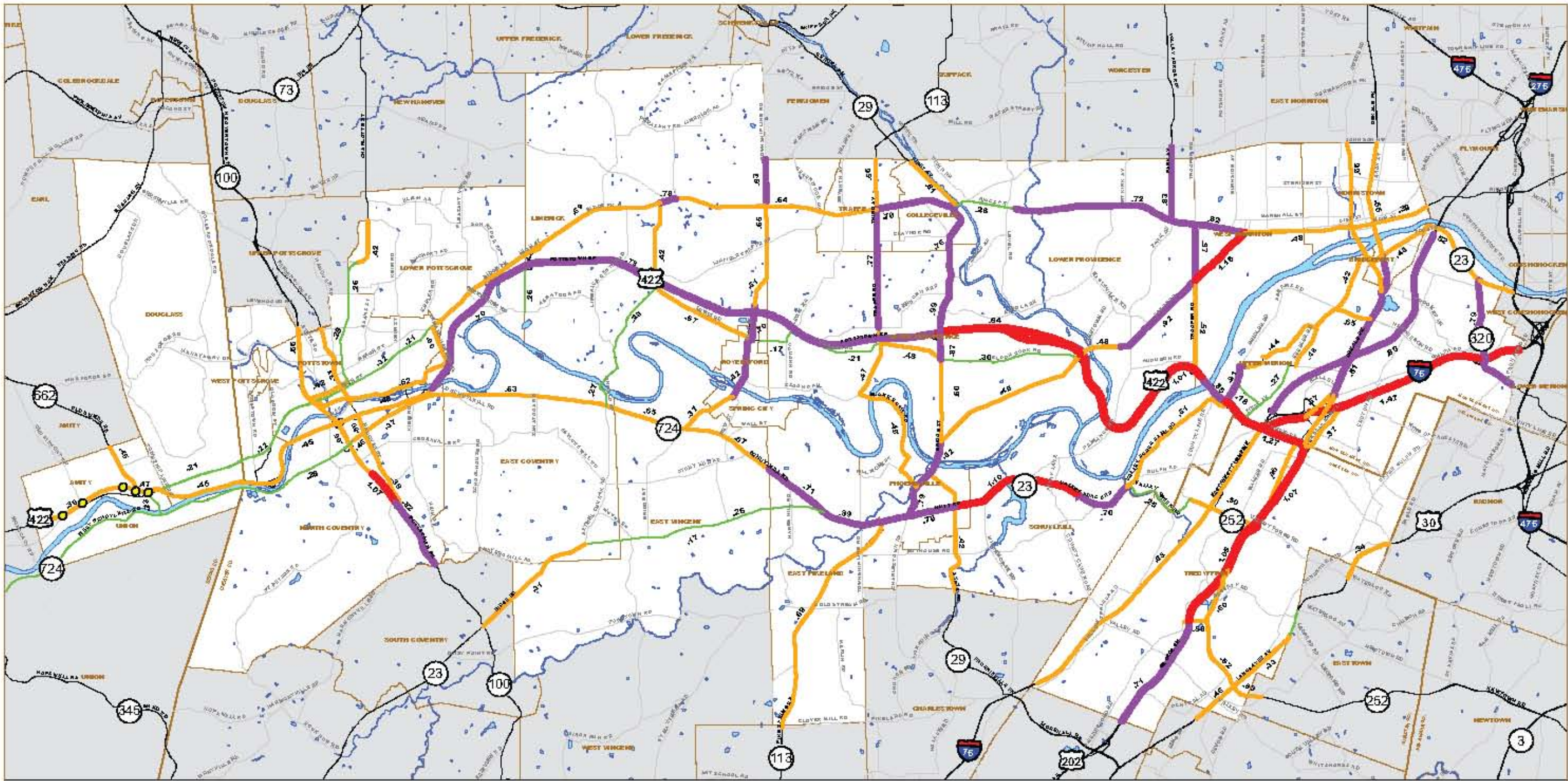
- Legend**
- 2030 ADT**
- < 10,000
 - 10,000 - 25,000
 - 25,000 - 50,000
 - 50,000 - 75,000
 - 75,000 - 100,000
 - > 100,000
- Interstate
 - US Route
 - PA Route
 - Other Major Road

US 422 Corridor
Master Plan

2030 TREND: ADT
(AVERAGE DAILY TRAFFIC)

TRAFFIC GROWTH RATES WERE DETERMINED USING THE DVRPC'S POPULATION AND EMPLOYMENT FORECASTS AND APPLIED TO EXISTING VOLUMES

Figure 14



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 Prepared by: **McCormick Taylor**
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Legend
Volume To Capacity
 <= 0.3
 0.3 - 0.7
 0.7 - 1.0
 >= 1.0

- Interstate
- US Route
- PA Route
- Other Major Road
- US 422 Signalized Intersections Contributing to Peak Period Congestion and Delay

US 422 Corridor Master Plan

**2030 TREND:
 VOLUME TO CAPACITY RATIO**

Notes: Year 2030 capacity assumes that projects identified in DVRPC's 2009 - 2012 Transportation Improvement Program (TIP) are complete.

Figure 15

CHAPTER 4

densities ranging from 0.4 to 10.0 units per acre, this would result in the development of only 7,600 acres of land, or 10,700 acres less than the Trend. Using the same assumption as with the Trend, during the 30-year period between 2000 and 2030, a total of 28,000 new jobs will be located within the US 422 Corridor planning area. However, the mixing and concentrating of residential and commercial uses promoted by the Sustainable Alternative can reduce the acreage needed for future land

development when compared to the Trend: only 610 acres would be needed for new non-residential development. A conceptual arrangement of future land development patterns consistent with and recommended for the 2030 Sustainable Alternative is illustrated in **Figure 16**.

In turn, network-wide traffic operating conditions can be estimated for the 2030 Sustainable Alternative by converting the traffic generations associated with the

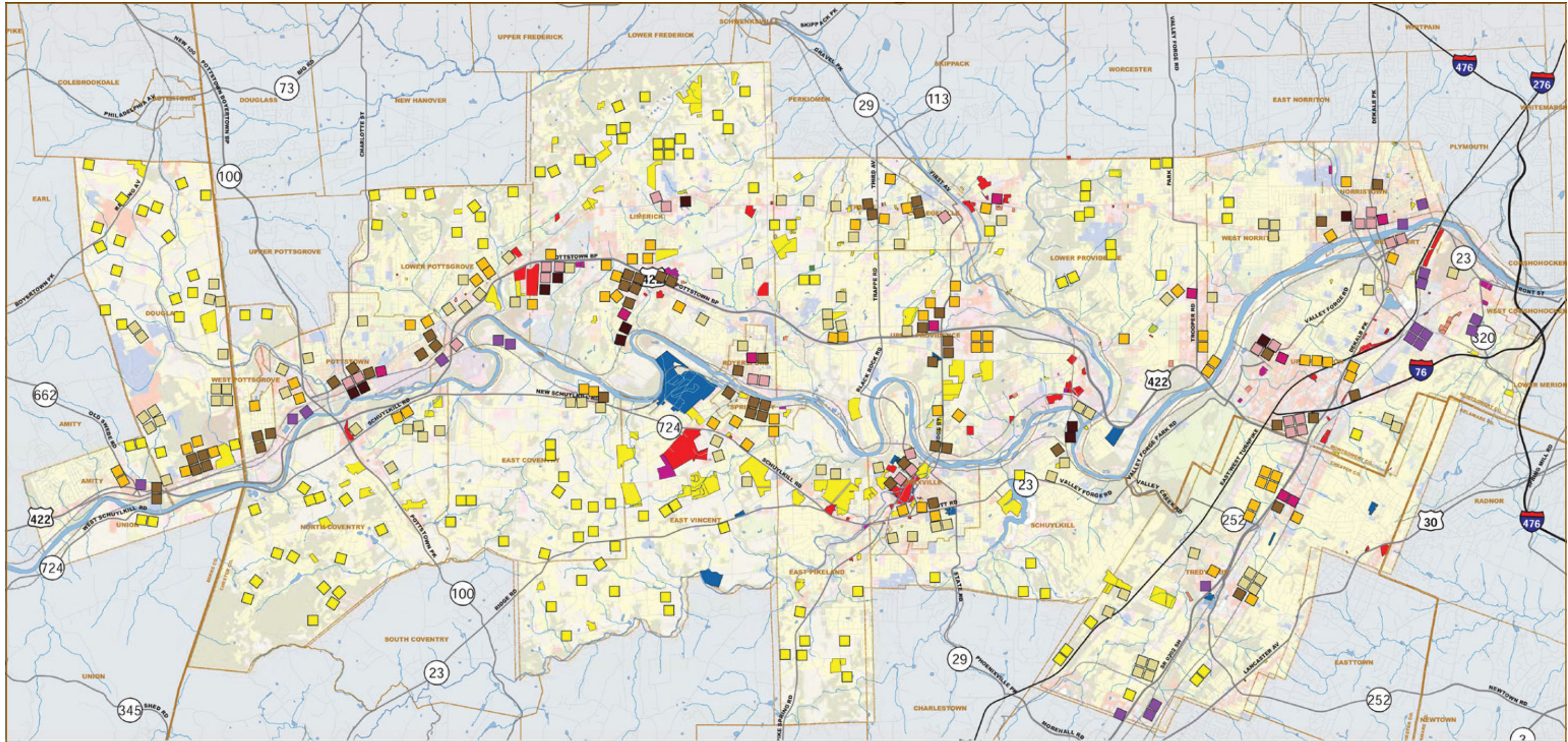
Sustainable Alternative land use plan supported with a comprehensive set of multi-modal transportation strategies (**Figure 17**). This future scenario would result in a transportation system with lower demands on roadway travel with more mobility choices. Sustainability strategies could reduce the degree and extent of congestion by reducing auto trips by approximately 13% – the majority deliverable by effective land use strategies – versus the Trend. New transportation investments would also be required to provide a mix of mobility choices, but the Sustainable Alternative limits the areas of impact within the corridor.

The Sustainable Alternative’s distribution of land use and development density of new construction would result in many desirable benefits, as follows:

- An auto usage (trip generation rate) that is lower than for the Trend
- Reduced vehicle miles traveled and related greenhouse gas emissions
- Support for multi-modal transportation options
- Revitalization and reinvestment in existing towns and centers
- More efficient use of limited resources (including fossil fuels) and existing infrastructure
- Creation of more walkable communities
- Preservation of substantial areas of remaining farmland and open space



Traditional downtowns are walkable, mixed-use settings with opportunities for transit and efficient mobility.



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Pending & Proposed Land Use

- Agricultural
- Commercial
- Industrial
- Institutional
- Office
- Open Space
- Recreational
- Residential

Other Future Land Use

- 20 Acres Residential (approx. 8 dwelling units)
- 20 Acres Residential (approx. 25 dwelling units)
- 20 Acres Residential (approx. 55 dwelling units)
- 20 Acres Residential (approx. 120 dwelling units)
- 20 Acres Residential (approx. 200 dwelling units)

- 20 Acres Mixed Use Residential/Retail (approx. 200 dwelling units approx. 25 employees per acre)
- 20 Acres Mixed Use Office/Retail (approx. 50 employees per acre)
- 20 Acres Industrial (approx. 20 employees per acre)

Existing Land Use

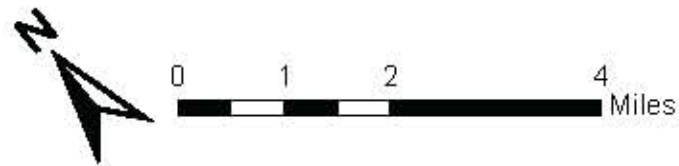
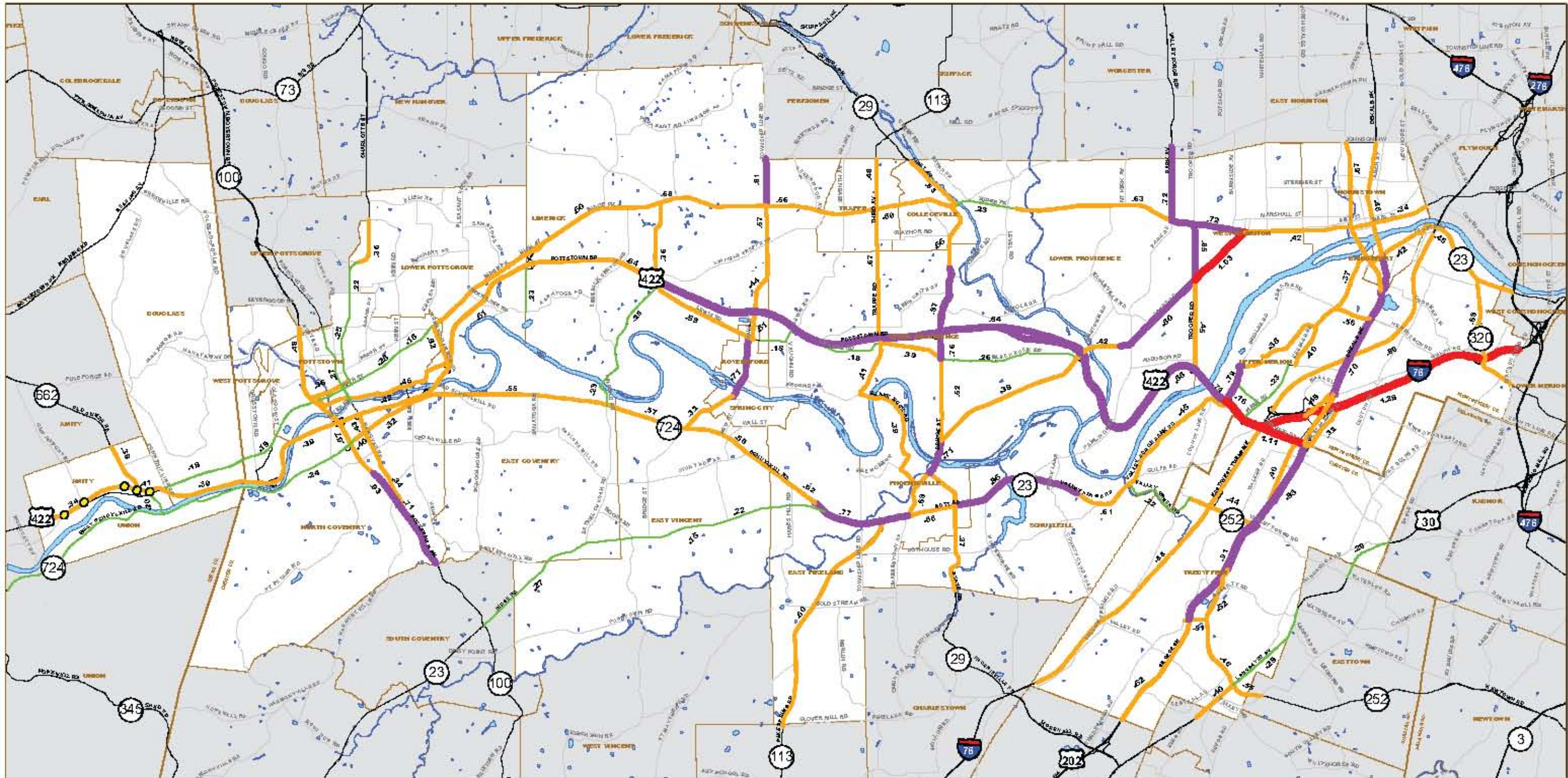
- Agriculture
- Commercial
- Community Services
- Light Manufacturing
- Heavy Manufacturing
- Parking
- Transportation & Utility
- Vacant
- Mining
- Recreation

- Residential-Single Family Detached
- Residential-Single Family Attached
- Residential-Multi-Family
- Residential-Mobile Home
- Wooded

US 422 Corridor Master Plan

2030 SUSTAINABLE ALTERNATIVE: LAND USE

Figure 16



Legend

Volume To Capacity

- <= 0.3
- 0.3 - 0.7
- 0.7 - 1.0
- >= 1.0

- Interstate
- US Route
- PA Route
- Other Major Road
- US 422 Signalized Intersections Contributing to Peak Period Congestion and Delay



**US 422 Corridor
Master Plan**

**2030 SUSTAINABLE ALTERNATIVE:
VOLUME TO CAPACITY RATIO**

Note: Year 2030 capacity assumes that projects identified in DVRPC's 2009 - 2012 Transportation Improvement Program (TIP) are complete.

Figure 17

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REGIONAL PLANNING COMMISSION
December, 2009

Prepared by: **McCormick Taylor**
Engineers & Planners Since 1946



CHAPTER 5 - STRATEGIES FOR SUSTAINABILITY AND A PROGRAM FOR PLAN IMPLEMENTATION

STRATEGIES FOR SUSTAINABILITY

How can the US 422 Corridor achieve a sustainable future? The following are 10 strategies for managing growth, development and travel demands within the corridor, grouped into categories.



Sustainable strategies support multiple modes of transportation.

■ Transportation

- Roadway and Interchange Capacity/Congestion Management
- New Transit/Extensions
- Bus Rapid Transit (BRT)



■ Community/Land Use Planning

- Revitalized Older Downtowns
- Mixed-Use Development
- Transit-Oriented Development (TOD)
- River Access
- Complete Streets/Access Management

■ Intermodal Facilities

- Park-and-Ride Lots

■ Land Preservation/Resource Preservation

- Farmland/Open Space Preservation

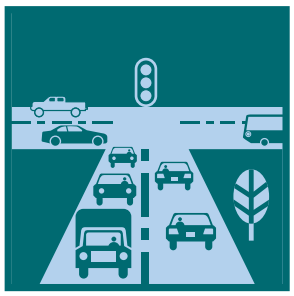
A public survey was conducted in February 2009 for this study. Respondents identified three important needs in the corridor, which included investments in highway capacity (along US 422 in particular), investments in transit, and investments in better land use planning and development practices. They were also asked to consider and rank their preferences among the 10 sustainable strategies for what they would like to see implemented. Among those surveyed, the following were the preferred priority strategies:

- Roadway and Interchange Capacity/Congestion Management
- New Transit/Extensions
- Revitalized Older Downtowns
- Mixed-Use Development
- Farmland/Open Space Preservation

Complete descriptions of the 10 potential strategies follow.

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: ROADWAY AND INTERCHANGE CAPACITY/CONGESTION MANAGEMENT



As congestion and demand for new roadway capacity increases, strategic investments in new capacity will be needed. These typically include new lanes, new connectors, new interchanges, interchange improvements and ITS (intelligent transportation systems). All new capacity and ITS improvements require time for planning, design, environmental approval and construction.

■ The region’s Congestion Management Plan is focused on specific strategic improvements to reduce congestion, including options here in the US 422 Corridor.

■ It is generally accepted that new roadway capacity is quickly “used up” as traffic continues to grow and is attracted to the capacity improvement. Some planners and engineers characterize this by stating “we can’t build our way out of congestion.” New capacity may or may not be compatible with land use goals and objectives of a region or community.

■ Projects are generally programmed through DVRPC’s TIP (transportation improvement program). Recently the demand for new capacity-adding projects has greatly exceeded the supplies of funds available from traditional state and federal funding sources.

■ In some areas of the country, innovative financing techniques are being explored and implemented. These can include tolls, transportation improvement districts and public/private partnerships.

■ In the US 422 Corridor, TIP funding has been allocated for major improvements at the River Crossing Complex which includes an additional bridge over the Schuylkill River and adjacent interchange improvements.



Scenes above show construction that is currently underway in the US 422 Corridor study area.

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: NEW TRANSIT/EXTENSIONS



Before the 1980s, passenger trains ran through the Schuylkill Valley from Philadelphia to Reading connecting many communities along the route. With declining train riders, that service was reduced and then eliminated. As open land in the US 422 Corridor is developed and population grows, traffic continues to increase on roads and expressways like US 422 adding to the peak hour travel and congestion. New passenger rail service is one strategy to manage traffic congestion and provide alternatives to car-based travel. Extending the existing R6 Regional Rail line west of its terminus in Norristown is a present option to supply passenger rail service in the corridor.

- There are many challenges for adding new or extended passenger rail service including the availability of rail corridors, tracks and cars, as well as financing to operate the service. The US 422 Corridor is fortunate to have many of the infrastructure elements still in place to re-establish passenger rail service to communities like Phoenixville, Pottstown, Reading and Wyomissing.
- A feasibility study was recently completed for the R6 Extension evaluating the potential to restore passenger rail service between Norristown and communities along the corridor as far west as Wyomissing. If passenger rail service is re-established in the corridor, it will provide a reliable alternative for some commuters in the US 422 Corridor while supporting revitalization of the older communities served and encouraging compact, transit-oriented development around stations.



Examples of new transit and facilities supporting its use can be found in Cranford, New Jersey (left), as well as Pasadena, California (right).

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: BUS RAPID TRANSIT (BRT)



BRT is bus service that is, at a minimum, faster than traditional local bus service and, at a maximum, includes grade-separated bus operations. Moderate-level BRT might include an exclusive BRT lane on a highway. The vehicles are usually specialized, more attractive, and more comfortable than traditional transit buses. To reduce travel time and to provide faster service, BRT may incorporate up-to-date technologies that provide off-vehicle payment and rapid boarding, among others.

- BRT along the US 422 Corridor could take advantage of the existing network of roads. It would be much cheaper to begin to operate BRT along the existing US 422 than to build a new light rail line.
- BRT along the US 422 Corridor could be implemented in stages. BRT could run generally in mixed traffic on US 422 and utilize a paved shoulder (as an exclusive BRT lane) only in areas where acute congestion occurs. As BRT ridership increases and as funding becomes available, the service could evolve into a more advanced form of BRT, with an exclusive lane throughout and stops with high-level platforms and more technically-advanced features.

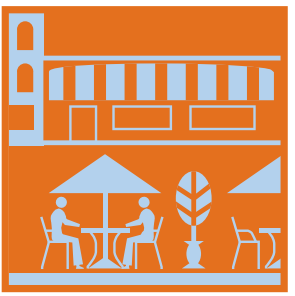
- BRT is most appropriate in instances where there are concentrations of jobs and/or residents that amount to “captive” riders for transit. BRT on US 422 would likely require centers of activity at several interchanges, with residential, retail, and office uses in mixed-use settings.
- BRT is well-suited for integration with park-and-ride facilities. Existing and future park-and-rides along US 422 would provide riders for BRT.



Bus Rapid Transit is currently being used in Eugene, Oregon (center). New transit terminals (right) have been built throughout the Eugene area.

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: REVITALIZED OLDER DOWNTOWNS



Whether we live in the city or suburb, today we are recognizing the value of our older downtowns and find them to be an important part of our culture, economy and lifestyle. To improve the physical condition of buildings and infrastructure and support the economic health of our older downtowns, specific programs foster reinvestment and revitalization. Many older cities and downtowns in the US 422 Corridor like Norristown, Phoenixville and Pottstown are being revitalized through public and private reinvestment. As downtown conditions improve and our demographic continues to change, people are returning to these older urban places for the amenities and conveniences they provide.

- Downtown revitalization is consistent with many Smart Growth and Pennsylvania Keystone Principles allowing people to live, work and play in close proximity, reducing reliance on personal auto travel and boosting transit ridership and system improvements.
- Downtown revitalization and reinvestment allows populations to live and travel more efficiently and economically while fostering preservation of remaining farmland and open space around them. More compact communities support less daily travel resulting in less congestion on our roads and highways.
- Because of the region’s industrial history and dependence on water for transportation, many older communities in what we now call the US 422 Corridor developed along the Schuylkill River. That history leaves a rich heritage of historic buildings and community diversity many are rediscovering. Today, that location is compatible with riverfront redevelopment and our desire to be near the water.



Inner ring suburbs and older downtowns are getting recognized as prime places for investment and revitalization.

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: MIXED-USE DEVELOPMENT



Mixed-use centers combine residences, shopping, employment, community facilities, and open space in a closely-knit, walkable, and bicycle- and transit-supportive setting. The use mix may be “horizontal,” meaning that differing uses are next to one another; or “vertical,” equating to buildings that may include ground floor retail shops, restaurants, and services with offices and/or residences above. A grid or modified grid of streets, with

small blocks, is widely recognized as the most supportive for pedestrian and bicycle mobility and creates the most flexible kind of network for cars, trucks, and buses as well. Roadways are constructed as *complete streets*, with sidewalks, crosswalks, landscaping, pedestrian-oriented lighting, provisions for transit stops and bicycle movement, and, in most cases, on-street parking.

- Boroughs and villages are good examples of existing mixed-use centers. Reinforcing the mixed-use nature of these places, with their traditional Main Streets and solid stock of buildings, can be an efficient way for corridor growth to occur. Adaptively-reused structures and new construction that is sensitively integrated are potential ways to accommodate new development in existing settings.
- New mixed-use centers at important interchanges of the US 422 Expressway may be the way to accommodate new development that will provide mobility choices for residents. As congestion increases and energy costs rise, these locations may be able to give residents options to get around by transit, such as BRT, as well as by car or on foot and by bicycle.

- Mixed-use centers offer great potential for the US 422 Corridor, since they encourage the development of different uses in close proximity to one another. Many resident trips, such as shopping, socializing, eating and drinking, entertainment, and even commuting may be internalized and can translate to walking, biking, or short trips by car instead of longer, time-consuming, and expensive vehicle trips.



Examples of mixed-use development in Pennsylvania include these streetscapes from the East Falls neighborhood in Philadelphia (left), Suburban Square in Ardmore (center), and Southside Works in Pittsburgh (right).

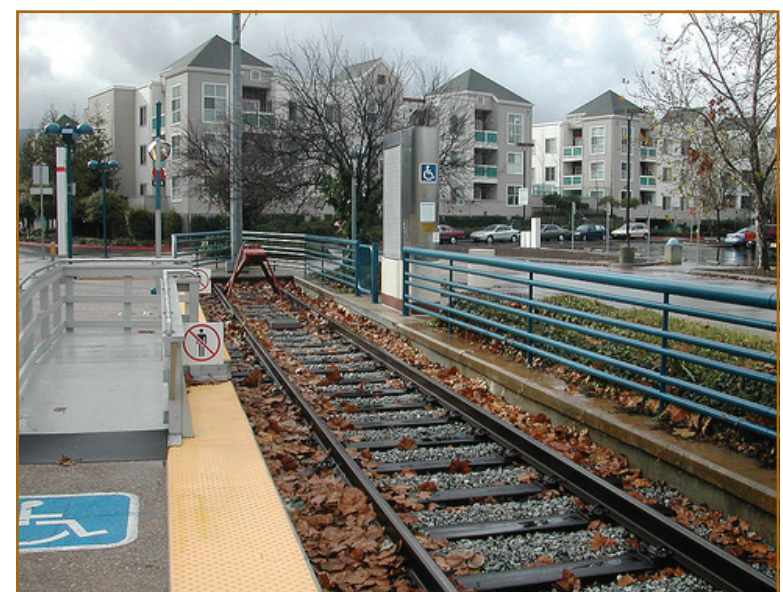
U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: TRANSIT-ORIENTED DEVELOPMENT (TOD)



TOD is characterized by compact, mixed-use development centered on transit stations. Concentrating complementary residential, commercial, and office uses around transit stations in a pedestrian-friendly environment creates an efficient land use setting in support of transit usage and provides convenience, mobility, and economy for residents, employees, and visitors. More intense development should be closest to the transit facility, with a gradual reduction in intensity as one moves outwards; office and retail destinations should be within 1/8-mile of the transit station and the majority of residential units within 1/4-mile (approximately a five-minute walk).

- TOD is a natural companion to the establishment or re-establishment of stations along the R6 Regional Rail line extension through the corridor.
- For boroughs and other existing centers with current or prospective R6 stations, TOD would be a matter of “infilling” districts and neighborhoods with additional development on vacant or underutilized sites to provide the required density to support rail transit service.
- For prospective rapid transit in other parts of the corridor, such as along US 422, new, relatively-intense, mixed-use centers would need to be established at interchanges to provide the conditions to support transit service such as BRT.
- TOD provides mobility choices for residents, employees, and visitors, and can internalize trips that might otherwise have meant traveling by car on US 422 or its connecting roadways.



Examples of transit-oriented development can be found in other parts of the country, including California (shown above).

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: **RIVER ACCESS**



Improving river access provides the opportunity to rediscover the Schuylkill River with riverfront activities, such as boating, hiking, bicycling and other leisure activities.

- The Schuylkill River has a long history of providing commercial and industrial activities, and transportation and recreational facilities for the surrounding communities.

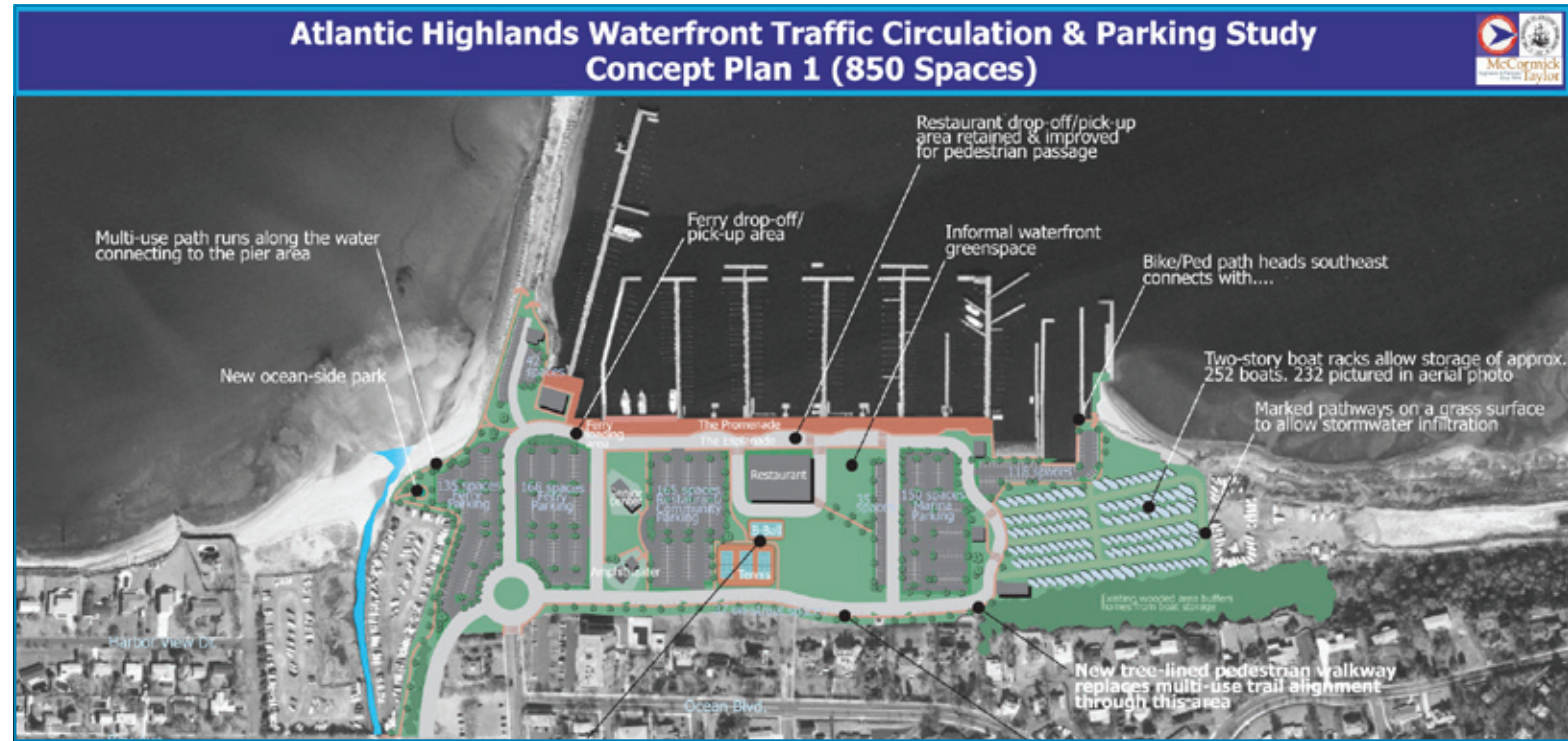
- Within the US 422 Corridor the Schuylkill River helped establish manufacturers including the Phoenix Iron Works in Phoenixville and the country's first blast furnace in Pottstown in the 1700s.

- With the rise of riverside industry came a loss of recreation along the river and, as manufacturing declined, its legacy remained an impediment to recreational access. The Schuylkill River is now being recognized as a great resource. Organizations such as the Schuylkill River Greenway Association and the Schuylkill River Heritage Area, in addition to preserving

the riverfront, have converted the historic Philadelphia Electric Company (PECO) building into their headquarters in Pottstown.

- One of the recreational opportunities, the Schuylkill River Trail, when complete will span from Philadelphia to Pottsville. Within the project limits Chester and Montgomery Counties are working together to complete the Schuylkill River Trail.

- There are numerous public access points to the Schuylkill River Water Trail for boating.



Example of Waterfront Access Conceptual Plan for Atlantic Highlands, New Jersey (left). Locally, Pottstown Riverfront Park provides easy access to the Schuylkill River (right).

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: COMPLETE STREETS/ACCESS MANAGEMENT



Complete streets can provide a balanced transportation system for motorists, cyclists and pedestrians of all ages and disabilities with connections between residences, schools, parks, public transportation, offices, and retail destinations in town centers and more urban areas.

- Several benefits to complete streets include encouraging walking and bicycling, a reduction in congestion, improved safety and better air quality.
- Access management, through minimizing the number of driveway curb cuts, can decrease conflicts among vehicles, cyclists, and pedestrians.

- Complete streets should be flexible to different users' needs and should fit into the context of the community.
- Elements that are often found in a complete street are bike lanes, bus lanes, transit stops, pedestrian crossings, street parking, median islands and pedestrian signals.



Access management helps create a streetscape with compatibility among modes of travel.



Examples of complete streets can be found in a number of communities. Locally, Phoenixville is shown at right.



U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

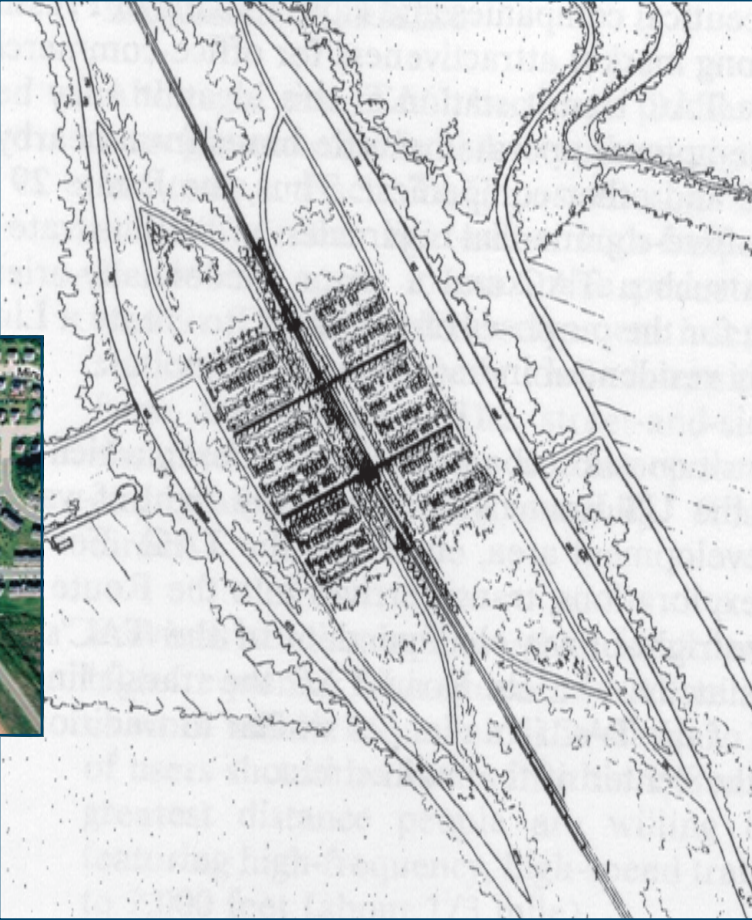
POTENTIAL STRATEGY: PARK-AND-RIDE LOTS



Park-and-ride lots are facilities where individuals can park their private vehicles and access public transportation or carpool/vanpool.

- There are already three park-and-ride lots in the US 422 Corridor, including one at the Lewis Road/US 422 interchange.
- Additional and larger park-and-rides may be effective “intercept” facilities for inbound commuters on US 422 if there is rapid transit available at these sites.

- Two potential locations for future park-and-rides along US 422 are at the Sanatoga interchange and in the wide median near the Oaks interchange. A plan for park-and-ride at this latter site, in conjunction with BRT (Bus Rapid Transit), has already been developed at a conceptual level.
- Other potential locations for future park-and-rides in the corridor include stations on the R6 Regional Rail extension.



A plan for a park-and-ride facility near the Oaks interchange, in conjunction with BRT, is shown above at left. Examples of park-and-ride facilities in Pennsylvania and New Jersey are shown at right.

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

POTENTIAL STRATEGY: FARMLAND/OPEN SPACE PRESERVATION



In the US 422 Corridor, each year hundreds of acres of farmland, open space and forest are converted to housing and commercial developments. In the 10 years between 1995 and 2005, 7,980 acres of open land were permanently converted to urban uses. While growing communities need land to expand, open space is also recognized as valuable for farming, recreation, aesthetics and water resource protection. The Schuylkill Highlands is an example of a Conservation Land Initiative (CLI) in the corridor recognized by the Commonwealth of Pennsylvania. It is currently being advanced by the Natural Lands Trust.

Several techniques can be used to preserve and protect farmland and open space, including:

- Purchase of land by government or land conservancies
- Transfer of Development Rights (TDR) – allows land to remain in private ownership or agricultural use while selling or transferring the development rights to another parcel of land

- Agricultural Preservation Programs – many counties like Chester, Montgomery and Berks provide dollars for farmland preservation through bonds
- Conservation/Hazard Zoning – sets aside land areas with special resource value (like wetlands) or natural hazards (like steep slopes) to remain undeveloped through local regulations
- Agricultural Zoning – restricts development of large, contiguous areas of high value farmland by reserving the land use for agricultural activities



Open space and farmland preservation can be greatly expanded in the US 422 Corridor.

CHAPTER 5

RECOMMENDED PROGRAM ELEMENTS

The priority strategies were further developed and the degree of current need determined. Specific locations for implementation of strategies were identified, along with responsible agencies, funding sources and next steps. This information is presented in **Table 1** and **Figures 18, 19** and **20**. The information is intended to guide agencies in the implementation of actions that will achieve the sustainable objectives of the US 422 Corridor Master Plan. GVF Transportation will continue to promote the plan, and advocate and monitor its implementation through the US Route 422 Corridor Coalition.

Implementation of some program elements will be dependent upon available funding. Pennsylvania, like

many states, is facing staggering transportation investment needs due to aging infrastructure and rising construction costs. These needs exceed available funding levels. Transportation funding needs have reached a critical point at all levels of government. The current funding system is inadequate and is reflected in the following points:

- Federal and State funding levels for transportation have not increased with inflation.
- The Federal Highway Trust Fund is projected to show a \$3.2 billion deficit in its highway account next year.
- National efforts to reduce gasoline consumption are succeeding. In 2007, Congress mandated a 40% increase in automobile fuel efficiency (CAFE) by the year 2020, which will lead to a corresponding decrease in gas tax revenue.

- Over the last two years, people have been driving less. A decrease in Vehicle Miles Traveled leads to less usage of gasoline, thereby reducing revenue from gas taxes.
- Since 2003, there has been a 43% increase in the cost of highway construction materials. (Source: Bureau of Labor Statistics)

Lawmakers and policy experts from across the country agree that alternative funding solutions are needed.

In Pennsylvania, the Transportation Funding and Reform Commission issued a report in November 2006, that confirmed a funding crisis exists for transportation facilities in the Commonwealth. The report identified an annual need of \$1.6 billion per year in additional funding for the state's transportation network.

Many believe that tolls are required to provide the additional funding needed to make critical improvements that cannot be funded with available federal or state resources. Other options like the gas tax increase have not come to fruition. Tolls are an equitable way to raise the revenue to support the improvement and maintenance of the roads that people use and rely on most. Consequently, tolling US 422 has been much discussed in recent months.

The R6 Norristown Service Line Extension Study was released by the Montgomery County Planning Commission in February 2009 for public comment. The study addresses the feasibility of restoring passenger rail service to the US 422 Corridor. As part of the study, multiple streams of revenue for funding the rail service are recommended. One of the recommendations is for open road tolling on US 422 to fund roadway improvements and provide rail service. This has prompted Montgomery County and other project partners to pursue a Traffic and Revenue Study to further investigate the needed steps to raising funds for the rail service.



Rendering showing open road tolling of an expressway.

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action					Degree of Current Need	Funding / Timing / Programming (E,R,U,C) * **			Status/Next Steps/Notes	Responsible Agency/ Partners	
			Lane Capacity	Safety/ Operational Imprvmnts.	Signal Interconnect/ ITS	Complete Streets	Access Management		1ST Period 2009 – 2012	2ND Period 2013 – 2021	3RD Period 2022 – 2030			
A. TRANSPORTATION														
Roadway/Network Improvements														
- US 422	River Crossing Complex (PA 23 - PA 363)	H1	•	•			High	MPMS#16489 \$23.305 Million (E-C) MPMS#51359 \$17.848 Million (C) MPMS#70197 \$4 Million (E) PA ID#672 \$800,000	MPMS#64796 \$145 Million (C) MPMS#70197 \$52 Million (C)			Currently in design MPMS#16489 Valley Forge Park Trail Bridge; New Bike/Ped. Trail over Schuylkill (C047) MPMS#51359 PA 422/PA 29 Resurfacing Township Line MPMS#64796 US 422/PA 363 Interchange MPMS#70197 US 422 (New) Expwy Bridge over Schuylkill River	PennDOT, County, Municipalities, GVFTMA	
	US 202 to PA 23	H2	•	•			High			■		Pending a traffic/toll revenue study	PennDOT, County, Municipalities, GVFTMA	
	PA 363 to PA 29	H3	•	•			High			■		Pending a traffic/toll revenue study	PennDOT, County, Municipalities, GVFTMA	
	PA 29 to Sanatoga interchange	H4	•				High			■		Pending a traffic/toll revenue study	PennDOT, County, Municipalities, GVFTMA	
	Sanatoga interchange to end of limited-access freeway	H5		•	•		High	PA ID#384 \$1.2 Million MPMS#64222 \$2.5 Million (R,U) MPMS#66986 \$39.252 Million (E-C)	MPMS#14698 \$13.295 Million (C) MPMS#16738 \$59.745 Million (E-C) MPMS#64220 \$2.26 Million (E,R,U) MPMS#64222 \$67.755 Million (C)	MPMS#64220 \$30 Million (C)		Currently in design Pottstown Bypass (US 422) Reconstruction Traffic Study, Dated Dec. 2002 MPMS#14698 US 422, Schuylkill River to Keim Street: M2B MPMS#16738 US 422, East of Norfolk Southern to Park Road: M1B MPMS#64220 US 422, Keim Street Ramps to PA 724 Ramps: M03 MPMS#64222 US 422, PA 724 Ramps to West of Porter Road: M1A MPMS#66986 US 422, Berks County to Schuylkill River: M2A	PennDOT, County, Municipalities, GVFTMA	
	Douglass and Amity (end of limited-access freeway)	H6				•	•	High			■		Access Management Study with Local Municipalities	PennDOT, County, Municipalities, GVFTMA
- Parallel Routes	Ridge Pike/High Street	H7	•	•	•	•	Moderate	MPMS#16652 \$3.890 Million (U,C) MPMS#48175 \$0.840 Million (E,R) MPMS#71206 \$0.679 Million and \$103,652 Locally Funded (E,C)	MPMS#48175 \$9.772 Million (C)			MPMS#16652 Ridge Pike (Bridge) MPMS#48175 Ridge Pike, Norristown Boro. to Butler Pike (Pha.I) MPMS#71206 Collegeville Streetscape, TE	PennDOT, County, Municipalities, GVFTMA	
	PA 724	H8		•	•	•	Moderate			■		Integrate with Transportation Operation Master Plan for US 422 PA 724 Corridor Study dated September 2004 – Continue Vision, Corridor Study Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA	
	PA 23	H9	•	•	•	•	Moderate	MPMS#16490 \$6.421 Million (C) MPMS#47981 \$0.840 Million (C)	MPMS#48172 \$57 Million (E-C)			SR 23 Upper Merion Township (Section UMT) Traffic Study MPMS#16490 SR 23 at Old Betzwood MPMS#47981 Phoenixville Closed Loop MPMS#48172 PA 23 Relocation at Allendale Road and Beidler Road Complete Streets in Phoenixville Area Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA	
	Egypt Road	H10		•	•	•	High			■		Implement Congested Corridor Improvement Program Egypt Road (SR 4002) dated May 2003 Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA	
	Black Rock Road/Yeager Road	H11		•	•		Moderate			■		Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA	

Note: For more information about the MPMS#/Project ID#s shown on this matrix as part of the current TIP for PA, please visit www.dvrpc.org/TIP/

* E: Engineering R: Right-of-Way U: Utility Relocation C: Construction ** Dependent on Available Funding ■ Consider Future Program Action

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action					Degree of Current Need	Funding / Timing / Programming (E,R,U,C) * **			Status/Next Steps/Notes	Responsible Agency/ Partners
			Lane Capacity	Safety/ Operational Imprvmnts.	Signal Interconnect/ ITS	Complete Streets	Access Management		1ST Period 2009 – 2012	2ND Period 2013 – 2021	3RD Period 2022 – 2030		
A. TRANSPORTATION													
Roadway/Network Improvements													
- Intersecting Routes	PA 100	H12		•	•			Moderate	MPMS#16194 \$6.580 Million (C)			Implement N. Chester Co. Gateway Master Plan Chester County, PA Transportation Study dated Dec. 2001 Implement Tri-County Vision Plan Tri-County Transportation Study dated Aug. 2008 MPMS#16194 High Street Bridge Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA
	Township Line Road	H13		•	•	•		Moderate			■	Complete Streets north of US 422 Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA
	Lewis/Linfield Road	H14		•	•			Moderate	MPMS#16699 \$1.150 Million (R-C)			MPMS#16699 Linfield Road Culvert Limerick Township ITS facilities near US 422 Interchange Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA
	PA 113	H15		•	•			Moderate	MPMS#14699 \$0.875 Million (C)			MPMS#14699 Gay Street/French Creek Phoenixville Boro. PA 113 Heritage Corridor Transportation and Land Use Study dated Aug. 2005	PennDOT, County, Municipalities, GVFTMA
	PA 29	H16		•	•	•		High	MPMS#77459 \$1 Million (C)			MPMS#47981 Phoenixville Closed Loop; PA 29, PA 23 and PA 113 MPMS#77459 Phoenixville Streetscape Project Integrate with Transportation Operation Master Plan for US 422	PennDOT, County, Municipalities, GVFTMA
	Pawlings Road – Future Interchange	H17		•				Moderate			■	Future Interchange	PennDOT, County, Municipalities, GVFTMA
	Hanover Street	H18		•	•	•		Moderate		MPMS#48186 \$6 Million (C)		MPMS#48186 Pottstown Area Signal System Upgrade PCTI \$1.775 Million Hanover Street Road Diet Integrate with Transportation Operation Master Plan for US 422	
- Other Routes/Links	French Creek Parkway	H19	•			•		Low – Moderate	Total Cost \$50.425 Million MPMS#57659 \$1.35 Million (E) PA ID#387 \$4 Million PA ID#581 \$1Million	MPMS#57659 \$22.5 Million (R,C)		MPMS#57659 French Creek Parkway	PennDOT, County, Municipalities, GVFTMA
	Northern Relief Route/Fillmore Street Extension	H20	•	•		•		Moderate – High		■ \$3.0 Million (E)	■ (R,C)	Potential Re-routing of PA 113; Identify Funding for Preliminary Engineering	PennDOT, County, Municipalities, GVFTMA
- PA Turnpike	Within the project limits	H21			•			High			■	Candidate, PA Turnpike Funded with Roadway & Interchange Improvement	PA Turnpike, PennDOT
	PA 29 – Future Interchange	H22						High	PTC \$74.8 Million (U,C)			Candidate, PA Turnpike Funded – Currently in Final Design	PA Turnpike, County, Municipalities, GVFTMA
	Milepost 320 (PA 29) to Milepost 312 (PA 100)	H23	•					Moderate		PTC \$122.0 Million (E-C)	PTC \$200.0 Million (C)	Candidate, PA Turnpike Funded	PA Turnpike, County, Municipalities, GVFTMA
	Milepost 320 (PA 29) to Milepost 326 (Valley Forge)	H24	•					High	PTC \$123.0 Million (E-C)	PTC \$95.0 Million (C)		Candidate, PA Turnpike Funded – Pre-design Complete	PA Turnpike, County, Municipalities, GVFTMA

Note: For more information about the MPMS#/Project ID#s shown on this matrix as part of the current TIP for PA, please visit www.dvrpc.org/TIP/

* E: Engineering R: Right-of-Way U: Utility Relocation C: Construction ** Dependent on Available Funding ■ Consider Future Program Action

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action					Degree of Current Need	Funding / Timing / Programming (E,R,U,C) * **			Status/Next Steps/Notes	Responsible Agency/ Partners
			Lane Capacity	Safety/ Operational Imprvmnts.	Signal Interconnect/ ITS	Complete Streets	Access Management		1ST Period 2009 – 2012	2ND Period 2013 – 2021	3RD Period 2022 – 2030		
A. TRANSPORTATION													
Roadway/Network Improvements													
- PA Turnpike	Lafayette Street (Norristown)	H25			•			Moderate	MPMS#79864 \$2.405 Million (R)	PTC/MPMS#79863 \$41.0 Million (R,C) MPMS#79864 \$10.40 Million (C) MPMS#79928 \$57.5 Million (C)		PA Turnpike Funded/MPMS#79863 Widen and extend Lafayette – Ford to Conshohocken Road/Electronic Interchange with Turnpike; Currently in design MPMS#79864 Widen Lafayette – Barbadoes to Ford; Currently in design MPMS#79928 Extend Lafayette and Dannehower Bridge Interchange; Currently in design	PA Turnpike, PennDOT, County, Municipalities, GVFTMA
Interchange/Intersection Improvements	All US 422 interchanges within the project limits	H26		•				Moderate			■	Deceleration and Acceleration lane lengths and interchange signing	PennDOT, County, Municipalities, GVFTMA
	Intersection of Egypt Road and Black Rock Road	H27		•				Moderate			■		PennDOT, County, Municipalities, GVFTMA
	Intersection of US 422 EB off-ramp and Lewis Road	H28		•				Low			■		PennDOT, County, Municipalities, GVFTMA
Bridges/River Crossings	Keim Street Bridge (Pottstown-North Coventry)	H29					Structurally Deficient	High-Moderate	MPMS#83742 \$1.607 Million (E)	MPMS#83742 \$0.05 Million (U)	■ (C)	Monitored via PennDOT's Bridge Program; Consultant Selected for Design Preliminary Engineering Funded for FY09	County/PennDOT, GVFTMA
	Main Street/Bridge Street (Spring City-Royersford)	H30					•	Moderate			■	Monitored via PennDOT's Bridge Program	County/PennDOT, GVFTMA
	Hanover Street Bridge (Pottstown)	H31					•	Moderate			■	Monitored via PennDOT's Bridge Program	County/PennDOT, GVFTMA
	InterCounty/Northern Relief Route (Phoenixville – Upper Providence)	H32					•	High			■	Preserve existing Right-of-Way between PA 113 and PA 29	County/PennDOT, Municipalities, GVFTMA
Transit Improvements													
- Rapid Transit	Norristown to Wyomissing	T1	R6 Extension					High			■	Next Steps: Traffic/Toll Revenue Study, Engineering	SEPTA, Counties, Municipalities, GVFTMA, Business
	US 422 (Pottstown/King of Prussia/Norristown)	T2	Bus Rapid Transit					Moderate (depends on R6 timing)			■	Next Steps: Engineering/Feasibility Study	PennDOT, SEPTA, GVFTMA & Local Municipalities
	Phoenixville to Great Valley to Paoli	T3	Green Line/Devault Line					Low-Moderate			■	Next Steps: Alternative Analysis/Feasibility; Greenline Study	SEPTA, County, Municipalities
- Bus Routes	Sanatoga interchange - Outlets		Local bus routes					Low			■	Monitor Demand	SEPTA/GVFTMA
	Lewis Road Master Plan		Local bus routes					Low			■	Monitor Demand	SEPTA/GVFTMA
	"Transit Stations to Boroughs" Bus Loop		Local bus routes					Low			■	Monitor Demand	SEPTA/GVFTMA
Trails (Bike/Pedestrian)	Schuylkill River Trail	BP1	Construct Trail					High	MPMS#59434 \$1.5 Million (E,R)	MPMS#59434 \$11.25 Million (C) MPMS#61885 \$0.520 Million (C)		MPMS#59434 Schuylkill River Trail (Q20); Currently in design MPMS#61885 Schuylkill River Trail along South Bank of French Creek (Q42)	County, Municipalities
	Toonerville Trolley Trail	BP2	Construct Trail Segments					Moderate	■ \$3.8 Million (E-C)			Identify Funding	PennDOT, County, Municipality

Note: For more information about the MPMS#/Project ID#s shown on this matrix as part of the current TIP for PA, please visit www.dvrpc.org/TIP/

* E: Engineering R: Right-of-Way U: Utility Relocation C: Construction ** Dependent on Available Funding ■ Consider Future Program Action

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action	Degree of Current Need	Funding / Timing / Programming (E,R,U,C) * **			Status/Next Steps/Notes	Responsible Agency/ Partners
					1ST Period 2009 – 2012	2ND Period 2013 – 2021	3RD Period 2022 – 2030		
A. TRANSPORTATION									
Trails (Bike/Pedestrian)	Valley Forge Park Trail Bridge; New Bike/Ped. Trail over Schuylkill River	BP3	Construct Trail	High	MPMS#16703 \$0.800 Million (E-C)			MPMS#16703 Valley Forge Park Trail Bridge; New Bike/Ped. Trail Over Schuylkill (C047) MPMS#16705 Chester Valley Trail Extension (C036)	PennDOT, Counties, VFNHP, Municipalities, GVFTMA PennDOT, Counties, Municipalities, GVFTMA
	Chester Valley Trail Extension	BP4	Construct Trail	High	MPMS#16705 \$9.826 Million (E-C)				
Other Emergency/Incident Management Detour Routes	Industrial Highway		ITS	High			■	Integrate with Transportation Operations Master Plan for US 422	PennDOT, Counties, Municipalities, GVFTMA
	Bridge Street/Main Street		ITS	High			■	Integrate with Transportation Operations Master Plan for US 422	PennDOT, Counties, Municipalities, GVFTMA
	Ridge Pike/Main Street		ITS	High			■	Integrate with Transportation Operations Master Plan for US 422	PennDOT, Counties, Municipalities, GVFTMA
	PA 23/Moore Road/First Avenue/Keebler Road/Henderson Road		ITS	High			■	Integrate with Transportation Operations Master Plan for US 422	PennDOT, Counties, Municipalities, GVFTMA
	North Gulph Road		ITS	High			■	Integrate with Transportation Operations Master Plan for US 422	PennDOT, Counties, Municipalities, GVFTMA
	Swedesford Road		ITS	High			■	Integrate with Transportation Operations Master Plan for US 422	PennDOT, Counties, Municipalities, GVFTMA

Note: For more information about the MPMS#/Project ID#s shown on this matrix as part of the current TIP for PA, please visit www.dvrpc.org/TIP/

* E: Engineering R: Right-of-Way U: Utility Relocation C: Construction ** Dependent on Available Funding ■ Consider Future Program Action

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action	Degree of Current Need	Deliverability/ Time Frame **	Funding	Status/Next Steps/Notes	Responsible Agency/ Partners
B. COMMUNITY/LAND USE PLANNING								
Downtown Revitalization	Norristown, Bridgeport, Royersford, Pottstown, Collegeville, Trappe, Paoli		Follow Keystone Principles. Direct public funding and programs and advanced technical assistance to these places. Form public-private partnerships to jump-start investments and actions. Offer inducements for private sector participation including zoning changes, reduced off-street parking requirements, strategic tax abatements, and expedited approvals.	High Many locations currently underway. Requires long-term strategy and commitment of investors programs.	Short and Long-Term	Montgomery County Economic Development Programs – Community Revitalization, Central Business District Fund, Renaissance Fund, Business Location Fund, Visioning Fund, and Commercial and Industrial Reinvestment Fund.	Small Area and Master Plans strongly advised. Need to market plans to investors/partners.	Region, Counties, Municipalities, Economic Development Corps., State Agencies, Property owners and investors
	Phoenixville and Spring City	Chester County Community Revitalization Programs – Eligible Activities: Streetscape, Traffic Calming, Parking, Bike Lanes, Sewer/Water Upgrade, Stormwater.				Costs vary widely. Many small projects will not be that costly. Main Street, CDBG, and other programs.		
Vary & Intensify Land Use (except for Ridge Pike & Twp. Line Rd. these are essentially Interchange Activity Areas)	King of Prussia, “The Village at Valley Forge”, 202 Corridor (Tredyffrin), 422-363 interchange area (Trooper Rd.), Oaks Expo area, 422-29 interchange area, 422-Royersford interchange area, 422-Ridge Pike interchange area (Sanatoga), Ridge Pike & Twp. Line Rd., 422-100 interchange area.		Convert single-use commercial tracts so as to combine residences, shopping, employment, community facilities, and open space in a closely-knit, walkable, and bicycle- and transit-supportive setting. Encourage ‘vertical’ mixing of uses, with buildings that have ground floor retail with offices and/or residences above. Install grids of streets with small blocks. Change zoning and other regs. to allow this.	High to Moderate Probably the single best strategy to avoid sprawl and dispersed development as corridor land area develops.	Short and Long-Term	Public costs are relatively low	Need to plan through Small Area and Master Plans; engage in dialogue with property owners, investors, and citizens; adopt new development regulations; market concepts.	Municipalities, Property owners and investors, Counties, Region, State Agencies, Transit Agencies
Transit-Oriented Development	Norristown, Valley Forge, Royersford, Pottstown, Monocacy as R6 Regional Rail stations are primary. Other R6 Regional Rail possibilities include Pawlings Road, Mingo, Linfield, Lower Pottsgrove, and Stowe. BRT-related possibilities include all Interchange Activity Centers listed immediately above. Paoli is existing R5 Regional Rail station with TOD plans.		Concentrate complementary residential, commercial, office uses, schools and institutions around transit stations. More intense development should be closest to the transit facility, with a gradual reduction in intensity as one moves outwards; office and retail destinations should be within 1/8-mile of the transit station and the majority of residential units within 1/4- mile of the transit station.	High, when commitment to R6 extension and/or BRT is there.	Medium and Long-Term	Montgomery County Economic Development Programs – Community Revitalization, Central Business District Fund, Renaissance Fund, Business Location Fund, Visioning Fund, and Commercial and Industrial Reinvestment Fund.	Need to plan through Small Area and Master Plans; engage in dialogue with property owners, investors, and citizens; adopt new development regulations; market concepts. Use Pennsylvania’s Transit Revitalization Investment District (TRID) program through DCED and PennDOT to achieve the following objectives:	Municipalities, Property owners and investors, Transit Agencies, FTA, Counties, Region, State Agencies, TMA
	Phoenixville and Spring City	Chester County Community Revitalization Programs – Eligible Activities: Streetscape, Traffic Calming, Parking, Bike Lanes, Sewer/Water Upgrade, Stormwater.				<ul style="list-style-type: none"> • Provide incentives for transit-oriented development and intermodal planning • Stimulate public-private partnerships to encourage private sector investment at development sites around transit stations • Establish mechanisms to capture the value added by joint development activities • Encourage community involvement in the location, design, and implementation of TRIDs 		

** Dependent on Available Funding

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action	Degree of Current Need	Deliverability/Time Frame **	Funding	Status/Next Steps/Notes	Responsible Agency/Partners
B. COMMUNITY/LAND USE PLANNING								
Improve River Access/Connectivity	In particular at population centers (river boroughs and villages), at roadway and trail crossings, prospective transit stations, and at Valley Forge NHP.		Construct and maintain riverfront parks and trails, as well as docks, ramps, and boat slips. Offer boat, canoe, and kayak rentals, and other marine services. Trailhead improvements including parking, wayfinding, bike racks and bathroom facilities.	Moderate	Short and Medium-Term	Varies widely. Many small projects will not be that costly. DCNR, County Open Space, and other programs.	Prioritize locations where improved access is needed or possible.	Counties, Municipalities, River Associations, Local Users, TMA
Smart Corridors	Douglass and Amity 422 arterial corridor; Ridge Pike; Rte. 724; Trooper Road		Install access management and corridor overlay planning and zoning. Concentrate activities at limited number of locations and prevent strip development.	High	Short and Long-Term	Public costs are relatively low	Need to prepare corridor plans; engage in dialogue with property owners and citizens; adopt new development plans and regulations. (eg: Comprehensive Plan and Zoning Ordinances)	Counties, Municipalities, Property owners, PennDOT, TMA

** Dependent on Available Funding

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

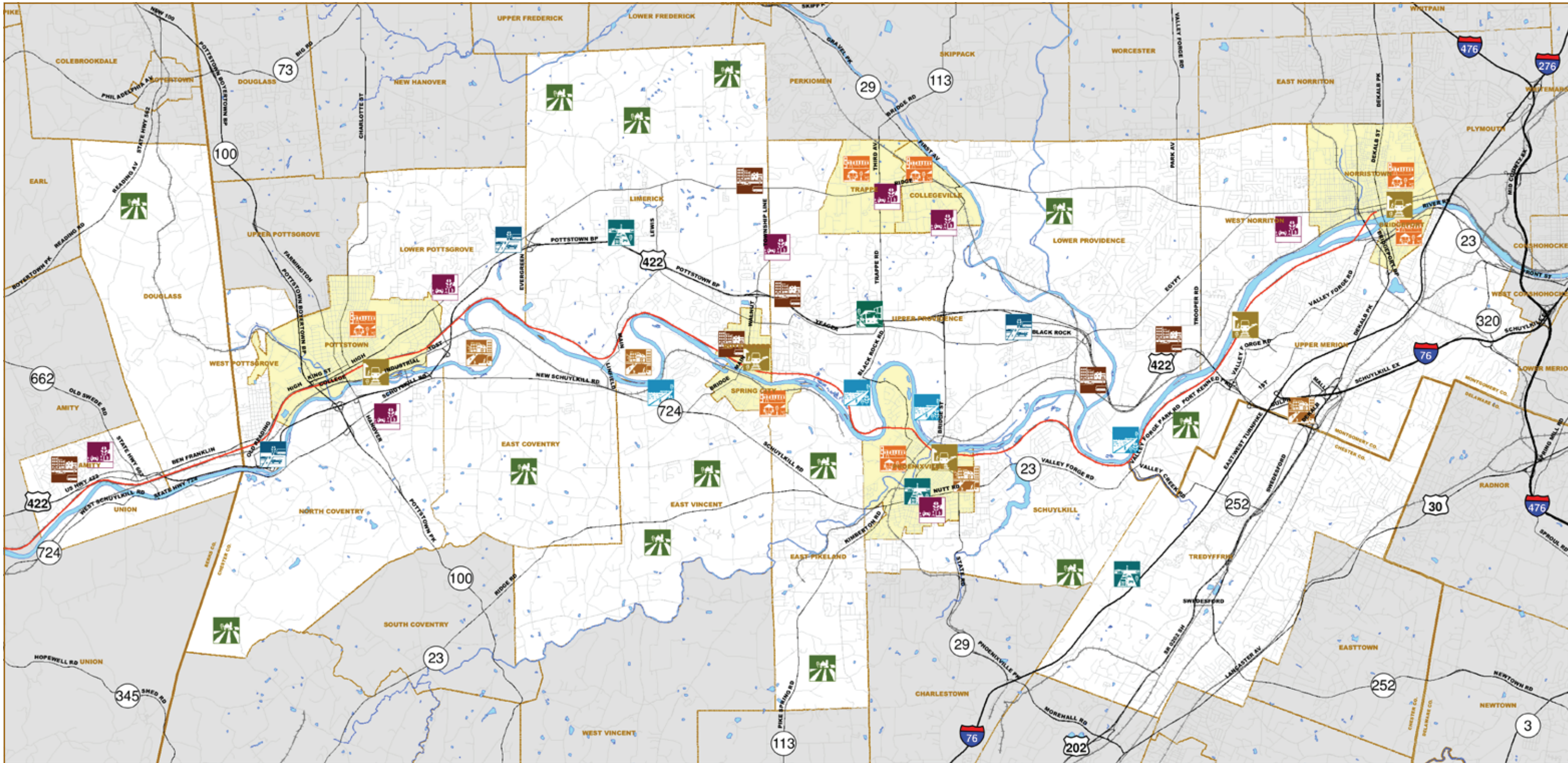
PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action	Degree of Current Need	Deliverability/ Time Frame **	Funding	Status/Next Steps/Notes	Responsible Agency/ Partners
C. INTERMODAL FACILITIES								
Intermodal Center	Pottstown or Lower Pottsgrove in west; Valley Forge in east.		Intermodal facilities with BRT and/or R6 transfer, park 'n ride, kiss 'n ride, taxis, shuttles, enclosed waiting with restrooms, ticket machines, other services.	High, when commitment to R6 Extension and BRT (together) is there.	Dependent on R6/BRT Implementation	<p>FIA funding needed. Also look to public-private partnerships, with transit agency and developers involvement.</p> <p>Montgomery County Economic Development Programs – Community Revitalization, Central Business District Fund, Renaissance Fund, Business Location Fund, Visioning Fund, and Commercial and Industrial Reinvestment Fund.</p>	Intermodal facilities Master Plan required.	Transit Agencies, FTA, Counties, TMA, Region, State Agencies, Municipalities, Property owners and investors
Park-&-Ride Facilities	Stowe slip ramps from 422, Sanatoga interchange, and in wide median near the Oaks interchange.		Large 'intercept' lots for inbound commuters allow for transfer onto R6 at Stowe and onto BRT at Sanatoga interchange and at wide median near the Oaks interchange.	High, when commitment to R6 Extension is there for Stowe or commitment to BRT is there for Sanatoga & Oaks.	Dependent on R6/BRT Implementation	FTA funding needed.	Initiate planning and design concurrent with capacity improvements and Transit.	Transit Agencies, FTA, Counties, TMA, Region, State Agencies, Municipalities, Property owners and investors
Transit Station/Area Improvements	<p>Existing, Proposed and Future Stations throughout Corridor</p> <ul style="list-style-type: none"> Proposed Restoration of Previous Stations for R6 Passenger Rail Extension (1st Priority): Norristown – Norristown, Montgomery County Valley Forge – Upper Merion, Montgomery County Phoenixville – Phoenixville, Chester County Royersford – Royersford, Montgomery County and Spring City, Chester County Pottstown – Pottstown, Montgomery County Monocacy – Amity, Berks County Potential R6 Passenger Rail Extension Stations: Pawlings Road – Schuylkill, Chester County Mingo – Upper Providence, Montgomery County Linfield – Limerick, Montgomery County Lower Pottsgrove – Lower Pottsgrove, Montgomery County Stowe – West Pottsgrove, Montgomery County / Douglass, Berks County 		Improve facilities, parking, sidewalks, pedestrian bridges, signing, add conveniences where feasible	Varies	Short, Mid and Long-Term	<p>FIA funding needed. Also look to public-private partnerships, with transit agency and developers involvement.</p> <p>Montgomery County Economic Development Programs – Community Revitalization, Central Business District Fund, Renaissance Fund, Business Location Fund, Visioning Fund, and Commercial and Industrial Reinvestment Fund.</p> <p>Chester County Community Revitalization Programs – Eligible Activities: Streetscape, Traffic Calming, Parking, Bike Lanes, Sewer/Water Upgrade, Stormwater.</p>	Intermodal facilities Master Plan required.	Transit Agencies, FTA, Counties, TMA, Region, State Agencies, Municipalities, Property owners and investors

** Dependent on Available Funding

TABLE 1 – Recommended Program Elements for Sustainable Transportation and Land Use (continued)

PROGRAM ELEMENTS	Location/Limits	Map Ref. No.	Strategy/Improvement/Action	Degree of Current Need	Deliverability/Time Frame **	Funding	Status/Next Steps/Notes	Responsible Agency/Partners
D. LAND PRESERVATION/ RESOURCE PROTECTION								
Open Space Preservation	Schuylkill River Corridor Perkiomen Creek Corridor Rural/Heritage Landscapes		<ul style="list-style-type: none"> Land purchase/donation; conservation easements; TDR Educational programs/Campaigns 	High (dependent on area and development pressure) programs, Land Conservancies	Ongoing	Varies	Coordinate with Counties Open Space Programs/Priorities	County Open Space programs, Municipal Government, State
Stream and Riparian Corridors/Critical Lands	Wetlands Forested Riparian Buffers Forests		<ul style="list-style-type: none"> Conservation easements; Hazard Zoning Ordinance; Resource protection zoning Educational Programs/Incentives Tree planting/revegetation 	High (dependent on area and development pressure)	Ongoing	Low cost	Coordinate with PADEP, USDA Soil Conservation Districts, PADCNR and Conservancies.	County and Municipal Government
Resource Protection (Groundwater recharge and Water Quality)	Proposed development areas Existing paved areas		<ul style="list-style-type: none"> Low impact development (green design, rain gardens, permeable pavement, etc.) Educational Programs Enhanced Funding 	High (dependent on area and development pressure)	Education and outreach programs	Depends on construction	Coordinate with PADEP, USDA Soil Conservation Districts, PADCNR and Conservancies.	Property owners, Developers, Municipalities
Heritage Appreciation and Management	Schuylkill River Heritage Area Schuylkill Highlands Initiatives		<ul style="list-style-type: none"> Historic preservation Downtown revitalization Zoning overlay districts Public education/Interpretation 	Moderate (with some priority areas)	Ongoing	State and Federal programs	Coordinate with County Planning Commissions, PHMC and Historical Societies.	Various

** Dependent on Available Funding



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DELAWARE VALLEY
dvrpc
 REGIONAL
 PLANNING COMMISSION
 December, 2009

Prepared by:
McCormick
 Engineers & Planners
 Since 1946
Taylor

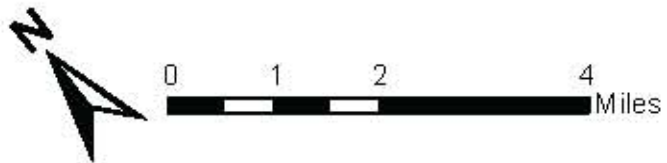
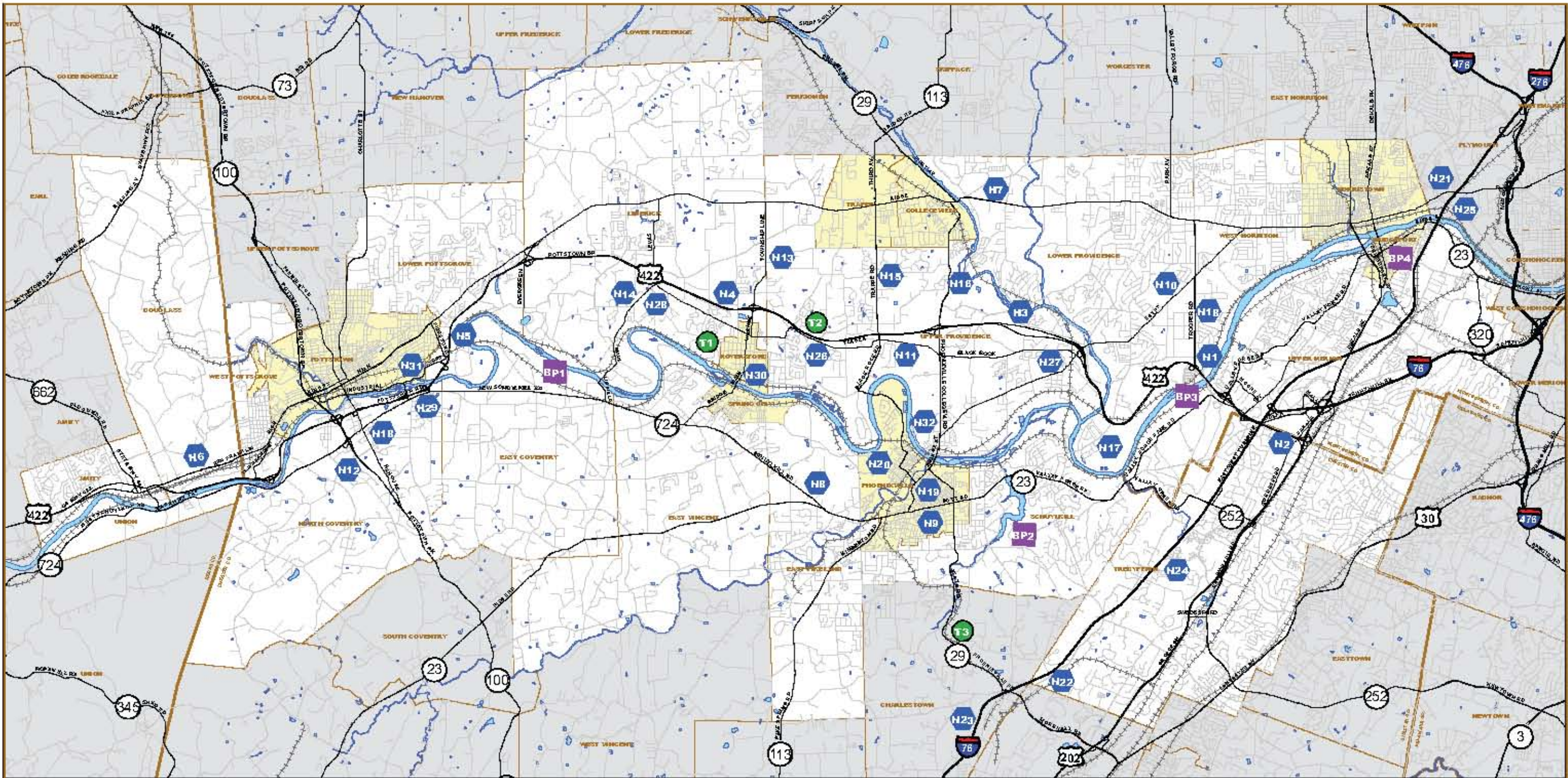
Legend

- Bus Rapid Transit (BRT)
- Mixed-Use Development
- Revitalized Older Downtowns
- Transit-Oriented Development (TOD)
- Complete Streets
- New Transit/Extensions
- River Access
- SEPTA R6 Extension
- Farmland/ Open Space Preservation
- Park-and-Ride Lots
- Roadway & Interchange Capacity/ Congestion Management

US 422 Corridor
Master Plan

RECOMMENDED
PROGRAM ELEMENTS-
APPLICATION OF STRATEGIES

Figure 18



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December, 2009

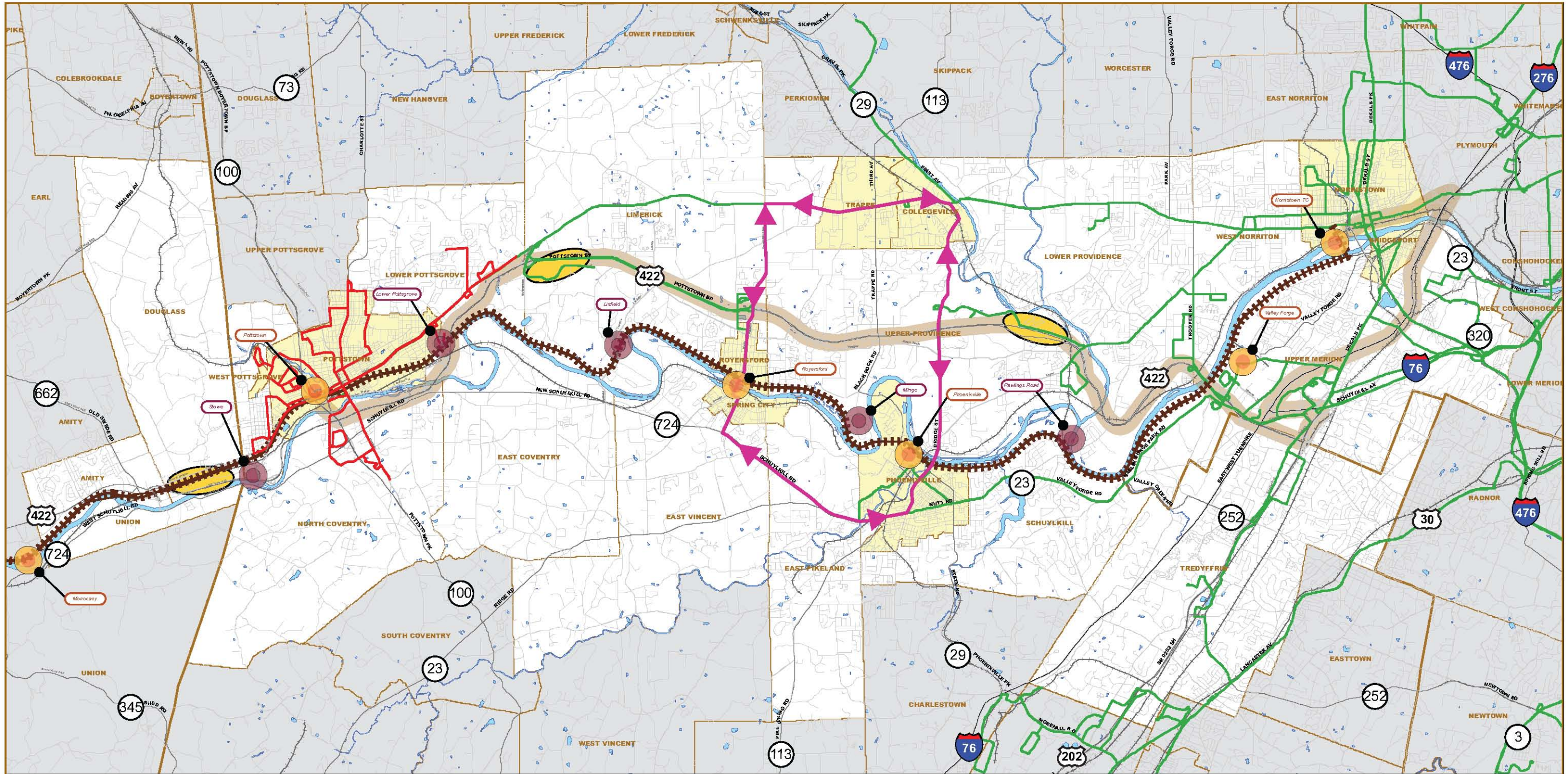
Legend

-  Highway Network Improvements
-  Transit Improvements
-  Trails (Bike / Pedestrian)

 **US 422 Corridor Master Plan**

RECOMMENDED PROGRAM ELEMENTS - TRANSPORTATION IMPROVEMENTS (REFER TO TABLE 1)

Figure 19



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Legend

- Potential Bus Circulator ("Centers to Villages")
- Existing SEPTA Bus Service
- Existing Pottstown Area Rapid Transit
- Potential New Passenger Rail (R6 Extension)
- Proposed Station Locations and Transit-Oriented Development From the R6 Norristown Service Extension Study
- Potential Future Station Locations and Transit-Oriented Development
- Potential BRT Route(s)
- Intermodal Connection Points

**US 422 Corridor
Master Plan**

**POTENTIAL NEW
TRANSIT SERVICE**

Figure 20

CHAPTER 5

EARLY ACTION ITEMS

The early action items are defined as having a high degree of current need, a short-term timeframe, an ongoing commitment of one or several agencies and funding that is programmed or otherwise available through existing sources. Here is a quick look at those items.

■ Transportation

Traffic/Revenue Study – The US 422 Corridor Traffic/Revenue Study (Level 2) is being initiated by DVRPC to determine the potential viability of toll revenues to finance future roadway and transit improvements.

US 422 River Crossing Complex – The US 422 River Crossing Complex is a multi-phase expansion of the US 422 bridge crossing. The project includes interchange improvements at Trooper Road (PA 363) to incorporate a full access interchange, reconstruction of the Schuylkill River Bridge and reconfiguration of the PA 23 interchange. The project is currently in design.

Pennsylvania Turnpike Electronic-toll Slip Ramp Interchange at PA 29 – The project’s design is complete.

Phoenixville Streetscape Project – The project includes pedestrian oriented improvements like street lighting, brick pavers, trees, traffic calming measures, trash containers and street furniture. All improvements will be in context with the historic district improvements being implemented through the Main Street façade program.

Schuylkill River Trail – An extension of the trail upriver from PA 29 to Hanover Street in Pottstown. The project is currently in design.

Valley Forge Park Trail Bridge over the Schuylkill River – A new bicycle and pedestrian bridge to connect the historic park trails with the Schuylkill River Trail.

■ Community/Land Use Planning

Downtown Revitalization – The short-term action is to apply for grants to prepare Small Area and Master Plans.

Vary and Intensify Growth – The short-term action is to apply for grants to prepare Small Area and Master Plans.

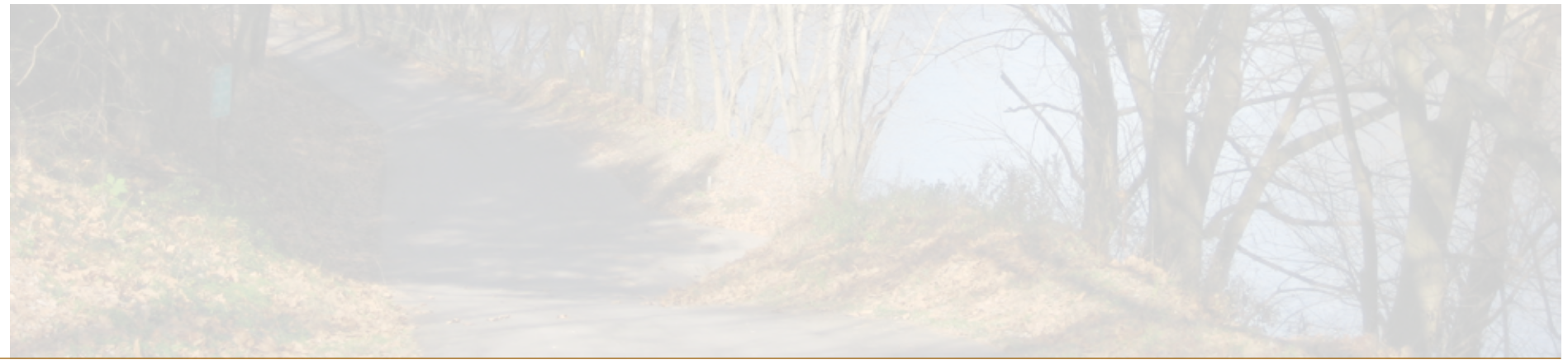
Smart Corridors – The short-term action is to prepare Corridor Plans and adopt Corridor Overlay planning and zoning.

■ Land Preservation/Resource Protection

Open Space Preservation – Ongoing work of land conservancies and the counties.

Protection of Stream and Riparian Corridors – Ongoing work of land conservancies and state agencies.

Groundwater Recharge and Water Quality – Ongoing education and outreach programs of land conservancies and state agencies.



CHAPTER 6 - MOVING FORWARD TO A MORE LIVABLE AND SUSTAINABLE FUTURE

The land use and multi-modal transportation recommendations of the US 422 Corridor Master Plan can focus future land development and mitigate the potential traffic effects of growth so that the need for more investments in roadways and capacity, while not eliminated, will be moderated and more manageable. But who will take us to this more livable, and manageable future?

One of the more interesting aspects of planning for transportation and land use is that changes in transportation infrastructure typically come about through a top-down process, whereas changes in land use usually happen from the bottom up. Historically, this has been the case in Pennsylvania. New roads or transit lines would come into being through funding provided at the federal and state levels, and the process of planning, engineering, and implementing may have only tangentially involved local governments and private interests. In contrast, local cities, townships, and boroughs were the decision-makers when it came to land use planning, zoning, and subdivision and land development approvals, and the impetus for change usually came from actions by individual private property owners and investors.

As funding has become scarce for capital improvements for transportation, the need for the federal and state governments to look at ways to maximize the use of

existing infrastructure and minimize demands for system expansion and new facilities has become more and more important. The tools that government now supports, summarized under the term Smart Transportation, basically try to squeeze the maximum utility out of existing roads and bridges, adopt new performance measures (such as lower levels of service), hold out a high threshold for projects that would require new funding, and try to slow demand for capacity on roadways by encouraging walking, biking, and transit trips.

In advocating Smart Transportation, the federal and state governments are advocating Smart Growth, including concentrating population in centers, keeping residences and jobs closely linked (potentially by transit, walking, and biking), and mixing land uses. By depending on these principles of efficient land use, they are asking local governments, the traditional arbiters of land use planning, to partner with them. Without this partnership, both sides stand to lose. Lack of good transportation, of course, impairs the ability of the state and region to attract investment, jobs, and tax revenue. However, the transportation system that would be needed to make more low-density, single-use, auto-dependent development work satisfactorily is now unaffordable and out of reach. New land development of this type without corresponding expansion of the roadway system only produces discord, including unhappy residents and employees who are

quick to blame local elected officials for congestion and, in the event of rapidly escalating fuel prices, the lack of affordable options for commuting, shopping, and attending school.

All levels of government and their public and private sector partners have arrived at the same point, one where cooperation and mutual support will be needed to ensure a future that works. The US 422 Corridor Master Plan provides a unified vision and framework for the residential, commercial, industrial, recreational, agricultural, and open space needs of the corridor into the future, and a corresponding system for mobility. The time has come for all levels of government to work together to implement the Plan, so that the promise of the Sustainable Alternative in this Plan may be realized.

Local governments in the US 422 Corridor have a variety of tools available to them to help their communities to grow and prosper and allow residents, business operators, employees, and visitors to move about. Already, a foundation for Smart Growth is present in the corridor in the existing land use pattern and, alone or in partnership, many of the corridor municipalities are actively planning for their orderly futures. In support of these efforts, the comprehensive plans of the counties and region and Pennsylvania's Keystone Principles for planning, growth, investment, and resource conservation promote important Smart Growth values.

CHAPTER 6

Moving forward, technical assistance and funding is available to individual municipalities, groups of municipalities, and other types of alliances from the state and the counties for planning, revitalization, and economic development projects that advance the principles and strategies embodied in the Corridor Master Plan. Local officials can position their community to take advantage of intergovernmental assistance and to play a key role in building a livable US 422 Corridor by endorsing the Corridor Master Plan. *A Resolution to endorse the principles and strategies of the US 422 Corridor Master Plan is at right.*

RESOLUTION [DATE]

A RESOLUTION OF THE [NAME OF GOVERNING BODY] OF [NAME OF MUNICIPALITY], [NAME OF COUNTY], PENNSYLVANIA, ENDORING THE PRINCIPLES AND STRATEGIES OF THE US 422 CORRIDOR MASTER PLAN

Whereas, the Delaware Valley Regional Planning Commission (DVRPC), the Counties of Berks, Chester, and Montgomery, and twenty-four (24) contiguous municipalities along the US 422 Corridor have decided to plan together for the future of this corridor; and

Whereas, the US Route 422 Corridor Coalition, an open forum where transportation and planning organizations, corporations, and municipal governments and elected officials meet to discuss transportation issues relevant to the US 422 Corridor, has partnered with DVRPC and the aforementioned counties to undertake the completion of a US 422 Corridor Master Plan to provide a vision and framework for integrated land use and multi-modal transportation planning to manage population growth and the resulting traffic congestion in the corridor; and

Whereas, the US 422 Corridor Master Plan Steering Committee, a multi-jurisdictional working group comprised of staff from the planning commissions of Berks, Chester, and Montgomery Counties, PennDOT Districts 5-0 and 6-0, the Greater Valley Forge Transportation Management Association, SEPTA, the Pennsylvania Turnpike Commission, Pottstown Area Rapid Transit, and DVRPC has guided work on the US 422 Corridor Master Plan; and

Whereas, the US 422 Corridor Master Plan Steering Committee has directed careful surveys and studies of existing conditions and prospects for future growth in the corridor; and

Whereas, the US 422 Corridor Master Plan Steering Committee has held four (4) Public Open House meetings during the course of the Corridor Master Plan preparation to inform elected officials, residents, property owners, and business operators with respect to the issues relevant to the corridor and to receive views and comments from said parties; and

Whereas, a December 2009 US 422 Corridor Master Plan has been prepared that incorporates the consensus of the participants as to the best direction for the future for the corridor, including strategies for roadway and interchange capacity/congestion management, new transit/ extensions, bus rapid transit (BRT), revitalized older downtowns, mixed-use development, transit-oriented development (TOD), river access, complete streets/access management, park-and-ride lots, and farmland/open space preservation;

NOW THEREFORE, it is hereby resolved that the [NAME OF MUNICIPALITY] endorses the principles and strategies of the US 422 Corridor Master Plan and will strive to implement them in cooperation with the other municipalities and the three counties that make up the corridor.

RESOLVED THIS ____ DAY OF [MONTH, YEAR].

[NAME OF GOVERNING BODY]
[NAME OF MUNICIPALITY]

ATTEST:

U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

APPENDIX



U.S. 422 CORRIDOR MASTER PLAN SUMMARY REPORT

STEERING COMMITTEE MEMBERSHIP

- **Matthew McGough**, Transportation Planner
Berks County Planning Commission
- **Natasha Manbeck**, Director of Transportation Services
Chester County Planning Commission
- **Leo Bagley**, Associate Director
Montgomery County Planning Commission
- **Dennis Toomey**, District Traffic Engineer
PennDOT District 5-0
- **Louis Belmonte**, District Traffic Engineer
PennDOT District 6-0
- **Francis Hanney**, Assistant District Traffic Engineer
PennDOT District 6-0
- **Shayne Trimbell**, Project Coordinator
GVF Transportation
- **John Calnan**, Manager of Suburban Schedules
and Service Planning
SEPTA
- **Mark Cassel**, Senior Operations Planner
SEPTA
- **Byron Comati**, Director of Strategic Planning
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- **Alex Flemming**, Senior Long-Range Planner
SEPTA
- **Don Steele**, Senior Civil Engineer
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- **Jason Bobst**, Manager
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- **Olszak Management Consulting, Inc.**
- **Glenda Murphy**

US 422 CORRIDOR MASTER PLAN

Publication Number: 09035

Date Published: December 2010

Geographic Area Covered: Portions of Montgomery, Chester and Berks Counties including 24 municipalities

Key Words: bus rapid transit (BRT), complete streets, congestion, corridor coalition, downtown revitalization, farmland and open space preservation, land use trends, livability, mixed-use development, multi-modal transportation, park and ride, resource protection, roadway/intersection capacity, smart growth, smart transportation, sprawl, sustainability, transit extension, transit-oriented development, volume to capacity ratio

Abstract: The US 422 Corridor Master Plan represents a collaborative vision for sustainable land use and transportation for 24 diverse communities along the US 422 Corridor. The planning area includes over 200 square miles in portions of Montgomery, Chester and Berks Counties. The plan was initiated by the US Route 422 Corridor Coalition, managed by DVRPC and guided by a Steering Committee including the three Counties (Montgomery, Chester and Berks), PennDOT District 5-0, PennDOT District 6-0, GVF Transportation, SEPTA, the Pennsylvania Turnpike Commission, and Pottstown Area Rapid Transit.

The Corridor Master Plan examines 2030 land use and transportation trends, as well as a 2030 Sustainable Alternative incorporating elements of Smart Transportation, Smart Growth and the Keystone Principles. Strategies

for sustainability were developed, reviewed and arrayed in a program for implementation by state and local governments, as well as area developers and stakeholders. Consideration of these land use and transportation strategies was integrated into public surveys and the public involvement activities of the study. Finally, a model resolution for endorsement of the Corridor Plan was provided for consideration by municipal government officials throughout the corridor.

The Final Report was completed following an individualized, direct-outreach effort with municipalities in the corridor during spring / summer 2010. These meetings had a dual purpose: to garner final comments on the draft-final report (released in December 2009), and to encourage / strengthen local government's partnership—to implement the land use and community planning elements of the Master Plan.

Delaware Valley Regional Planning Commission

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