P L A N SPACE O P E N 2006

MONTGOMERY COUNTY, PENNSYLVANIA

Amended January 22, 2007

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MONTGOMERY COUNTY, PENNSYLVANIA

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OPEN SPACE PLAN

2006

Prepared by MCPC under funding through The Montgomery County Green Fields/Green Towns Program

Montgomery County Planning Commission

ADOPTION OF THE MUNICIPAL OPEN SPACE PLAN

THE Township of Montgomery

WHEREAS, On December 18, 2003, the Commissioners of Montgomery County established the Green Fields/ Green Towns Program which provides grant funds for green infrastructure improvements and open space preservation; and

WHEREAS, the Green Fields/ Green Towns Program requires the preparation of municipal open space plans and provides grants which may be used by any municipality in Montgomery County for the preparation of an open space plan; and

WHEREAS, the Township of Montgomery has prepared an open space plan in accordance with guidelines established by the county; and

WHEREAS, the open space plan has been reviewed by the Montgomery County Open Space Board in accordance with guidelines established by the county; and

WHEREAS, copies of the draft open space plan were distributed to all the adjacent municipalities and the North Penn School District on July 26, 2006; and

WHEREAS, the Open Space Plan Committee conducted public meetings on the plan and received comments on the plan; and

WHEREAS, a duly advertised public hearing on the Open Space Plan was held on September 11, 2006.

NOW THEREFORE BE IT RESOLVED by the Board of Supervisors of Montgomery Township that we hereby adopt the Open Space Plan in accordance with Section 302 of the Municipalities Planning Code and authorize its submission to the Montgomery County Open Space Board.

Duly presented and adopted by the Board of Supervisors in public meeting held this September 11, 2006.

Township of Montgomery Pennsylvania Montgomery County By: William Sarosk Supervisors, Chairman Board of Attest John B. Nagel Montgomery Township, Manager

TABLE OF CONTENTS

CHAPTER 1 COMMUNITY PROFILE

COMMUNITY CONTEXT

- HISTORICAL BACKGROUND
- 6 **REGIONAL SETTING**
- 7 EXISTING LAND USE ANALYSIS
- 14 COMMUNITY DEMOGRAPHIC ANALYSIS
- 22 STATUS OF RELEVANT PLANS

CHAPTER 2 GOALS & OBJECTIVES

25 2006 GOALS AND OBJECTIVES
 29 1994 OPEN SPACE PLAN

CHAPTER 3 EXISTING PROTECTED LAND

- 33 PERMANENTLY PROTECTED LAND
- 34 TEMPORARILY PROTECTED LAND
- 40 SUMMARY

CHAPTER 4 INVENTORY OF POTENTIALLY VULNERABLE RESOURCES

- 41 HISTORIC AND CULTURAL RESOURCES
- 46 SCENIC RESOURCES
- 46 **GEOLOGY**
- 47 **TOPOGRAPHY**
- 48 **SOILS**
- 50 SURFACE WATERS, HYDROLOGY, AND WETLANDS
- 53 VEGETATION AND WILDLIFE
- 56 **COMPOSITE CONSERVATION RESOURCES**
- 56 SUMMARY

CHAPTER 5 POTENTIAL OPEN SPACE LINKAGES

- 58 COUNTY TRAILS
- 59 NEIGHBORING MUNICIPAL TRAILS
- 63 COUNTY PARKS
- 63 LINKAGES WITHIN MONTGOMERY TOWNSHIP
- 64 SUMMARY

CHAPTER 6 ANALYSIS OF UNPROTECTED RESOURCES

- 65 **COMPOSITE MAPS**
- 68 COMPOSITE MAP OF EXISTING PROTECTED LANDS, VULNERABLE RESOURCES, AND HABITAT CORRIDORS
- 70 MOST VALUABLE LOCATIONS OF RESOURCES
- 70 SUMMARY

CHAPTER 7 EVALUATION OF GROWTH

- 71 BUILDOUT ANALYSIS
- 75 SUMMARY

CHAPTER 8 EVALUATION OF OPEN SPACE NEEDS

- 77 CALCULATION OF OPEN SPACE NEED
- 78 COMMUNITY AND NEIGHBORHOOD PARKS
- 80 COMMUNITY PARK AND NEIGHBORHOO PARK SERVICE AREAS
- 83 NATURAL OPEN SPACE NEEDS
- 83 STREAM CORRIDOR, WETLAND, AND WATERSHED NEEDS
- 84 ROADWAY LANDSCAPE NEEDS
- 84 NEED FOR TREES THROUGHOUT THE TOWNSHIP
- 85 HISTORIC RESOURCE OPEN SPACE NEEDS
- 86 FARMLAND PRESERVATION NEEDS
- 86 SUMMARY

CHAPTER 9 EVALUATION OF COUNTY AND ABUTTING MUNICIPAL PLANS

- 88 COMPARISON TO MONTGOMERY COUNTY PLANS
- 90 RELATION TO PLANS OF ABUTTING MUNICIPALITIES
- 95 **RELATION TO OTHER PLANS**
- 96 SUMMARY

CHAPTER 10 TRAIL AND PATHWAY DEVELOPMENT

- 97 TRAIL PLAN GOAL AND OBJECTIVES
- 100 **POTENTIAL ROUTES**
- 100 PATHWAY LOCATION CONSIDERATIONS
- 100 PATHWAY IMPLEMENTATION
- 103 SUMMARY

CHAPTER 1.1 HERITAGE RESOURCE CONSERVATION

- 105 VALUE OF HERITAGE RESOURCE CONSERVATION
- 107 HERITAGE RESOURCE CONSERVATION GOAL AND OBJECTIVES
- 107 HISTORIC RESOURCE ACQUISITION
- 108NON-ACQUISITION METHODS
- 111 TAX INCENTIVES FOR REHABILITATION
- 114**RELIGIOUS PROPERTIES**
- 114 SUMMARY

CHAPTER 12 RECOMMENDATIONS: ACQUISITIONS

RECOMMENDATIONS

- 116FEE-SIMPLE AND EASEMENT ACQUISITIONS
- 121 TRAIL CONNECTIONS AND DEVELOPMENT
- 121 NATURAL RESOURCE PROTECTION
- AGRICULTURAL PRESERVATION
- 122 HISTORIC PRESERVATION
- 122 SCENIC RESOURCES
- 123 ACQUISITION METHODS
- 125 SUMMARY

CHAPTER 13 RECOMMENDATIONS: NON-ACQUISITION PROTECTION METHODS

- 127 **ZONING METHODS**
- 128 VIEWSHED PROTECTION
- 129 NATURAL RESOURCE PROTECTION ORDINANCES
- 130 TRANSFER OF DEVELOPMENT RIGHTS
- 131 DONATIONS OF PROPERTIES FOR OPEN SPACE
- 131 REQUIRING OPEN SPACE IN DEVELOPMENTS OR A FEE IN LIEU OF OPEN SPACE
- 132 HISTORIC PRESERVATION ORDINANCES
- 133 AGRICULTURAL SECURITY AREA
- 134 TRAIL AND PATHWAY DEVELOPMENT

CHAPTER 14 IMPLEMENTATION

- 135 BACKGROUND
- 135 **IMPLEMENTATION MATRIX**
- 135 FUNDING SOURCES
- 144 SUMMARY

LIST OF FIGURES

CHAPTER 1

2 3

5

COMMUNITY PROFILE

- Figure 1-1 1848 Map of Montgomery Township by William E. Morris
 - Figure 1-2 1877 Map of Montgomery Township by J. D. Scott
 - Figure 1-3 Montgomery Township
- 6 Figure 1-4 Regional Setting 8
 - Figure 1-5 Existing Land Uses
- 9 Figure 1-6 Existing Land Use Comparison: 1993 & 2005
- 14 Figure 1-7 Population Projection
- Figure 1-8 14 Household Types
- 15 Figure 1-9 Education Level
- 16 Figure 1-10 Age Profile
- 17 Figure 1-11 Income Levels (1999 \$)
- 18 Figure 1-12 Special Needs Groups
- 19 Figure 1-13 Housing Types
- 20 Figure 1-14 Major Employers
- 21 Figure 1-15 Labor Force by Occupation
- 21 Figure 1-16 Employment Forecast
- 22 Figure 1-17 1994 Open Space Plan Acquisition Map
- 23 Figure 1-18 1994 Open Space Plan Trail System Map
- 23 Figure 1-19 2005 County Comprehensive Plan Open Space and Trail Map

CHAPTER 3 EXISTING PROTECTED LAND

- 35 Figure 3-1 Existing Protected Land
- Figure 3-2 Table of Existing Protected Land 36

CHAPTER 4 INVENTORY OF POTENTIALLY VULNERABLE RESOURCES

- 42 Figure 4-1 Historic Resources
 - Figure 4-2 Historic Resources
- 46 Figure 4-3 Scenic Roads and Views
- 47 Figure 4-4 Geology

43

- Figure 4-5 Alluvial Soils and Steep Slopes
- Figure 4-6 Agricultural Soils
- Figure 4-7 Hydric Soils and Floodplains
- 49 Figure 4-8 Terrestrial Resources
- 50 Figure 4-9 Watersheds

47

48

49

67

- 50 Figure 4-10 Stream Types
- 51 Figure 4-11 Stream Water Quality Attainment
- 52 Figure 4-12 Wetlands
- 52 Figure 4-13 Aquatic Resources
- 53 Figure 4-14 Woodlands
- 54 Figure 4-15 PNDI Plants of Special Concern
- 55 Figure 4-16 Vertebrate Resources
- 56 Figure 4-17 Composite Conservation Resources

CHAPTER 5 POTENTIAL OPEN SPACE LINKAGES

- 58 Figure 5-1 County Trail Plan
- 59 Figure 5-2 Horsham Township Trail Plan
- 60 Figure 5-3 Lower Gwynedd Township Trail Plan
- 61 Figure 5-4 Upper Gwynedd Township and North Wales Borough Trail Plan
- 61 Figure 5-5 Lansdale Borough Trail Plan
- 62 Figure 5-6 Composite of Neighboring Trail Plans

CHAPTER 6 ANALYSIS OF UNPROTECTED RESOURCES

- 66 Figure 6-1 Composite Cultural and Natural Resources
 - Figure 6-2 Most Vulnerable Conservation Resources
- 68 Figure 6-3 Natural Corridors
- 69 Figure 6-4 Most Vulnerable Composite Township Resources Map

CHAPTER 7 EVALUATION OF GROWTH AREAS

- 72 Figure 7-1 Future Land Use Plan
- 73 Figure 7-2 Residential Buildout Estimate
- 74 Figure 7-3 Future Housing Buildout Map

CHAPTER 8 EVALUATION OF OPEN SPACE NEEDS

- 78 Figure 8-1 1983 NRPA Method of Determining Township-wide Open Space Needs
- 81 Figure 8-2 Community Park Service Areas
- 82 Figure 8-3 Neighborhood Park Service Areas
- 83 Figure 8-4 Natural Park Opportunities

CHAPTER 9 EVALUATION OF COUNTY AND ABUTTING MUNICIPAL PLANS

90 91 92 92	Figure 9-1 Figure 9-2 Figure 9-3 Figure 9-4	The County's Recommended Bicycle Routes Lansdale's Open Space Opportunities Map, 2005 Wissahickon Creek Infiltration Basins and Riparian Corridor Excerpt from Hatfield Township Open Space Plan Recommenda- tions Map, 2005
93	Figure 9-5	Excerpt from New Britain Township Open Space Plan Preservation Map, 2000
93	Figure 9-6	Excerpt from Warrington Township Open Space Plan Map, 1998, with Potential Connections to Montgomery Twp.
93	Figure 9-7	Excerpt from Horsham Township Open Space Plan Recommenda- tions and Trails Map, 2005
94	Figure 9-8	Excerpt from Lower Gwynedd Township OS Recommendations Plan, 2005
95	Figure 9-9	Excerpt from Upper Gwynedd Township Open Space Recommen- dations and Trail Plan, 2005

CHAPTER 10 MUNICIPAL TRAIL AND PATHWAY DEVELOPMENT

- 98 Figure 10-1 Excerpt from County's Recommended Bicycle Routes
- 99 Figure 10-2 Montgomery Township Trail Plan
- 101 Figure 10-3 Montgomery Township Trail Implementation Plan

CHAPTER 12 RECOMMENDATIONS: ACQUISITIONS

- 116 Figure 12-1 Recommended Acquisitions Map
 - Figure 12-2 Recommended Acquisitions List
- 117 Figure 12-3 Recommended Acquisition Types and Purposes
- 117 Figure 12-4 Gill Tract
- 118 Figure 12-5 Aschenbrand Creekway
- 118 Figure 12-6 Sewer Authority, Steever Mill Creekway
- 118 Figure 12-7 Pillegi, Murwin, and Luciano Tracts
- 118 Figure 12-8 Kenas Road Properties
- 119 Figure 12-9 Zehr Tract
- 119 Figure 12-10 Stump Road Properties
- 119 Figure 12-11 Marra and Connelly Tracts
- 119 Figure 12-12 Goldenberg, Glasgow Quarry Properties
- 120 Figure 12-13 Hurd Farm
- 120 Figure 12-14 AEL / Kema Fields
- 120 Figure 12-15 Lansdale Catholic Sports Fields
- 120 Figure 12-16 Arbor Green Triangle

CHAPTER 14 IMPLEMENTATION

117

137 Figure 14-1 Implementation Matrix

CHAPTER 1 community profile

Any good planning effort is based on an understanding of the existing conditions, including a historic view of how those existing conditions came to be. This first chapter describes Montgomery Township community from the perspectives of history, land use, and demographics, including housing and employment characteristics.

COMMUNITY CONTEXT HISTORICAL BACKGROUND

Knights, Indians and farmers figure into Montgomery's history.

At one time the Unami tribe of the Lenape nation was active throughout Montgomery County, but by 1900 fewer than 1,000 of them remained. Their legacy is very slight today, but parts of the most prominent modern feature of the township, Bethlehem Pike, may have originated as an Indian trail. (James A. Williams, <u>An Erudite Little Township: A</u>

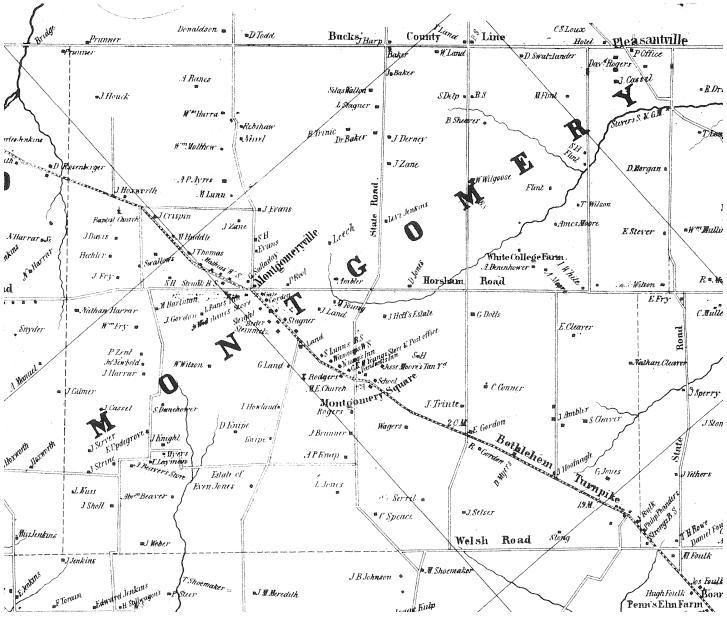
<u>History of Montgomery Township to 1900</u>, 1979, p. 14.)

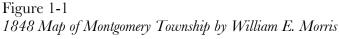
The first European settlers were mostly Welsh, not realizing, perhaps that the sparsely wooded land meant not only easier land clearing but also poorer soils. The first resident was Welsh, Alexander Edwards, having purchased his land in 1699 from a member of the Society of Friends, a protestant Christian denomination. He was followed by "several dozen families of Welsh Friends and Baptists." Shortly thereafter, in 1714, the township was founded, probably taking the name of a Norman knight that was associated with Wales, Roger de Montgomery, as their own. By 1734 there were 29 freeholders in the township and in 1774 only 58 property owners lived in the 60-year-old township. At that time the largest settlement, Montgomery Square, consisted of two taverns, a small school, and several farms. The villages of Eureka and Montgomeryville did not exist before 1800. (James A. Williams, Chapter 31, in <u>History of Montgomery</u> <u>County: The Second Hundred Years</u>, Volume 1, pp. 412-419.)

"The villages of Montgomery Township became the center of most of the community's social and economic life during the nineteenth century. Though barely distinguishable today, they enjoyed a period of growth and vitality during the era of turnpike [toll road] travel." (Williams, p.412.) More of this history of the villages will be discussed in the chapter on Historic Resources.

As many villages, those of Montgomery Township owe their development to their location at transportation crossroads. To this day, the township's commerce is dependant on vehicular traffic. The old roads have been paved, widened and improved; horses and wagons replaced by cars and trucks. More on these historic roads later.

Schools— Aside from roads, one of the first public improvements was the establishment of public schools. Beginning already in 1728, the township



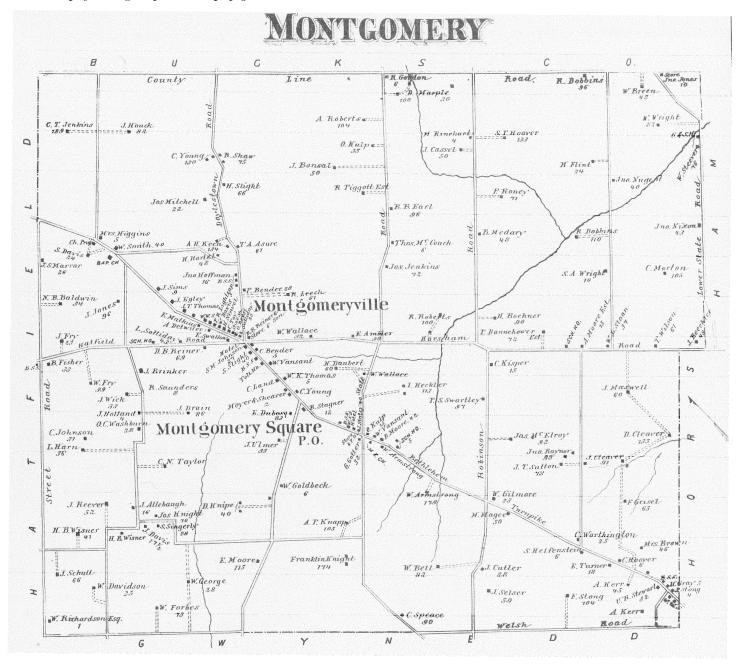


had schools open to all children. (Williams, p. 414.) Over the centuries, schools were built, used and abandoned to the point where there are now two public elementary schools in the township and a third outside its southwestern border. Part of the North Penn School District, Montgomery now sends its older children to the Middle School in Upper Gwynedd and the High School located in Towamencin Township. Montgomery Township is also home to a private K-8 school, the Catholic Education Center on the Mary, Mother of the Redeemer Church property.

Figure 1-2 1877 Map of Montgomery Township by J. D. Scott

The township's most notable native son was General Winfield Scott Hancock, "the hero of Gettysburg and the Democratic presidential candidate in 1880."

Population decline of late 1800's — Between 1860 and 1900 the population of the township decreased from 998 to 724 residents, making it the least populated municipality in the county at the time, however in 1884 it had the ninth highest [out of about 60] per capita income. [Perhaps those of less than average means moved to better farmland or to towns.] Farming had continued to be the



foundation of local life and by 1900 only one of the three taverns remained in business and otherwise commerce was largely limited to a few craftsmen and three general stores. The decline eventually leveled off and relatively slow growth started in the 1920's when a few industries and businesses began. The community was generally unprepared for the growth that followed. (Williams, pp. 416, 417.)

Along with increased industrialization and higher incomes came increased leisure time. Leisure activities of the 1920's and 30's included occasional picnics in Forest Park in Chalfont, church musicals, or vaudeville shows and motion pictures in Lansdale's Music Hall.

By the time of the end of World War II agricultural uses covered only half of the township. The rest of the township was housing, industry or other commercial uses.

The construction of highway bypasses around Ambler and Sellersville by the state transportation authority (now PennDOT) "further concentrated development along the open stretch of Bethlehem Pike between Colmar [in Hatfield Township] and Spring House [in Lower Gwynedd Township]." "As early as 1954, 13,700 vehicles passed through Montgomeryville each day, which prompted the planning commission to predict that 'the present traffic mechanism at Montgomeryville will prove inadequate to the extent that major changes may become necessary within the next decade."" (Williams, p. 417) The situation today is much worse and the improvements have still not happened 50 years later.

By 1950 the population of the township had increased to 1,566 and in 1958 "foreseeing the urban sprawl and traffic congestion that would follow the [bypass] improvements, [a] township planning commission study recommended that 'further expansion of scattered commercial or residential development along this portion of the Bethlehem Pike should be discouraged."" (Williams, p. 417.) As is apparent, this recommendation went relatively unheeded.

Residential boom - The faster highway system did bring new residential development to Montgomery Township. More homes were built in ten years, the 1950's, than in the past 250 years. (Williams, p. 417) Much of the new housing was located in the western third of the township since that area was closer to existing sewer services in Lansdale and a sewage treatment plant in Colmar. As a result, by 1970 the population had exploded 150% to almost 4,000 residents. However, there was still plenty of room for new development since the middle third of the township, which was tied up in court for decades, and the eastern third were still mostly farmland. Not only did housing develop during this time, but also commercial and industrial construction grew considerably. "While the rural character of the township continued to survive, by 1980 the expansion of industrial areas and shopping centers had caused a decrease in the amount of land devoted to farming."

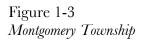
In 1977 the region's biggest indoor shopping center, Montgomery Mall, was opened and quickly became a shopping destination for many miles around.

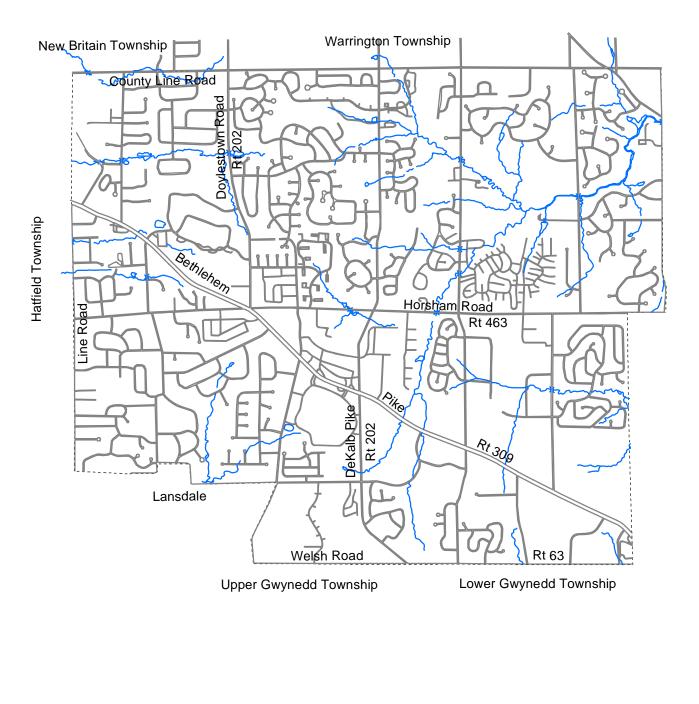
Open Space — In the 1960's the township, through the state's Project 70 initiative, received grants to purchase the lands that now comprise the 37 acres of the Natural Park in the western corner of the township along the Wissahickon Creek. Later, 12 acres were purchased for Fellowship Park.

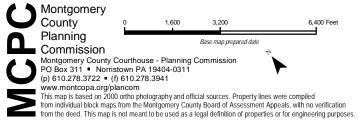
The township has been able to expand the open space system over the years through a combination of purchases and by accepting open space portions of private developments. Windlestrae Park, in the eastern section of the township, is the largest of the parks with over 150 acres. Another major park is Spring Valley Park with 63 acres in the central section of the township.

Through the Montgomery County Open Space Program, in 1994 the township adopted its first Open Space Plan, which is summarized later and a report of progress made is also included later in this Plan. As a result of the program, the township was able to acquire 7 new open space properties.

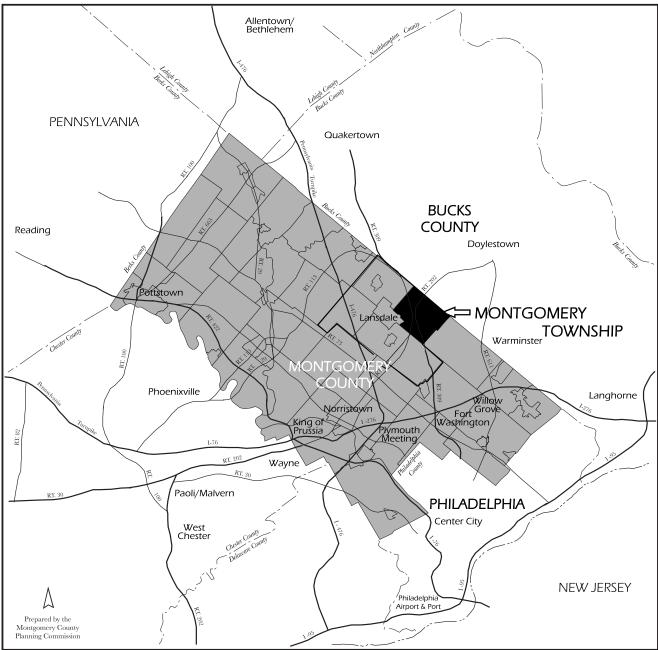
Now the County has established the 2003 Montgomery County Open Space Program to again support the creation and development of county, municipal and private open space throughout the county. Each municipality has been allocated at least \$500,000, in the case of Montgomery Township, \$1.5 million, to be used for open space plans, acquisitions and trail improvements. This plan will identify the township's goals and priorities for open space and function as the official policy of its government.











REGIONAL SETTING

Montgomery Township is a 10.82-square-mile, rectangular-shaped community located in the North Penn area of eastern Montgomery County, see Figure 1 - 4, which includes the Borough of Lansdale and the townships of Lower Gwynedd, Upper Gwynedd, Towamencin, and Hatfield, and the small boroughs of Hatfield and North Wales. Montgomery Township is also bounded by New Britain and Warrington Townships in neighboring Bucks County. This region has been one of the fastest growing portions of Montgomery County over the past several decades. This rapid growth has occurred for a number of reasons. First, the North Penn Area is on the fringe of more developed portions of Montgomery County near the Turnpike and Philadelphia. As the areas closer to the city have developed, businesses and residents have looked outward for new places to locate. Second, the North Penn Area has good road access, including State Routes 309, 202, 463 and 63. Third, the region has traditionally had a large number of major employers, such as Ford Electronics, Prudential Insurance, American Olean and Tile Company, and Merck and Company pharmaceutical company, and these employers have helped generate growth. Many of these businesses have either expanded or been replaced by other large employers as well as many more smaller ones. Finally, the area has provided the infrastructure, such as sewers, that is needed for growth.

During the 1970's, the two western North Penn communities, Towamencin and Hatfield Townships, lead the county in rate of population growth. During the 1980's, Montgomery Township, which is on the eastern side of the region, also lead the county in rate of population growth. Even though they no longer lead the county in growth, the other North Penn municipalities also received significant residential growth during the 1980's.

Montgomery Township's regional position had much to do with its growth. The township, as shown in the following map, is located at the intersections of State Routes 309, 202, and 463. Employees traveling to the Willow Grove and Prudential Office parks can quickly reach these destinations by driving southeast on Route 463. Employees traveling to the Fort Washington industrial park can use Route 309, which turns into an expressway shortly after leaving Montgomery's borders. And employees working in the Lansdale area have a short commute on local roads. Montgomery's location near these employment centers, as well as the township's large amount of vacant land and sewer capacity, helped generate rapid growth, which is expected to continue in the future, but not quite as rapidly.

Montgomery and the North Penn Area do not have any significant regional parks located within their boundaries, except for a small piece of Evansburg State Park in the panhandle of Towamencin Township. The park, however, is not developed for extensive park usage. The closest regional park to Montgomery Township is the Peace Valley park located in New Britain Township and operated by Bucks County.

Since Montgomery Township is located at the top of three watersheds, the major natural features in the township consist primarily of upper reaches of those watersheds: the headwater branches of the Wissahickon Creek, the tributaries of the West Branch of the Neshaminy, most of the headwaters and tributaries of the upper reach of the Little Neshaminy, and one of the branches of the Park Creek. As a result of being at the tops of these watersheds, there are almost no lands in the township that receive water from surrounding townships or boroughs; they, however, all receive water from Montgomery. Some of these creekways have already been preserved as part of the township's park system.

EXISTING LAND USE ANALYSIS

The Existing Land Use Analysis is the second part of the Community Profile Chapter for the 2005 Open Space Preservation Plan. This analysis focuses on the current land uses within the municipality, enabling a more in-depth focus of municipal land use patterns. In addition to the Existing Land Use Map (Figure 1 - 5), Figure 1 - 6 details the acreage of each category and the percent change from 1993 to 2005. These numbers are useful in understanding changes in land use patterns and help to identify potential open space and/or recreational needs.

Most of Montgomery Township is now developed or planned to be developed; however, as recently as 1982, the township was predominantly rural, with quite a few farms and rural vistas. Since 1986, Montgomery has experienced a tremendous amount of growth, especially in residential uses, although there has also been an intensification of the commercial uses. Montgomery can no longer consider itself a rural or even a suburbanizing community. It is now a suburban community that will still experience growth until it is fully developed within the next few years. This section examines existing land uses in the township and how they have changed over the years.

RESIDENTIAL

Most of the land area that has been consumed since 1993 was for residential purposes, and most of this residential land was developed as single-family detached homes. Approximately 42.6% of Montgomery's land area in 2005 consists of single-family detached homes, which includes mobile homes. Since 1993, most of the new single-family detached construction has been built in the portion of the township bounded by Lower State Road, Stump Road, Hartman Road, and County Line Road. As a result, Montgomery Township has changed dramatically and added a large number of housing units. Although not all of the new developments were

Montgomery Township 2006 Open Space Plan Chapter 1: Community Profile

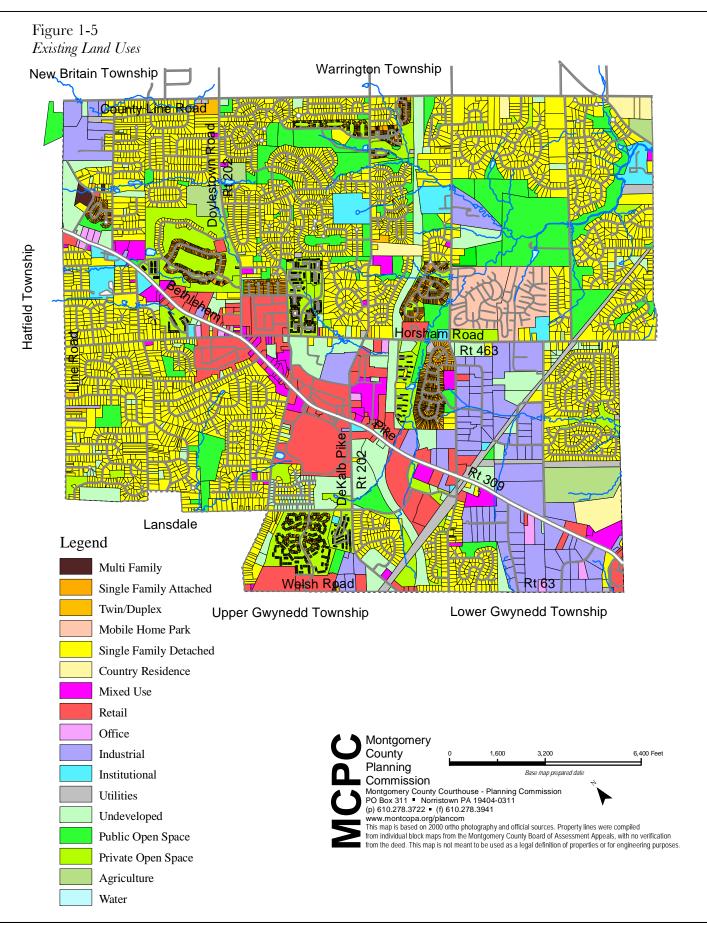
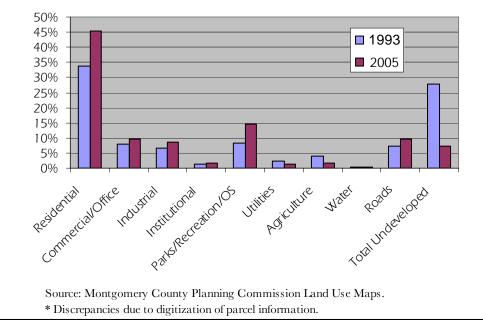


Figure 1-6

Existing Land Use Comparison: 1993 and 2005

Land Use	19	993	2005		% Change
Land Use	Acres	% Total	Acres	% Total	1993-2005
Residential	2,336	33.7%	3,140	45.3%	34.4%
Commercial/Office	561	8.1%	667	9.6%	19.0%
Industrial	450	6.5%	603	8.7%	34.0%
Institutional	99	1.4%	125	1.8%	26.1%
Parks/Recreation/OS	580	8.4%	1,002	14.5%	72.8%
Utilities	169	2.4%	97	1.4%	-42.4%
Agriculture	280	4.0%	112	1.6%	-60.1%
Water	15	0.2%	15	0.2%	0.0%
Roads	504	7.3%	666	9.6%	32.1%
Total Developed	4,994	72.1%	6,428	92.8%	28.7%
Total Undeveloped	1,931	27.9 %	497	7.2%	-74.3%
Total Acreage*	6,925	100%	6,925	100%	0.0%



huge, a few had less than 10 units, there were some with more than 100 units and many had more than 50 units.

In addition to these single-family detached units, the township added a large number of townhouse developments. In 1993, approximately 0.8% of the township's land area consisted of twins and 2.8% consisted of townhouses and now they comprise 0.3% and 3.4% respectively.

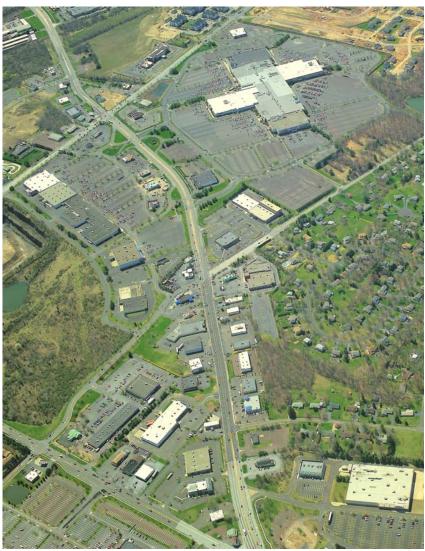
The township also added some apartment units since 1993 when only 0.4% of the township land area was used for apartment units. This relatively small proportion of the township is due to two factors. First, because they are built at a much higher density, as much as ten units per acre, apartment developments do not consume as much land as single-family detached units. This factor also applies to townhouse and twin developments. Second, during the late 1980s, when much of the township's high density residential land was developed, developers were not interested in building apartment units, which includes apartment condominiums, and almost always chose to build townhouse units, even though they often had the option to build apartments at a higher density.

COMMERCIAL/OFFICE

RETAIL COMMERCIAL USES

Although the amount of retail commercial land in the township only increased a little bit since 1993, from 6.5% to 8.1%, the intensity of the township's retail use increased substantially. The recently constructed Costco and surrounding buildings are a prime example of this type of intensifying redevelopment. This is a high percentage of commercial retail land for a township. However, Montgomery Township serves as the regional shopping area for a good portion of the central parts of Montgomery and Bucks County. The township has 8 large shopping centers, which are:

 Montgomery Mall: a regional mall with four department stores, Macy's, Strawbridge's, Sears, and J. C. Penny's, as well as a large number of specialty retail stores.



Montgomery Mall (top) and other retail uses along Bethlehem Pike (Rt. 309)

- 2. Airport Square: a community level shopping center with a Marshall's, Best Buy, and a number of other large and small retailers.
- 3. Water Tower Square: a community level power center with three major anchors: a Home Depot, a Ross, and a Sports Authority.
- 4. Five Points Plaza: A community level shopping center with a Burlington Coat Factory discount store, a Lowe's home center, and a number of small retailers.
- 5. Montgomery Commons: a neighborhood level shopping center with a Redner's grocery store and a number of small retailers.
- 6. General Hancock Center: a combination of separate buildings spread over a large area with a Costco, LA Fitness Center, some restaurants, mini-golf and go-cart center, and a small strip of shops.
- 7. Witchwood Shopping Center: a shopping center with a Target and several other shops.
- 8. Montgomery Square: a shopping center with a Giant grocery store, Barnes and Noble book-store, Michael's crafts supplies store, and a few other shops.
- Montgomery Crossing: a neighborhood shopping center with a Whole Foods grocery store, a Staples office supply store, and a number of small retailers.

In addition to these large shopping centers, Montgomery has a number of smaller strip centers, including 202 Marketplace and the Village Shoppes.

OFFICE USES

Except for the former Prudential office complex at the corner of Horsham and Hartman Roads, Montgomery only has a few scattered office buildings, with most of these located on Route 309 north of the Five Points intersection. In 1993, approximately 1.5% of the township consisted of office uses. Now these uses account for 0.4% of the township's land. The current market has a glut of empty office buildings in the area, so a dramatic increase is not foreseen.

Photo: Pictometry



Industrial park in Montgomery Township

Photo: Pictometry

INDUSTRIAL

The township's amount of industrial development has not increased very much since 1993, although a few small buildings have been added since then. Most of the existing industrial uses are located in the Montgomeryville Industrial Center, the Bethlehem Pike Industrial Park, or the Welsh Valley Industrial Park. These three industrial parks are located south of the mall on route 309. In addition to these parks, there a number of industrial sites scattered around the township. The most prominent of these is the AEL site located near Hatfield Township. In 1993, approximately 5.3% of the township consisted of industrial uses. Now, in 2005, industrial uses comprise 9.6%.

The township also has two quarries. One, which recently closed, is located at the corner of Upper State Road and Horsham Road while the second is located on Route 309 at Hartman Road. Approximately 1.2% of the township consists of quarry land.



Industrial facility at the Gill Quarry on Bethlehem Pike Photo: MCPC



Windlestrae Park includes the sports fields (bottom, right and top) and most of the woods

Photo: Pictometry

INSTITUTIONAL

Since 1993, the amount of institutional land in the township has increased. Two new large institutional uses have been added, the Indian Hindu Temple on County Line Road and the new Mary Mother Redeemer Elementary School . Other significant institutional uses include the Mary Mother Redeemer Church, Bridle Path Elementary School, Montgomery Elementary School, the Township municipal building, the Montgomery Baptist Church, the Montgomery Square Methodist Church, and the Leader Nursing and Rehabilitation Center. In 1993, approximately 1.4% of the township consisted of institutional land. That has now, in 2005, changed to 2.0%.

PARKS/RECREATION

Since 1993, Montgomery has added parkland, primarily through zoning provisions that require a certain percentage of a development to consist of open space when homes are clustered, but also by taking advantage of the County's Open Space Program in the 1990's. The zoning provisions typically require 10 or 20 percent of a site to be open space. Usually, developers have designated drainage swales, detention basins, and wetlands areas as open space, which means these areas are not suitable for active recreation.

The township has added significant parkland, the Horvath Tract, and has continued to develop its major park, Windlestrae Park, by adding two adjacent properties to it, a portion of the Zehr Tract and almost the entire Wiseman property. In 1993, approximately 580 acres of the township consisted of park and recreation land, comprising 8.4% of Montgomery's area. That has now, in 2005, changed to 9.0%.

UTILITIES

A significant portion of Montgomery Township, approximately 2.4%, is used for detention basins, overhead power lines, sewer plants, transmission stations, communication towers, and other utility purposes.

Most of the utility land in the township, however, falls into just two categories. First, two Philadelphia Electric Company power lines, which cut a 100- to



PECO powerline along the Horvath property

Photo: MCPC

300-foot wide swath, meet in the township. Second, all of the new development in Montgomery has had to provide stormwater detention basins. These are spread out around the township.

Although not immediately thought of as a significant land use in a community, roads often comprise more of a community's land area than expected. In Montgomery Township, public roads used 7.3% of the township's total land area.

AGRICULTURE AND OTHER LAND USES

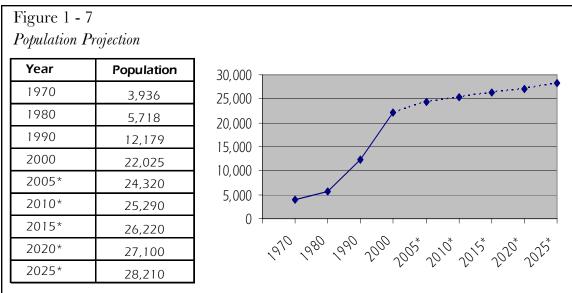
VACANT, FARM, AND UNDEVELOPED LAND

Surprisingly, in 1993, a third of Montgomery Township was still undeveloped, vacant, or in farmland. This figure, however, is misleading. Much of the township's vacant land was under construction or approved for development. Once that land was subtracted out, then only 20% of the township was to remain undeveloped. Now, in 2005, after those projects were completed and new ones built, there remains only 9.7% of the land as vacant, farmland or undeveloped. In addition, there are a few new proposals that are to built, using about 1/3 of that land, leaving about 6% to 7% in a few years.

The township's undeveloped and uncommitted land predominantly falls into three categories: industrial land, rural land in the Eureka area, and developable land on oversized lots. The largest cluster of undeveloped land surrounds the Montgomery Mall and most of this is zoned industrial. Landowners in this area may be holding on to the land, hoping to get it rezoned commercial sometime in the future. Some of this land will be severely impacted by the result of PennDOT's plans for the Route 202 corridor.

SUMMARY OF EXITING LAND USE ANALYSIS

Montgomery Township is almost completely built out and while there will be some changes in the next few years, there cannot be major changes in the overall mix of land uses. But perhaps the most crucial fact to this Open Space Plan is that very few large vacant or otherwise undeveloped pieces of land exist that could be easily identified and acquired for open space. Acquisitions may have to be of a very different nature than they have been in the past. Open space may have to be viewed in a new way as well. For example, trails and natural greenway linkages may become more important to help residents get more use out of the open space already in the township. They may also be more feasible since they can sometimes use utility corridors, follow along roads in the right-or-way, or use easements instead of land purchases. The township may have to pay closer attention to smaller developments for smaller, yet crucial opportunities for open space. The township may also have to rethink the types of recreation that can be provided, perhaps expanding the types that use smaller land areas. Natural preservation efforts will have similar issues smaller areas and different uses - as less and less land is available.



Sources: U.S. Census Bureau; Census of Population and Housing, 2000; DVRPC projections. * Projected population

COMMUNITY DEMOGRAPHIC ANALYSIS

The Community Demographic Analysis, the third part of the Community Profile, consists of information relating to population, housing, and economics for Montgomery Township. With few exceptions, the source of the information is the decennial U.S. Census and other reports of the Census Bureau.

Demographic characteristics provide insight when planning for open space preservation and recreational development. They can assist in determining not only how much land should be preserved, but also where. Additionally, this information can further assist the township in determining what type of recreational facilities, if any, should be placed on the preserved land.

POPULATION

The rate of municipal population change (relative population increase or decrease) is an important measure of the magnitude of population change that has occurred over time.

Figure 1 - 8 shows the population figures for the past four censuses. Between 1990-2000, the Township experienced a population increase of almost 10,000 people, or an average of about 1,000 additional residents each year. This is a growth rate of 80.8%, making it the third-most rapidly growing municipality in the county in the 1990's. However, this is, remarkably, less rapid than the Township's growth rate in the 1980's, which was 113% and made it the fastest growing municipality in the county at that time. Land is becoming scarcer for

Heusehold Turos	1990	% Total	2000	% Total	% Change 1990 to 2000	
Household Types	Number	% I OLAI	Number	% I OLAI		
Married Couples with Children	1495	32.6%	2896	36.5%	93.7%	
Married Couples with No Children	1704	37.2%	2534	32.0%	48.7%	
Single Parent	159	3.5%	264	3.3%	66.0%	
Other Family	207	4.5%	361	4.6%	74.4%	
1 Person Non-Family Households	831	18.1%	1565	19.7%	88.3%	
2+ Person Non-Family Household	183	4.0%	306	3.9%	67.2%	
Total No. of Households	4,579	100%	7926	100%	73.1%	
Average People per Household	2.64		2.74		3.8%	

Sources: U.S. Census Bureau; Census of Population and Housing, 1990, 2000.

Figure 1 - 8

new housing and this booming growth is expected to slow dramatically in the next few years.

POPULATION PROJECTIONS

Figure 1 - 7, Population Projection, shows population trends in the Township. In general, projections are based on several factors, including past levels of development, recently proposed development, proximity to employment centers, available land, and public facilities (particularly sewers).

During the next 20 years, the population is projected to continue increasing, but at relatively lower rates. In fact, if projections hold true, the population would not exceed 30,000 people in 20 years, the equivalent to adding an average of about 400 people per year.

HOUSEHOLD TYPES

A household profile is defined by the Census Bureau as a person or persons occupying a single housing unit. A household can be broken down into two categories. A family household is two or more related persons living in a single housing unit, and a non-family household is occupied by a single person or a group of unrelated persons. Nationally, as well as locally, households are changing. There has been an overall increase in non-family and single person households since the 1970's. Fragmentation of the family unit through divorce, death of a spouse, or children leaving home to form their own households has contributed to an increase in the number of households and a decrease in the size of households. The average household size is the number of persons in households divided by the number of occupied housing units. This, too, has seen a national decline as households continue to diversify.

The household profile, composed of Total Population in Households, Number of Households, Average Household Size, Number of Family Households, Percentage of Family Households in Table 1 - 8, Household Types, show that Montgomery Township has, contrary to the national trends, experienced an increase in household size. The most dramatic change, and probably the major reason for the increase in household size, is the 94% increase in married couples with children. Close behind, though, are one-person and "other" families at 88% and 74% respectively.

These changes, of course, affect the amount and types of open space the Township needs and will need in the future.

EDUCATION

As represented in Figure 1 - 9, Education Level, in 2000, the population of Montgomery Township, of those 25 years old or more, increased its level of educational attainment dramatically. College and post-graduate degrees increased 126% in just ten years and those with some college or a two-year degree increased by about 90%. It was only those with less than a 9th grade education that even declined, and that by 24%.

Since most persons who go to college or postgraduate schools often have traveled extensively and thereby exposed themselves to a variety of ex-

Figur	e 1	- 9	

Education Level

Educational Level	19	990	20	% Change	
	Number	% Total	Number	% Total	1990-2000
Less than 9th grade	317	3.7%	241	1.6%	-24.0%
9th through 12th grade, no diploma	715	8.5%	825	5.6%	15.4%
High school graduate (includes equivalency)	2,377	28.1%	3,115	21.0%	31.0%
Some college, no degree	1,427	16.9%	2,680	18.0%	87.8%
Associate degree	576	6.8%	1,102	7.4%	91.3%
Bachelor's degree	1,968	23.3%	4,466	30.1%	126.9%
Gradute or Professional degree	1,074	12.7%	2,428	16.3%	126.1%
Total Pop. 25 years and older	8,454	100%	14,857	100%	75.7%

Sources: U.S. Census Bureau; Census of Population and Housing, 1990, 2000.

periences and places, this huge increase in educational attainment may also affect the types of open space the Township needs and will need in the future.

AGE

Figure 1-10

If Montgomery had grown equally across all age groups, all age groups would show a growth of about 81%. However, the age profile in Figure 1 -10 shows a different pattern of growth.

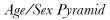
The 0-4 age range is dead on, but the next age group, 5-17, school-aged children exploded at

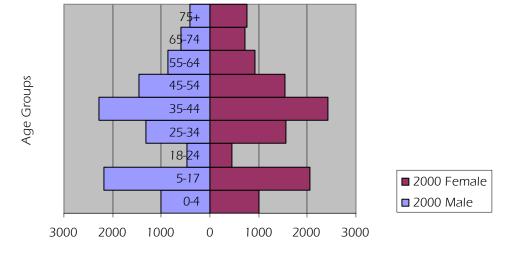
134%. This implies that Montgomery Township became a place that attracted the kinds of families with school-aged children, in addition to probably retaining most of the children who were in the township in 1990's.

But that was not the age group that grew the most. The 45-54 age group grew at 137%. They are perhaps the parents of the 5-17 year olds, but could also be one-child couples or empty nesters that moved into the golf course community that was built in the '90's. The third highest growth, still at a staggering 126%, is the 75+ age group. This group also exploded in the '80's with over 200% growth

Age Profile					
4.50	1990	% Total	2000	% Total	%Change
Age	Number	- % TOLAT	Number	% I Otal	1990 - 2000
0-4	1,084	8.9%	1,955	8.9%	80.4%
5-17	1,834	15.1%	4,299	19.5%	134.4%
18-24	768	6.3%	884	4.0%	15.1%
25-34	2,492	20.5%	2,991	13.6%	20.0%
35-44	2,128	17.5%	4,600	20.9%	116.2%
45-54	1,260	10.3%	2,989	13.6%	137.2%
55-64	1,081	8.9%	1,810	8.2%	67.4%
65-74	1,039	8.5%	1,384	6.3%	33.2%
75+	493	4.0%	1,113	5.1%	125.8%
Total	12,179	100%	22,025	100%	80.8%
Median Age	34.7		36.8		

Sources: U.S. Census Bureau; Census of Population and Housing, 1990, 2000.





gure 1 - 11 .come Levels (1999 \$)			
Income	1989	1999	% Change
Per Capita	\$21,465	\$32,349	50.7%
Median Household	\$52,193	\$78,953	51.3%

and, combined with that, represents a significant trend for the township that has very significant open space ramifications.

Yet another age group greatly surpassed the 81% population increase, the 35-45 age group – most are likely to be parents, young singles and couples.

The 18-24 and the 25-34 age groups gained the least population, probably reflective of traveling away from home for that educational achievement mentioned earlier.

Certainly all these changes have effects on the amount and types of open space the Township needs and will need in the future.

INCOME

The per capita and family incomes and the trend in changes in these incomes are also a factor in open space planning. Communities with low-income populations are less likely to be able to afford a certain amount and type of open space, whereas higher income communities can afford more and higher cost types. Not only that, but the lifestyles of people with lower or higher income are also different from each other to the point that each population would need a different type of open space. This, perhaps, due to a differing amount of travel and exposure to other places as well as different opportunities afforded, or not, for more capitalintensive recreation.

As shown in Figure 1 - 11, already in 1989 Montgomery Township had experienced a 30% increase in per capita income and a 20% increase in family income above the 1979 incomes. That made Montgomery Township the second-most well off community in the North Penn area, and 8th in the county. Now, on top of that, by 1999, Montgomery's per capita and family incomes mushroomed yet another 50%, making it now the highest in the region and 5th in the county for median family income and 3rd in the region and 13th in the county for median per capita income. This information implies the amount and kinds of open space to be provided for a population with this amount of wealth. It should be remembered, however, that no community is so homogenous as to only need to provide open space for the average citizen. Many people are above and below this level if income and they and their needs should not be forgotten; particularly those under the average since the ones over the average can afford to find and satisfy their needs elsewhere, if necessary, while those under the average depend more on the facilities of their community.

SPECIAL NEEDS GROUPS

Special needs groups probably have special needs for their open spaces and this planning should take them into consideration, too.

Special needs can be defined in many ways. One way is to look at age. Both the young and the eld-



Street hockey player

Photo: Montgomery Township

Special Needs Group	S
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Special Needs Group	1990		2000		% Change	
special needs Group	Number	% Total	Number	% Total	1990-2000	
Persons 16-64 with Disabilities			1,931	8.8%	N/A	
Persons 16-64 with Mobility and Self Care Limitations	169	1.4%			N/A	
Over 65 Years of Age	1,532	12.6%	2,497	11.3%	63.0%	
Under 18 Years of Age	2,918	24.0%	6,254	28.4%	114.3%	
Income Below Poverty Level	131	1.1%	434	2.0%	231.3%	
Total Population	12,179		22,025		80.8%	

Sources: U.S. Census Bureau; Census of Population and Housing, 1990, 2000.

erly may have special needs. As shown in Figure 1 - 12, in 2000, there were 6,254 children under the age of 18 in Montgomery Township. These children comprised 28% of the township's population. This is a huge difference from 1990 when there were 2,918 children under 18. On the other hand, there were 2,497 people 65 years or older in 2000, making up over 11% of the township's population. This, too, is a large increase over the 1,532 people in this age group just ten years before.

Special needs also can include those with disabilities. In 2000, there were 617 people in Montgomery Township who were over 16 years old, and not in an institution, who had a mobility limitation, which means they could not move outside the home without assistance. 354 of them were 65 years or older. In addition to mobility, other disabilities should be considered with regard to open space. Persons with sensory disabilities or any of a variety of physical disabilities appreciate open space, perhaps to compensate for their disability. In Montgomery Township 335 persons over the age of 5, and not in an institution, have sensory disabilities and 816 have physical disabilities. Of the 816 people, 460 of them are over the age of 65.

Finally, special needs groups may include the poor. Poverty level is determined by the Census based on food costs, food purchases as a percentage of total income, number of persons in a household, and number of children in a household. The weighted average poverty threshold for a family of four in the US was \$17,029 in 1999. In 1999, the income of 94 Montgomery Township families fell below the poverty level, which represents 1.5% of the township's families. Of the 94 families below the poverty level, 53 were married-couple families; 68, or 72%, had children less than 18 years old; 24, or 25%, had a householder who had worked full-time in 1999; and 17 had a householder who was over 65 years old. For a single person, of any age, living alone, the poverty level was \$8,501 in 1999. In 1999, the income of 434 Montgomery Township persons fell below the poverty level, which represents 2.0% of the township's residents, but is a tripling of the number of persons below the poverty level since 1989. 93 of them were children in a family; 82 were over 65. Public open space is particularly important for these people since they are the least likely to be able to have much space where they live. Also, when they use the public open space they are interacting with other people in the community that they might not otherwise meet, so there is also some social function to providing open space that is accessible to resident s with lower income.

HOUSING TYPES

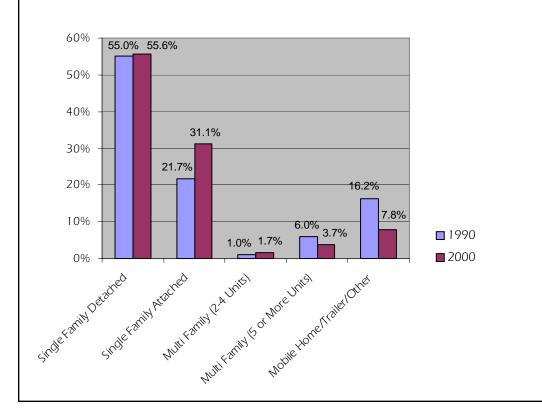
Earlier we discussed the amount of land used by housing – residential uses. Here we will discuss the amount and type of housing units in the township.

Montgomery had 8,053 housing units in 2000, a 67% jump since 1990, putting it in 10th place in the county compared to all the other municipalities. That amount of change, though, was the 4th largest increase in housing in the county since 1990. Most of that change happened in the southwestern and central areas of the township.

The majority of homes, 55.6%, were single family detached residences. Most of the major residential developments in the township have been single family detached houses. Single-family attached housing comprised 31.1%. Multi-family housing,

Housing Types	199	70	20	% Change	
Housing Types	Number	% Total	Number	% Total	1990-2000
Single Family Detached	2,654	55.0%	4,480	55.6%	68.8%
Single Family Attached	1,048	21.7%	2,506	31.1%	139.1%
Multi Family (2-4 Units)	50	1.0%	138	1.7%	176.0%
Multi Family (5 or More Units)	290	6.0%	299	3.7%	3.1%
Mobile Home/Trailer/Other	783	16.2%	630	7.8%	-19.5%
Total Housing Units	4,825	100%	8,053	100%	66.9 %

Sources: U.S. Census Bureau; Census of Population and Housing, 1990, 2000.



Housing Types Comparison

which includes all apartments, comprised 5.4% of the total housing units. Mobile homes, such as are found in Neshaminy Falls, account for 7.8% of housing units in the township and also means Montgomery has the third largest percentage of housing units as mobile homes in the county.

Figure 1 - 13 shows not only what types of housing currently exist in the township, but also how the various housing types have changed in Montgomery Township since 1990. As would be expected, single family detached homes dominate the housing landscape at 55.6% of the total housing in the

township, growing just as fast as the entire housing market. The single family attached type increased its share of the housing landscape the most by increasing from 21% to 31% of the housing in just 10 years. Meanwhile the large multi-family and mobile home types lost the most share, with mobile homes actually decreasing 153 units. With regard to change, of particular note is that housing in small multi-family buildings almost tripled from 1990 to 2000, although they still only account for less than 2% of all housing in the township. Single family attached housing (townhouses) also exploded,

Figure 1 - 14
Major Employers

Ra	nk	Employer	Industry	Emplo	oyees
2004	1993			2004	1993
1	-	McCallion	employment agency	737	n/a
2	1	Harriet Carter	catalog sales	671	1,094
3	5	Macy's	department store	624	327
4		TEVA Pharmaceuticals	pharmaceutical manufacturer	576	n/a
5	-	Target	department store	533	n/a
6	-	American Pool Mgmt.	service provider	473	n/a
7	-	Sears	department store	396	n/a
8	2	BAE Systems (was AEL)	electronics manufacturer	392	867
9 –		Home Depot	home improvements store	367	n/a
10	-	Strawbridge's	department store	364	n/a
11	8	J C Penny	department store	316	257
-	3	Prudential Insurance	check processing division	n/a	773
-	4	Stabilus	gas spring manufacturer	n/a	406
-	6	Wanamaker's	department store	n/a	320
-	7	R.A. Industries	light manufacturing	n/a	314
-	9	SGS Thompson	electronics manufacturer	n/a	218
-	10	Toys R Us	toy store	n/a	131

n/a = not available

Source: Montgomery Township Business Tax Office

more than doubling in that same time period. Nevertheless, the traditional single family detached houses also expanded substantially, almost 70%.

JOBS LOCATED IN MUNICIPALITY

The Delaware Valley Regional Planning Commission (DVRPC) stated that in 2000, about 20,400 jobs were located in Montgomery Township, thereby placing it among the larger employment centers of the County. As will be seen below, the township effectively has more jobs within its borders than workers, therefore importing many employees every day.

According to Delaware Valley Regional Planning Commission estimates, Montgomery Township had 15,732 employees in 1990. Now there is estimated to have been 20,400 jobs in 2000, an increase of 30% in 10 years. But, according to Figure 1 - 14, Major Employers, it seems that for Montgomery Township that increase has been a result of a huge amount of business diversification. The top three employers in 1993 each had more employees than the top employer in 2004 and yet almost 5,000 jobs were created since 1990. Another way to look at it: the top ten now range in size from 737 to 364 employees, a spread of 373, but in 1993 there was a spread of 963. Either many more smaller businesses have been created or many previously existing small businesses expanded their employment. Likely, it was a combination of these two changes.

OCCUPATION

Figure 1 - 15 shows that in 1990, 7,016 Montgomery residents were in the civilian labor force and, of these, only 2.8% were unemployed, which is an extremely low unemployment rate. This rate was lower than Montgomery County's rate of 3% and Pennsylvania's rate of 6%. Now, in 2000, there were 16,301 Montgomery residents in the civilian labor force; of these, only 2.3% were unemployed, once again an extremely low unemployment rate. This rate was lower than Montgomery County's rate of 3.1% and Pennsylvania's rate of 3.5%.

Figure 1 - 15 Labor Force by Occupation

Occupation	2000	
	Number	% Total
Management	2,561	22.7%
Professional	2,697	23.9%
Sales	2,149	19.1%
Clerical/Office	1,560	13.8%
Construction	528	4.7%
Production/Transportation	852	7.6%
Farming	20	0.2%
Services	912	8.1%
Total	11,279	100%

Sources: U.S. Census Bureau; Census of Population and Housing, 2000.

Of the 7,016 Montgomery residents in the civilian labor force in 1990, 3,284, or 46.8%, were female. Approximately 66% of the women of working age were in the labor force in 1990. Following national trends, these percentages were higher than those of 1980, when 40.7% of the labor force was female and 54% of women of working age were in the labor force. Now, in 2000, of the 11,654 Montgomery residents in the civilian labor force, 5,465, or 46.9%, were female, virtually no difference since 1990. Approximately 63% of the women of working age were in the labor force in 2000, slight reduction from 1990. This still continues an upward trend since 1980, when 40.7% of the labor force was female and 54% of women of working age were in the labor force.

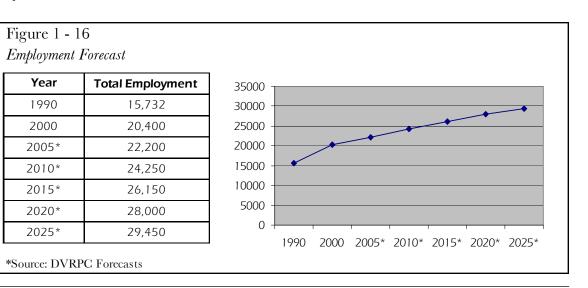
In 1990 the vast majority of Montgomery's employed labor force was white collar, over 71%.

Even more, 73%, were white collar in 2000. These people are in professional, managerial, sales, services, and clerical positions. In 2000, only 12% were in blue-collar positions such as construction, production and transportation. Figure x shows the full breakdown of the occupational status of Montgomery Township's residents.

EMPLOYMENT FORECAST

DVRPC develops employment forecasts based on census data, past trends, the job market, and available land. These are displayed in Figure 1 - 15, Employment Forecast. The change from 1990 to 2000 amounted to a booming increase of 30%. Employment opportunities in the township are expected to increase another 44% in 25 years from 2000 to 2025. The ever decreasing availablity, and therefore increasing cost, of land will encourage expansion and redevelopment increasingly more than new construction, especially since, as mentioned before, there is already a glut of available commercial space in the entire region.

All this together will put more pressure on available vacant land as well as unused portions of existing commercially developed land so that open space will become harder and more expensive to acquire or to gain access public rights to unused portions of developed land.

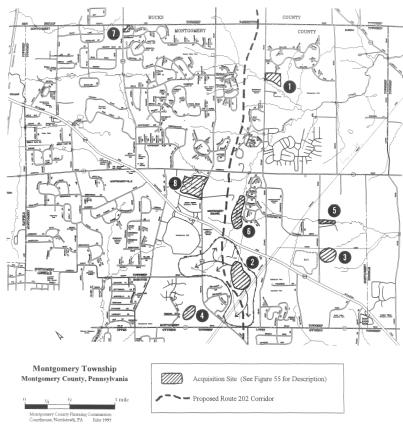


STATUS OF RELEVANT PLANS

1994 OPEN SPACE PLAN

Montgomery Township has an existing Open Space Plan, which was prepared in 1994. The emphasis of this report was on the preservation of open space land, not active park and recreation facilities. The township's future open space system was described as consisting of four basic kinds: community parks, neighborhood parks, natural preserves, and trails. After determining the greatest needs in the open space system, the recommendations then began with suggesting eight sites to be acquired, totaling 96 acres. After the plan was amended a few years later there were ten sites, totaling 135 acres. They were a mixture of sizes ranging from 2 acres to 30 acres and were spread throughout the township, see Figure 1 - 17. These would fill the needs of the first three kinds of open space. A complete township-wide trail network was also recommended (see Figure 1 - 18). Non-acquisition methods of protecting open space were also identified. Finally, the 1994 plan included an implementation timeline beginning in 1995 and completing in 1997, with some items always on-going.





1999 COMPREHENSIVE PLAN

A few years after the Open Space Plan was done, in 1999, the Township completed a new Comprehensive Plan. The land use portion of this plan focused on strategic development and redevelopment. A town center concept was proposed for the commercial land along Bethlehem Pike near the Montgomery Mall. In addition, the Comprehensive Plan included a community facilities plan that showed proposed parks and open space. This plan is similar to the 1994 Open Space Plan; however, it did recommend a number of locations for future neighborhood parks, mostly by using existing school facilities.

2005 COUNTY COMPREHENSIVE PLAN

The brand new 2005 County Comprehensive Plan strongly encourages the creation of an open space system linked together with a comprehensive trail, sidewalk, and greenway network. In the Plan, the county' proposes a Powerline Trail, which is hoped would pass through the southern corner of Montgomery Township. This is shown in Figure 1 - 19.

1998 COUNTY BICYCLE MOBILITY PLAN

In 1998 the County also completed a Bicycle Mobility Plan which included recommendations to facilitate the creation of a bicycle route network throughout the county. Individual municipalities and the State are urged to use this plan to guide decisions when improving existing local and state roads. The plan shows many roads in Montgomery Township as part of that bicycle route network. The Township could potentially use pieces of this bike network as part of the township's trail system as well.

WATERSHED STUDIES

The Neshaminy Creek and Little Neshaminy Creek each have their own Watershed Stormwater Study, completed in the 1990's and currently being updated. These studies resulted in the adoption of special stormwater ordinances, which have been adopted by the Township as part of the Subdivision and Land Development Ordinance.

1999 WISSAHICKON CREEK RIVER CONSERVATION PLAN

Further, the Wissahickon Creek River Conservation Plan of 1999 describes some important natural resource restoration tools that are applicable to streams anywhere in the township, and most particularly in the Wissahickon Creek watershed.

Figure 1 - 18 1994 Open Space Plan Trail System Map

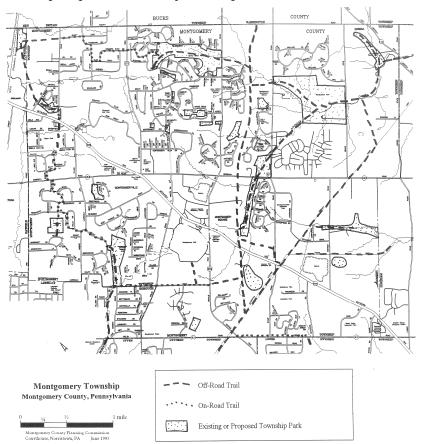
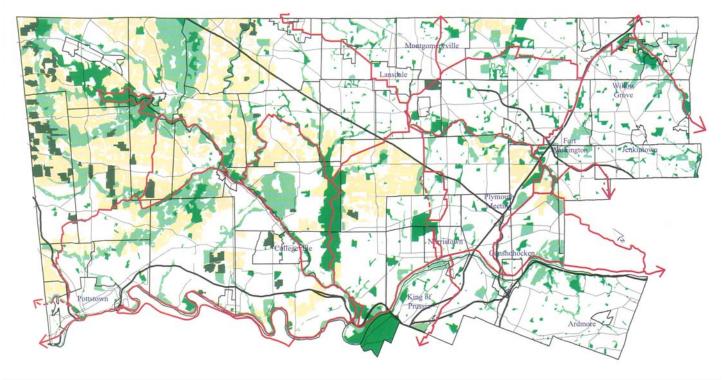


Figure 1 - 19 2005 County Comprehensive Plan Open Space and Trail Map

ZONING AND SUBDIVISION ORDINANCES

The Township's zoning ordinance and zoning map do not exactly reflect the land use recommendations in the Township's Comprehensive Plan but is actually closer to the County's Comprehensive Plan. Some of the area proposed for low and agricultural land uses in the Township's Comprehensive Plan has actually been developed with high or medium density housing. Other portions have been developed with 1 home per acre, which does not really maintain open space. Nevertheless, the zoning ordinance does have some provisions for protecting a limited amount of open space. The R-1 and R-2 districts include a cluster provision that requires 20% open space. The R-5 district has a cluster requiring 10% open space. The MHP district requires 20% open space for all mobile home parks. Generally, development in these zoning districts has created open space that consists of wetlands, floodplain, and detention basins. Sometimes, woodlands are preserved. The R-6 district requires a golf course to be provided when higher density development occurs. The Pine Crest Golf Club was developed according to these standards. In addition, the zoning ordinance has floodplain regulations that prohibit the development of buildings in the floodplain and it has a new provision that provides a density bonus when historic buildings and open space around them are preserved.

In addition to the special stormwater requirements for the two Neshaminy watersheds, the subdivision



ordinance has extensive landscaping standards and requires all subdivisions and land developments to provide open space, either on-site or with a fee-inlieu. The landscaping standards require tree preservation or, when trees cannot be preserved, tree replacement. In addition, landscaping must be provided along streets and property lines, within parking lots, and around detention basins.

A discussion of the planning efforts of surrounding municipalities will follow in Chapter 9..

CHAPTER 2 goals & objectives

The goals of a community provide the framework for any planning or zoning decisions that will be made in the future, including open space and park decisions. This chapter identifies Montgomery's goals regarding protection of environ-mental resourc-es and creation of parkland and trails. Each goal is listed below, discussed briefly, and followed by a set of objectives and action steps that will help the township reach that particular goal.

As may become apparent, the new 2006 goals and objectives were developed based on an evaluation of the previous 1994 goals and objectives and discussing what worked and what did not. Therefore, the new 2006 goals and objectives may be more realistic and achievable. The new goals and objectives also reflect a broader definition and use of open space as outlined by the Montgomery County Green Fields/Green Towns Program.

2006 GOALS AND OBJECTIVES

The Township's Open Space Committee evaluated the goals and objectives from the 1994 Open Space Plan. A summary of that evaluation is at the end of this chapter. Based upon the success of implementing many of the plan's recommendations and the changing needs and decreasing opportunities in the township, the Open Space Committee has revised and augmented the previous goals resulting in the following new 2006 goals and objectives.

MEET THE TOWNSHIP'S COMMUNITY PARK NEEDS

Objectives:

- 1. Create a new 20- to 30-acre community park on a portion of the Gill/Glasgow and Zepp/Krauss tracts.
- 2. Expand Windlestrae Park to include the remainder of the Zehr tract.

- 3. Create a new 20- to 30-acre community park on a portion of the land behind Airport Square.
- 4. Modify the zoning code to increase the required amount of open space to 50% of the tract area.
- 5. Create a new community park on the land of the quarry on Upper State Road.
- 6. Work with Horsham Township to create a new community park at Limekiln Pike, Lower State Road and County Line Road.
- 7. Investigate the reversion of Route 202 Bypass development rights and work to keep the corridor preserved for open space, including a new community park.

MEET THE TOWNSHIP'S NEIGHBORHOOD PARK NEEDS

Objectives:

- 1. Create a new 10- to 20-acre neighborhood park on a portion of the Gill/Glasgow and Zepp/ Krauss tracts.
- 2. Develop a new 10- to 20-acre neighborhood park on new and/or existing public land near Knapp and DeKalb.
- 3. Create a new 10- to 20-acre neighborhood park on a portion of the land behind Airport Square.
- 4. Modify the zoning code to increase the required amount of open space to 50% of the tract area.
- 5. Create a new neighborhood park on the land of the Glasgow Quarry on Upper State Road.
- 6. Acquire a portion of Horsham and Stump property to create a small neighborhood park.
- 7. Create a new 10- to 20-acre neighborhood park at Limekiln Pike, Lower State Road and County Line Road.
- 8. Create a new neighborhood park west of Natural Park.
- 9. Investigate the reversion of Route 202 Bypass development rights and work to keep the corridor preserved for open space, including one or more new neighborhood parks.

PRESERVE NATURAL AREAS BY CREATING TOWNSHIP NATURE PARKS

The different natural features of Montgomery Township, the woodlands, stream corridors, and wetlands, provide a variety of benefits. Woodlands provide habitat for many animal and plant species, control erosion, clean the air, protect privacy, provide windbreaks, cool the air in the summer, reduce the impact of rainfall, muffle noise, absorb odors, improve the appearance of an area and are simply quite enjoyable for peaceful walks. Stream corridors carry floodwaters, minimize erosion, protect water quality, provide animal habitat, and provide recreation opportunities. Wetlands purify water, retain stormwater runoff, limit erosion, reduce flood flows, provide food and shelter for a wide array of animals and plants, facilitate ground-water recharge, and help maintain the base flows of area streams.

Objectives:

- 1. Create a new 10- to 15-acre natural park or conservation area on a portion of the Gill/Glasgow and Zepp/Krauss tracts.
- 2. Modify the zoning code to increase the required amount of open space to 50% of the tract area.
- 3. Create a new natural park on a portion of the land behind Airport Square.
- 4. Create a new natural park on the Sewer Authority's "buffer" property located to the south of the sewer plant on Lower State Road.
- 5. Create a new natural park on the vacant 12-acre property along Horsham Road near Stump Road.
- 6. Create new natural parks by negotiating with private open space land owners to allow portions to become natural parks for public use.
- 7. Create a new natural park on the land of the Glasgow Quarry on Upper State Road.
- 8. Investigate the reversion of Route 202 Bypass development rights and work to keep the corridor preserved for open space, including a new natural park.

CREATE A TRAIL NETWORK

A trail system, combined with the township's sidewalks, will provide a safe place for people to get exercise by walking, jogging, or riding a bicycle, it will connect the township's parks, it will provide the only independent means of transportation for those not able to drive, such as children and some elderly, it will reduce the number of vehicle trips by allowing car owners to walk and children to walk or ride safely without getting a ride from their parents, and it will improve safety by moving pedestrians and bicycles out of existing roads. In addition, this trail network will connect with trails in abutting townships, thereby allowing Montgomery Township residents to travel longer distances on an off-road trail system.

Objectives:

1. Work with PennDOT to ensure the 202 ByPass or Parkway project will include a multi-use, multiple access trail.

- Establish a new trail network consisting of offroad and on-road trails.
 Individual pieces of this network are prioritized, A through Q, below.
- 3. Work with Horsham Township to connect the two trail and park networks.
- 4. Modify the zoning code to increase the required amount of open space to 50% of the tract area.
- 5. Develop an Adopt-A-Trail program to encourage citizen participation in trail surveillance and up-keep.
- 6. Provide trails with educational value with enhancements, such as illustrative signage, that are provided by the Township or interest groups.
- 7. Enhance trail design to make the experience more pleasant and attractive, such as meandering the pathway where it would otherwise be a long, straight path or provide other enhancements.
- 8. Create new trail segments by negotiating with private open space land owners to allow portions to be used for public trails.

Prioritized Trail Segments:

- A Off-road County Powerline Trail segment from Horsham Township to Acura and off-road Township feeder trail from Acura to Horvath and Windlestrae and Lower State Road. (Chapter 16, Trail Implementation Map, #1)
- B Off-road Township connector and feeder trail from Windlestrae Park to Spring Valley Park. (Trail Implementation Map, #2)
- C Off-road County Powerline Trail segment from Acura to 202 By-pass / Parkway and on-road Township trail from Acura along Stump Rd., Witchwood Dr., Knapp Rd., and DeKalb Pike to Welsh Rd. and through Bark Park. (Trail Implementation Map, #3A and 3B)
- D Off-road Township feeders and connectors through Spring Valley Park to Bellows Ln. and Whistlestop Park to Autumn Woods Park and Richardson Rd. to Lawn Ave. (Trail Implementation Map, #4A, 4B and 4C)
- E Off-road Township feeder and connector trail from the County Powerline Trail along the Little Neshaminy to Windlestrae Park. (Trail Implementation Map, #5)
- F Off-road Township feeder trail along the Little Neshaminy Creek from Windlestrae Park to Lower State Rd, connecting to the Horsham Township trail network. (Trail Implementation Map, #6)
- G Develop nature trails in Horvath Park.
- H Establish an off-road trail along North Wales from the Montgomery Mall to Knapp Rd.

- I Establish trail connections to Lansdale, such as crosswalks across Knapp Road.
- J Establish trail connections to Oxford Park in Lower Gwynedd Township.
- K Provide a footbridge from Red Haven Drive and across the Little Neshaminy Creek to the public land near the General Hancock historic farmstead.
- L Provide a continuous series of off-road and onroad trails along County Line Road.
- M Connect other gaps and complete the trail network.
- N Provide a trail through and/or around the park or parks on a portion of the Gill/Glasgow and Zepp/Krauss tracts.
- O Provide a sidewalk connection along Taylor Rd to Bridle Path School.
- P Provide new pedestrian and bike crossings along Kenas Road over the Little Neshaminy Creek.
- O Provide trail from Little Neshaminy Creek, across private open space, to Davis Dr. and to Horsham Township.

PRESERVE STREAM CORRIDORS, WETLANDS, AND WATERSHEDS

Stream corridors, and floodplains serve many important functions that the township wants to maintain. As mentioned above, these areas carry floodwaters, minimize erosion, protect water quality, provide animal habitat, and provide recreation opportunities. Wetlands, purify water, retain stormwater runoff, limit erosion, reduce flood flows, and facilitate groundwater recharge.

Objectives:

- 1. Modify the zoning code to increase the required amount of open space to 50% of the tract area.
- 2. Request the Township Environmental Action Committee to conduct a stream quality study and suggest actions to improve stream quality.
- 3. Enact a Riparian Buffer Ordinance.
- 4. Require building setbacks from the edge of floodplains.
- 5. Require building setbacks from the edge of wetlands.
- 6. Work with non-profit organizations to protect and improve streams, wetlands and watersheds.

IMPROVE THE VISUAL IMAGE OF ROADWAYS LEADING INTO THE TOWNSHIP

The image that a municipality conveys can have important repercussions for its economic and psychological well-being. Businesses may locate in a community because of that community's perceived quality of life, which includes the quality and appearance of its built environment. People often feel better about a place if that place has a beautiful and peaceful appearance.

Montgomery Township might consider the following techniques for meeting this goal:

Objectives:

- 1. Create inviting and representative gateways to the township.
- 2. Establish standards and implementation strategies for more attractive roadways throughout the township, especially including roadside beautification along the 309 frontage of the Gill Quarry at Hartman Road.
- Create incentives in the zoning ordinance so that developments which meet certain visually attractive design standards would get a bonus.
- 4. Amend the sign ordinance to improve the quality of signs.
- 5. Create roadway greenways to include planting trees and other improvements along major corridors.
- 6. Preserve the existing attractive road corridors, such as parts of Horsham Rd., Stump Rd. and Kenas Rd.
- Enhance trails and sidewalks along roads to make the experience more pleasant and attractive, such as meandering the pathway where it would otherwise be a long, straight path or provide other enhancements.
- 8. Keep the landscaped buffer of the Montgomery Mall along North Wales Rd.
- Maintain liaison with PennDOT's roadside development program.
- 10.Work with the business community to improve the appearance of the roads.

PRESERVE AND PROTECT THE TOWNSHIP'S STREET TREES

Street trees provide all of the benefits listed above for woodlands; however, they are most important for cleaning the air, cooling the air, muffling noise, absorbing odors, and improving appearances. By doing all of this, they help improve property values.

Objectives:

- 1. Continue the requirement for tree plantings along all other roads in the township.
- 2. Continue special requirement for tree plantings along Bethlehem Pike.
- 3. Provide tree plantings along the Bethlehem Pike frontage of the Gill Quarry at Hartman Road.
- 4. Produce an inventory and a maintenance plan for all street trees and other public trees.

PRESERVE THE TOWNSHIP'S IMPORTANT HISTORIC RESOURCES

Objectives:

- 1. Preserve the church & cemetery at Richardson Road and Bethlehem Pike.
- 2. Preserve the historic properties near Limekiln Pike and the sewer plant.
- 3. Preserve the historic stone bridge for Limekiln Pike over the Little Neshaminy Creek.
- 4. Adopt a historic overlay zoning district for historic non-residential properties.
- 5. Purchase development rights, façade easements, or other use other methods to preserve historic properties in the township.
- 6. Preserve trees that are historic due to extreme age.
- 7. Preserve the remaining spring houses in the township.
- 8. Work with non-profit historic preservation organizations and with consultants.

PRESERVE THE TOWNSHIP'S IMPORTANT FARMLAND

Objectives:

1 Buy the development rights of existing farms.

THE 1994 OPEN SPACE PLAN

Montgomery Township completed their first Open Space Plan in 1994. At that time a series of goals and objectives were developed to address issues regarding the preservation of open space and the protection of environmental resources. As a part of the update process required by the 2003 Montgomery County Open Space Program, Montgomery Township has evaluated its previous goals and objectives to address whether the goals are still valid and to evaluate why some of the last plan's recommendations were not implemented.

Below are listed the previous goals and objectives with accompanying explanation of their status.

MEET THE TOWNSHIP'S COMMUNITY PARK NEEDS

By providing community level parks, the township will provide all of its residents with a place to play different sports, such as soccer, baseball, softball, football, tennis, basketball, etc.

Montgomery Township proposes to meet this goal by:

 Continuing to use Whistlestop, Fellowship, and Spring Valley parks as community parks.

Status: Whistlestop, Fellowship, and Spring Valley parks are still being used as community parks. Spring Valley Park was further improved with tennis and basketball courts, new trees, and parking.

• Developing Windlestrae Park so that it can function as Montgomery Township's primary community park and cultural center.

Status: Windlestrae Park was expanded and new soccer fields, baseball fields, tennis courts and long pieces of paved trails were built and new trees added.

MEET THE TOWNSHIP'S NEIGHBORHOOD PARK NEEDS

Neighborhood parks, in addition to meeting some recreation needs, provide a park close to people's homes, which makes the parks more accessible, especially for young children.

Montgomery Township proposes to meet this goal by:

 Continuing to provide neighborhood or community parks in most of Montgomery's neighborhoods. Status: continuing; Whispering Pines Park was improved with picnic facilities, basketball courts, a tot lot, a trail, and trees were planted in the parking lot and along Orchard Drive.

• Acquiring new neighborhood parks in a number of unserved neighborhoods.

Status: one new neighborhood park, Bell Run Bark Park, was created, and the expansion of Windlestrae connected to a new neighborhood along Stump Road. The parkland on the Gill Tract was not acquired.

 Using public schools to meet the neighborhood park needs of some neighborhoods, and, if these schools are ever sold, to acquire the right to continue using the property for neighborhood parkland.

Status: use of school recreation facilities not formally acquired; luckily, no schools have closed.

 Requiring all developments, even ones that are not clustered, to provide open space that is usable for active recreation or provides a connection needed for the township's proposed trail system.

Status: all new development is required to provide recreation land or a fee-in-lieu. Cluster developments are required to provide even more open space land.

• Amending the cluster regulations to require more open space and require a certain percentage of the open space to be suitable for the active recreation needed for a neighborhood park.

Status: proposed but not adopted.

CREATE A TRAIL NETWORK

A trail system, combined with the township's sidewalks, will provide a safe place for people to get exercise by walking, jogging, or riding a bicycle; it will connect the township's parks; it will provide the only independent means of transportation for those not able to drive, such as children and some elderly; it will reduce the number of vehicle trips by allowing car owners to walk and children to walk or ride safely without getting a ride from their parents; and it will improve safety by moving pedestrians and bicycles out of existing roads. In addition, this trail network will connect with trails in abutting townships, thereby allowing Montgomery Township residents to travel longer distances on an off-road trail system. Montgomery Township proposes to meet this goal by:

 Using existing or proposed rights-of-way, including PECO power lines, sewer lines, and the proposed Route 202 corridor, for future trails.

Status: new trail segment was added at the Township Building along a sewer right-of-way. No other segments were built that meet this objective.

• Getting permission from the North Penn School District to cross their properties with township trails.

Status: not pursued

• When necessary, acquiring land or easements needed for the trail.

Status: public open space land was acquired that are along the proposed trail routes, but no trails have been built in those areas.

 Requiring all developments, even ones that are not clustered, to provide open space that is usable for active recreation or provides a connection needed for the township's proposed trail system.

Status: all new development is required to provide recreation land or a fee-in-lieu. Cluster developments are required to provide even more open space land.

• Amending the cluster regulations to require more open space. This open space might be used for trail connections.

Status: proposed but not adopted.

PRESERVE NATURAL AREAS BY CREATING TOWNSHIP NATURE PARKS

The different natural features of Montgomery Township, the woodlands, stream corridors, and wetlands, provide a variety of benefits. Woodlands provide habitat for many animal and plant species; control erosion; clean the air; protect privacy; provide windbreaks; cool the air in the summer; reduce the impact of rainfall; muffle noise; absorb odors; and improve the appearance of an area. Stream corridors carry floodwaters, minimize erosion, protect water quality, provide animal habitat, provide recreation opportunities. Wetlands purify water, retain stormwater runoff, limit erosion, reduce flood flows, provide food and shelter for a wide array of animals and plants, facilitate ground-water recharge, and help maintain the base flows of area streams.

Montgomery Township proposes to meet this goal by:

• Acquiring land that has unique natural features.

Status: Several new natural open space areas were acquired along stream corridors and include some wetlands. The General Hancock housing development and the new developments along Kenas Road all dedicated land along the Little Neshaminy Creek. Several other open spaces were acquired from developments such as in the Knapp Road extension area or next to the Amoco station on County Line Road. Some of these spaces could be further developed with trails or other recreation facilities or they could be simply left as natural preserve.

• Amending the cluster regulations to require more open space. This open space might be used for creating natural areas.

Status: proposed but not adopted.

PRESERVE STREAM CORRIDORS, WETLANDS, AND WATERSHEDS

Stream corridors, and floodplains serve many important functions that the township wants to maintain. As mentioned above, these areas carry floodwaters, minimize erosion, protect water quality, provide animal habitat, and provide recreation opportunities. Wetlands, purify water, retain stormwater runoff, limit erosion, reduce flood flows, and facilitate groundwater recharge.

Montgomery Township proposes to meet this goal by:

 Creating a stream corridor protection ordinance.

Status: proposed, but not adopted.

- Requiring building setbacks from the edge of floodplains.
 Status: not pursued.
- Requiring building setbacks from the edge of wetlands.
 Status: not pursued.
- Requiring wetlands to be shown on plans. Status: is now required.
- Amending the cluster regulations to require more open space. This open space might be

used to protect stream corridors, wetlands, and floodplain.

Status: not pursued

IMPROVE THE VISUAL IMAGE OF ROADWAYS LEADING INTO THE TOWNSHIP

The image that a municipality conveys can have important repercussions for its economic and psychological well-being. Businesses may locate in a community because of that community's perceived quality of life, which includes the quality and appearance of its built environment. People often feel better about a place if that place has a beautiful and peaceful appearance.

Montgomery Township had not determined how it would meet this goal. A consultant conducted a commercial growth study for the township, and this study examined methods of improving the Township's visual image along Route 309. Montgomery Township anticipated considering the following techniques for meeting this goal:

 Creating a new hybrid commercial/industrial district for Route 309. This district would have extensive design standards.

Status: The 309 corridor now has a mix of commercial and industrial zoning, however there are no design standards other than large setbacks, which are usually covered with lawn.

 Creating incentives in the zoning ordinance. Developments which meet certain design standards would get a bonus.

Status: not pursued.

• Amending the sign ordinance to reduce the size and number of signs.

Status: not pursued. A billboard district was added to the zoning, which at least restricts billboards to a certain area along Bethlehem Pike.

• Planting trees along these corridors.

Status: Street trees are required everywhere and that contributes to meeting this goal, but there are no special requirements for these corridors.

• Working with the business community to improve the appearance of the roads.

Status: The Shade Tree Commission planted trees on a number of business sites, primarily along Bethlehem Pike and Route 202.

In addition, beyond the anticipated actions, the Township worked with developers for Amoco and CVS to provide "Welcome to Montgomery Township" gateway elements and perennial plantings on their sites.

PRESERVE AND PROTECT THE TOWNSHIP'S STREET TREES

Street trees provide all of the benefits listed above for woodlands; however, they are most important for cleaning the air, cooling the air, muffling noise, absorbing odors, and improving appearances. By doing all of this, they help improve property values.

Montgomery Township proposes to meet this goal by:

• Creating a shade tree commission which will be responsible for preserving and protecting the township's street trees.

Status: Shade Tree Commission was established. They have been planting trees along several corridors and these trees are not allowed to be removed.

Continuing to require all developments to plant street trees.

Status: continuing.

Montgomery Township 2006 Open Space Plan Chapter 2: Goals and Objectives

CHAPTER 3 EXISTING PROTECTED LAND

A key component of the open space plan is a review of existing protected land. An inventory of existing conditions, along with an assessment of future needs, is necessary for formulating many of the plan's goals and objectives. Existing protected land refers to land preserved for active or passive recreation use and/or for environmental conservation purposes. In addition to municipally-owned areas, it can include land preserved by private conservation groups, farmland, schools sites, churches, industry, and private open space preserved as part of residential or non-residential development.

This chapter identifies existing open and recreational land in municipality and separates it into two categories of protection - permanently and temporarily protected land. The latter category makes an important contribution to the overall recreation base of a community by preserving open space, conserving significant natural features, and/or providing recreation facilities that do not require municipal involvement in maintenance. However, temporarily protected land can easily be lost. In evaluating open space needs, this distinction is important, as is the goal of increasing the amount of permanently protected land so that future generations can also benefit from open space.

PERMANENTLY PROTECTED LAND

Generally, permanently protected land can be divided into two broad categories: land that is government owned and land that is privately owned.

TOWNSHIP OPEN SPACE

The township has over 814 acres of governmentowned or quasi-public-owned park and open space land. This land is shown in Figure 3-1, and each parcel is listed in Figure 3-2. All of this government or quasi-public land and open space is owned by the township and other local entities and utilities; there is no federal, state, or county park or open space land located in Montgomery Township, although PennDOT does own some land along the route of the 202 bypass, and although it is currently undeveloped it is expected to developed into a highway of some sort.

The township has two types of open space: actual park land and passive open space land located within developments. Montgomery Township's existing system of parks and open space has grown since 1994 when the township owned about 400 acres in 7 parks totaling approximately 320 acres. The township's parks at that time included the Montgomery Township Fitness Trail Park, Fellowship Park, the Montgomery Township Natural Area, Spring Valley Park, Windlestrae Park, Hourglass Park, a few unnamed parks, and the township municipal complex, which includes a park. The other 80 acres consisted of passive open space and detention basins interspersed throughout many of the township's developments. Of these 80 acres, approximately 36 of them consist solely of detention basins. Much of the remaining acreage was environmentally constrained, although possibly with some room for tot lots or courts. (These figures do not include Whistlestop Park, which has 13 acres but is located outside of Montgomery's borders.)

In 2004, the Township's park and open space system includes 91 sites totaling over 476 acres. Eight of the 91 sites offer extensive active recreation opportunities, including playgrounds, soccer fields, baseball/softball fields, basketball courts, tennis courts, and numerous walking trails. The other sites are used for detention basins, passive recreation such as trails or bird watching, or as a natural preserve. However, each offers community residents important recreational opportunities and scenic amenities. Figure 1 - 3 provides a summary of the township owned land.

PRIVATE OPEN SPACE

Montgomery Township also contains over 393 acres of privately owned but permanently protected open space. This category would include any land owned by watershed associations, conservancy groups, and homeowner's associations. It also includes land, if there is any, that cannot be developed because the landowner has sold his or her development rights; the farmland development rights purchase program run by the state falls into this category.

In Montgomery Township, all of the privately owned land consists of open space provided within a development. For example, the Montgomery Glen development provides 7.7 acres of open space, which includes a pool, a tot lot, and courts. Another development with a substantial amount of active recreation land is the Pinecrest Golf Club, which includes approximately 110 acres of land that is used for a golf course. Most of the remaining privately owned open space is not developed for active recreation and contains detention basins and environmentally constrained land.

Some of the open space land that is currently privately owned may be transferred to the township in the future, once the development is completed.

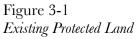
Privately-owned, permanently protected land is shown in Figure 3-1 and listed in Figure 3-2.

TEMPORARILY PROTECTED LAND ACT 319

The Pennsylvania Farmland and Forest Land Assessment Act was created to preserve land devoted to agricultural use, agricultural reserve, or forest reserve. This preferential tax assessment gives landowners a small incentive to keep the their parcel intact (minimum 10-acre parcel size). If a breach occurs, the landowner must pay rollback taxes for the previous seven years plus interest. With the high demand for land, this penalty is not a significant deterrence, and therefore Act 319 provides minimal land protection. The Gill Tract, for example is one such property and is currently proposed for development. Currently, in Montgomery Township 4 properties, totaling 114 acres are enrolled in the Act 319 program.

ACT 515

The Pennsylvania Open Space Covenant Act was created to stabilize open areas through the use of real estate tax assessment techniques. It allows certain counties to covenant with landowners for preservation of land in farm, forest, water supply or open space uses. Some eligible lands can be as small as ten acres and must be consistent with the county or municipal open space plan. Unless



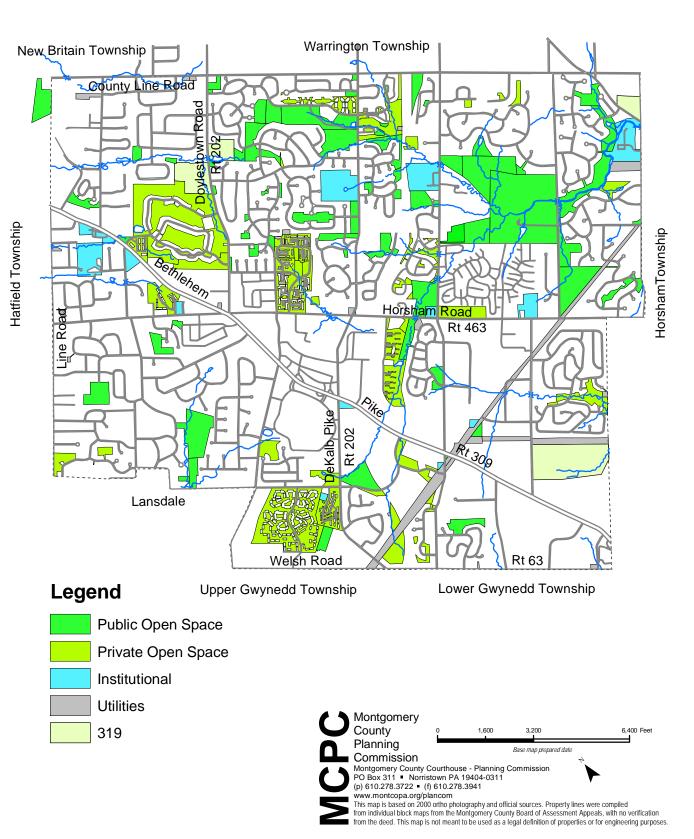


Figure 3-2 Table of Existing Protected Land

ACRES	OWNER	ADDRESS	BLOCK	UNIT
	PUBLIC			
3.79	MONTGOMERY TOWNSHIP	00131 ANDREW LN	002C	001
22.93	MONTGOMERY TOWNSHIP	01001 STUMP RD	015	024
0.42	MONTGOMERY TOWNSHIP	AQUEDUCT DR	015H	096
0.69	MONTGOMERY TOWNSHIP	ASCOT CT	015H	141
0.91	MONTGOMERY TOWNSHIP	ASCOT CT	015H	142
2.24	MONTGOMERY TOWNSHIP	BELLOWS WAY	014R	036
5.72	MONTGOMERY TOWNSHIP	BELLOWS WAY	014L	109
0.75	MONTGOMERY TOWNSHIP	BELMONT CT	015H	099
3.00	MONTGOMERY TOWNSHIP	BETHLEHEM PIKE	003A	074
19.57	MONTGOMERY TOWNSHIP	CANTERBURY LN	014W	061
0.66	MONTGOMERY TOWNSHIP	CHAPS WAY	015C	035
7.75	MONTGOMERY TOWNSHIP	CHAPS WAY	015C	034
0.60	MONTGOMERY TOWNSHIP	CLAREMONT DR	015H	222
1.53	MONTGOMERY TOWNSHIP	CLAREMONT DR	014U	105
2.54	MONTGOMERY TOWNSHIP	CLAREMONT DR	015H	221
5.70	MONTGOMERY TOWNSHIP	CLAREMONT DR	014U	106
14.27	MONTGOMERY TOWNSHIP	CLAREMONT DR	015H	223
26.73	MONTGOMERY TOWNSHIP	CLAREMONT DR	014X	159
1.37	MONTGOMERY TOWNSHIP	COLWYN TER	015F	027
1.44	MONTGOMERY TOWNSHIP	COMMERCE DR	018A	013
2.91	MONTGOMERY TOWNSHIP	COUNTY LINE RD	014	071
6.50	MONTGOMERY TOWNSHIP	COUNTY LINE RD	015J	047
6.31	MONTGOMERY TOWNSHIP	CRICKLEWOOD CIR	001A	098
5.89	MONTGOMERY TOWNSHIP	DAVID LN	006D	048
11.00	MONTGOMERY TOWNSHIP	DAVIS DR	017G	136
22.00	MONTGOMERY TOWNSHIP	DAVIS DR	017G	135
22.00	MONTGOMERY TOWNSHIP	DAVIS DR	017G	135
0.13	MONTGOMERY TOWNSHIP	DELMAR CT	015H	095
0.18	MONTGOMERY TOWNSHIP	DELMAR CT	015H	094
1.12	MONTGOMERY TOWNSHIP	DOUGLASS RD	002C	096
0.80	MONTGOMERY TOWNSHIP	DOYLESTOWN RD	014N	065
1.82	MONTGOMERY TOWNSHIP	DOYLESTOWN RD	014T	098
0.29	MONTGOMERY TOWNSHIP	GRAYS LN	014V	015
0.64	MONTGOMERY TOWNSHIP	GREEN SPRING CIR	015L	004
1.99	MONTGOMERY TOWNSHIP	GREEN TREE TAVERN RD	017F	073
4.34	MONTGOMERY TOWNSHIP	GREEN TREE TAVERN RD	017F	074
8.02	MONTGOMERY TOWNSHIP	GWYNEDD LEA DR	019A	089
5.97	MONTGOMERY TOWNSHIP	HAMPTON CIR	014R	008
26.98	MONTGOMERY TOWNSHIP	HORSHAM RD	017	010
0.46	MONTGOMERY TOWNSHIP	KELSEY DR	015F	029
4.61	MONTGOMERY TOWNSHIP	KELSEY DR	015F	028
16.00	MONTGOMERY TOWNSHIP	KENAS RD	016	052
32.84	MONTGOMERY TOWNSHIP	KENAS RD	016	047
1.27	MONTGOMERY TOWNSHIP	KNAPP RD	011C	009
14.99	MONTGOMERY TOWNSHIP	KNAPP RD	011C	011
24.72	MONTGOMERY TOWNSHIP	KNAPP RD	006	042
1.50	MONTGOMERY TOWNSHIP	LONGLEAT DR	015A	110
1.76	MONTGOMERY TOWNSHIP	LONGLEAT DR	015A	111
0.20	MONTGOMERY TOWNSHIP	LOWER STATE RD	017A	021
0.04	MONTGOMERY TOWNSHIP	MAJOR DR	017D	039
5.60	MONTGOMERY TOWNSHIP	MALLARD DR WEST	016A	175
13.62	MONTGOMERY TOWNSHIP	N LINE ST	005	106
1.50	MONTGOMERY TOWNSHIP	NEWPORT LN	011D	045
1.73	MONTGOMERY TOWNSHIP	ORCHARD DR	013B	096
4.79	MONTGOMERY TOWNSHIP	ORCHARD DR	013B	095
0.63	MONTGOMERY TOWNSHIP	PAULINE CIR	002K	010

Figure 3-2 Table of Existing Protected Land (continued)

ACRES	OWNER	ADDRESS	BLOCK	UNI
12.20	MONTGOMERY TOWNSHIP	PECAN DR	006A	038
0.11	MONTGOMERY TOWNSHIP	PIMLICO WAY	015H	098
0.20	MONTGOMERY TOWNSHIP	PIMLICO WAY	015H	097
1.28	MONTGOMERY TOWNSHIP	PIMLICO WAY	015H	100
0.59	MONTGOMERY TOWNSHIP	PIONEER DR	003B	093
3.89	MONTGOMERY TOWNSHIP	REGENCY DR	018D	154
10.81	MONTGOMERY TOWNSHIP	REGENCY DR	018D	153
2.31	MONTGOMERY TOWNSHIP	ROSE TWIG LN	016A	176
8.65	MONTGOMERY TOWNSHIP	S STONERIDGE DR	014Y	046
0.09	MONTGOMERY TOWNSHIP	SARATOGA WAY	015H	220
0.58	MONTGOMERY TOWNSHIP	SCHREINER DR	015J	046
1.11	MONTGOMERY TOWNSHIP	SCHREINER DR	016	060
6.75	MONTGOMERY TOWNSHIP	SHELBURNE DR	015B	000
8.17	MONTGOMERY TOWNSHIP	STAYMAN DR	013B 013A	156
0.43	MONTGOMERY TOWNSHIP	STEVERS MILL RD	013A 017F	075
0.37		STUMP RD	019	057
0.59		STUMP RD	011	060
1.87		STUMP RD	018	101
1.30	MONTGOMERY TOWNSHIP	SUMMER RIDGE DR	015L	042
3.92	MONTGOMERY TOWNSHIP	SUMMIT PL	015M	034
0.60	MONTGOMERY TOWNSHIP	SUNRISE DR	015G	005
6.51	MONTGOMERY TOWNSHIP	SUNRISE DR	015G	016
0.11	MONTGOMERY TOWNSHIP	TOREY CIR	003B	098
0.39	MONTGOMERY TOWNSHIP	TOREY CIR	003B	094
1.00	MONTGOMERY TOWNSHIP	TREE LINE DR	003B	097
1.45	MONTGOMERY TOWNSHIP	TREE LINE DR	003B	095
2.60	MONTGOMERY TOWNSHIP	TREE LINE DR	003B	092
2.15	MONTGOMERY TOWNSHIP	TWINING RD	014L	059
2.42	MONTGOMERY TOWNSHIP	TWINING RD	014L	058
2.13	MONTGOMERY TOWNSHIP	UPPER STATE RD	014Y	001
2.20	MONTGOMERY TOWNSHIP	UPPER STATE RD	014Y	032
1.19	MONTGOMERY TOWNSHIP	WALDEN LN	003B	096
5.87	MONTGOMERY TOWNSHIP	WELSH RD	009	076
		WESTGATE DR	015A	109
2.84 MONTGOMERY TOWNSHIP		WESTMINSTER DR	017B	051
476.21	Total Open Space Acres owned by Montgomery T	ownship		
0.01	COMMONWEALTH OF PENNSYLVANIA	HORSHAM RD	015	022
476.22	Total Open Space Acres owned by Public Entities		013	022
24.48	QUASI-PUBLIC MONTGOMERY TWP MUNICIPAL SEWER AUTH	01485 LOWER STATE RD	017	013
24.48	MONTGOMERY TWP MUNICIPAL SEWER AUTH	01485 LOWER STATE RD	017	013
1.15	MONTGOMERY TWP MUNICIPAL SEWER AUTH	HORSHAM RD	017 014P	066
1.00	MONTGOMERY TWP MUNICIPAL SEWER AUTH	KNAPP RD	006	013
8.00	MONTGOMERY TWP MUNICIPAL SEWER AUTH	LOWER STATE RD	000	040
0.48	MONTGOMERY TWP MUNICIPAL SEWER AUTH	ROYAL CT	017 018C	040
0.48	MONTGOMERY TWP MUNICIPAL SEVER AUTH MONTGOMERY TWP MUNICIPAL SEVER AUTH	UPPER STATE RD	0180	035
0.23			015 019A	035
60.04	MONTGOMERY TWP MUNICIPAL SEWER AUTH Total Open Space Acres owned by Montgomery T	WILLOWOOD CT Fownship Municipal Sewer Autho		090
	· · · ·	-	1 1	
22.08	NORTH PENN SCHOOL DISTRICT	01221 STUMP RD	015	008
	NORTH PENN SCHOOL DISTRICT	EAGLE LN	004	100
21.18	Total Open Space Acres owned by North Penn Sc	chool District		
21.18 43.26	Total Open Space Acres owned by North Fenn Sc			
21.18 43.26 2.70	NORTH WALES WATER AUTHORITY	00325 RICHARDSON RD	001	035

Figure 3-2 Table of Existing Protected Land (continued)

ACRES	OWNER	ADDRESS	BLOCK	UNIT
1.00	NORTH WALES WATER AUTHORITY	UPPER STATE RD	014	062
0.91	NORTH WALES WATER AUTHORITY	W LAWN AVE	004A	057
0.51	NORTH WALES WATER AUTHORITY	HEARTWOOD DR	005A	067
5.80	Total Open Space Acres owned by North Wales	Water Authority		
0.69	PHILA ELECTRIC CO	BETHLEHEM PIKE	003	028
1.48	PHILA ELECTRIC CO	BETHLEHEM PIKE	019	004
21.44	PHILA ELECTRIC CO	BETHLEHEM PIKE	018	009
21.44	PHILA ELECTRIC CO	BETHLEHEM PIKE	018	009
21.44	PHILA ELECTRIC CO	BETHLEHEM PIKE	018	009
21.44	PHILA ELECTRIC CO	BETHLEHEM PIKE	018	009
21.44	PHILA ELECTRIC CO	BETHLEHEM PIKE	018	009
0.90	PHILA ELECTRIC CO	COUNTY LINE RD	002	050
0.91	PHILA ELECTRIC CO	COUNTY LINE RD	002	098
25.35	PHILA ELECTRIC CO	DEKALB PIKE	011	034
16.00	PHILA ELECTRIC CO	HARTMAN RD	018	039
16.00	PHILA ELECTRIC CO	HARTMAN RD	018	039
12.23	PHILA ELECTRIC CO	HORSHAM RD	017	009
12.23	PHILA ELECTRIC CO	HORSHAM RD	017	009
0.68	PHILA ELECTRIC CO	STUMP RD	011	012
0.68	PHILA ELECTRIC CO	STUMP RD	011	012
1.80	PHILA ELECTRIC CO	STUMP RD	019	005
2.26	PHILA ELECTRIC CO	STUMP RD	018	008
0.53	PHILA ELECTRIC CO	WELSH RD	019	011
198.94	Total Open Space Acres owned by PECO			
308.04	Total Open Space Acres owned by Quasi-Public	Entities		

PRIVATE

	PRIVATE			
9.07	AHC PURCHASER INC	01089 HORSHAM RD	016	016
18.11	ARCHDIOCESE OF PHILA	01325 UPPER STATE RD	014	044
7.00	C/O B STILLWELL SUBURBAN PROP MGMT	VICTORIA DR	003A	073
7.00	C/O B STILLWELL SUBURBAN PROP MGMT	VICTORIA DR	003A	073
6.17	CUTLER GROUP INC	AVONDALE DR	010A	162
7.65	CUTLER GROUP INC THE	BUCKINGHAM LN	017D	037
0.00	DELASALLE HOMEOWNERS ASSOCIATION	NEWPORT LN	011D	042
0.00	DELASALLE HOMEOWNERS ASSOCIATION	SOCIETY CIR	011D	044
0.00	DELASALLE HOMEOWNERS ASSOCIATION	SOCIETY CIR	011D	043
2.23	FIVE POINT PLAZA CONDO ASSOC	APPLEWOOD LN	006D	049
16.00	GENERAL HANCOCK PARTNERSHIP	GENERAL HANCOCK BLVD	013E	160
16.00	GENERAL HANCOCK PARTNERSHIP	GENERAL HANCOCK BLVD	013E	160
1.59	GENERAL HANCOCK PARTNERSHIP	HORSHAM RD	013D	159
3.86	GWYNEDD POINTE HOMEOWNERS ASSN	ROLLING HILL DR	009A	001
3.86	GWYNEDD POINTE HOMEOWNERS ASSN	ROLLING HILL DR	009A	001
0.18	GWYNMONT FARMS UTILITY CORP	GWYNMONT DR	011A	020
8.82	GWYNWOOD POND INC	DAVIS DR	017C	041
0.00	HAMPTON GREEN INC	WARWICK WAY	009G	110
0.00	HAMPTON GREEN INC	WARWICK WAY	009G	110
2.23	HASSAN HARRY E & ANNE E	STAYMAN DR	013A	158
6.75	KIR MONTGOMERY 049 LLC	KNAPP RD	011C	004
2.23	KIR MONTGOMERY 049 LLC	WITCHWOOD DR	011C	006
1.13	LANSDALE LIONS CLUB	01046 KNAPP RD	009	055
7.24	MANOR HEALTH CARE CORP#494	00640 BETHLEHEM PIKE	003	018
9.65	MONTGOMERY BAPTIST CHURCH	BETHLEHEM PIKE	004	008
2.11	MONTGOMERY GLEN ASSN INC	INDEPENDENCE DR	014A	004
4.00	MONTGOMERY GLEN HOMEOWNERS ASSOC	HANCOCK CT	014B	049
3.00	MONTGOMERY GLEN HOMEOWNERS ASSOC	HOPKINS CT	014D	044
0.41	MONTGOMERY GREEN HOMEOWNERS ASSN	CROSS COUNTRY CT	015E	111

Figure 3-2 Table of Existing Protected Land (continued)

ACRES	OWNER	ADDRESS	BLOCK	UNIT
0.83	MONTGOMERY GREEN HOMEOWNERS ASSN	FILLY DR	015K	071
3.64	MONTGOMERY GREEN HOMEOWNERS ASSN	POLO DR	015E	193
3.88	MONTGOMERY GREEN HOMEOWNERS ASSN	STEEPLECHASE DR	015E	194
1.14	MONTGOMERY GREENE HOMEOWNERS ASSN	FILLY DR	015K	072
1.25	MONTGOMERY GREENE HOMEOWNERS ASSN	FILLY DR	015K	070
0.84	MONTGOMERY GREENE HOMEOWNERS ASSN	POLO DR	015E	110
	MONTGOMERY GREENE HOMEOWNERS			
1.17	ASSOC	STUMP RD	015E	195
4 47	MONTGOMERY GREENE HOMEOWNERS		0455	105
1.17		STUMP RD KNAPP RD	015E	195 012
2.69	MONTGOMERY SQUARE PARTNERSHIP	KNAPP RD KNAPP RD	011C	-
4.08	MONTGOMERY SQUARE PARTNERSHIP		011C	010 007
8.98 0.45	MONTGOMERY SQUARE PARTNERSHIP MONTGOMERY SQUARE PARTNERSHIP	WELSH RD WITCHWOOD DR	011C 011C	007
2.33	MONTGOMERY SQUARE PARTNERSHIP	00918 BETHLEHEM PIKE	011	003
2.33 7.02	MONTGOMERY TWP HISTORICAL SOCIETY	AVONDALE DR	010A	163
13.14	NESHAMINY PARTNERS LP	HORSHAM RD	010A 016	029
13.14	PAONE SAL INC	DYLAN DR	018 003C	029 069
4.77	PAONE SALING PENN GWYN LP	KINGSTON WAY	0030	089
4.77	PENN GWYN LP	KINGSTON WAY	016	099
4.77 0.31	PENN GWIN LP PINECREST COMMUNITY ASSOC	COUNTRY CLUB DR	018 002L	099 133
0.31	PINECREST COMMUNITY ASSOC	COUNTRY CLUB DR	002L 002L	133
0.42	PINECREST COMMUNITY ASSOC	COUNTRY CLUB DR	002L 002L	130
0.52	PINECREST COMMUNITY ASSOC	COUNTRY CLUB DR	002L 002L	132
0.73	PINECREST COMMUNITY ASSOC	COUNTRY CLUB DR	002L 002L	131
2.38	PINECREST GOLF CLUB INC	DOYLESTOWN RD	002L 002F	006
2.30 8.15	PINECREST GOLF CLUB INC	DOYLESTOWN RD	002F	000
10.41	PINECREST GOLF CLUB INC	DOYLESTOWN RD	0021 002F	004
14.21	PINECREST GOLF CLUB INC	DOYLESTOWN RD	0021 002F	003
32.00	PINECREST GOLF CLUB INC	DOYLESTOWN RD	002F	002
42.41	PINECREST GOLF CLUB INC	DOYLESTOWN RD	002F	001
2.20	PLEASANT JOHN W & CHERYL Z	AMBER PL	014P	001
2.07	QUANTUM HOTEL GROUP LLC	00615 COWPATH RD	003	055
0.00	SEE 46-00-01699-001	KENAS RD	016	013
3.68	SPRINGVILLE FARM LP	BAKER PL	015	089
0.00	T H PROPERTIES	NEWPORT LN	011D	041
1.25	T H PROPERTIES	NEWPORT LN	011D	046
0.00	WESTRUM CAMBRIDGE KNOLL LP	ADDISON LN	005G	066
0.00	WESTRUM CAMBRIDGE KNOLL LP	AILEEN DR	005G	068
3.00	WESTRUM CAMBRIDGE KNOLL LP	AILEEN DR	005G	067
11.00	WETHERSFIELD HOMEOWNERS ASSN INC	CLAREMONT DR	014X	160
21.54	WOOD HOLLOW CONDO	INDEPENDENCE DR	014A	001
0.00	WOOD HOLLOW CONDO ASSN	STOCKTON CT	014H	114
0.00	WOOD HOLLOW CONDO ASSN	STOCKTON CT	014H	114
0.00	WOOD HOLLOW CONDO ASSN	THORNTON CT	014H	113
0.00	WOOD HOLLOW CONDO ASSN	THORNTON CT	014H	113
1.64	WOOD HOLLOW CONDOMINIUM ASSOC	ADAMS CT	014K	137
2.54	WOOD HOLLOW CONDOMINIUM ASSOC	BRAXTON CT	014J	090
2.37	WOOD HOLLOW CONDOMINIUM ASSOC	JEFFERSON CT	014K	138
2.37	WOOD HOLLOW CONDOMINIUM ASSOC	JEFFERSON CT	014K	138
3.90	WOOD HOLLOW CONDOMINIUM ASSOC	MONTGOMERY GLEN DR	014A	003
2.09	WOOD HOLLOW CONDOMINIUM ASSOC	MORRIS CT	014J	089
393.33	Total Open Space Acres owned by private owners	S		
1,178	TOTAL ACRES			
1,170				

properly terminated, covenants require the landowner to pay roll-back taxes for the previous five years plus interest. Act 515 provides little to no long-term land protection. In Montgomery Township no properties are enrolled in Act 515.

INSTITUTIONAL

Institutional uses include schools and other educational facilities, churches and cemeteries, hospitals and life care facilities, prisons and museums. Montgomery Township has a substantial amount of recreational open space offered by several institutions and industries. Approximately 125 acres, comprising 1.8 percent of the township, are owned by several institutions. In addition, some industries have ball fields to which residents have access.

These open spaces differ from the municipally owned spaces because they may not remain open forever. Land use decisions for public schools are not made by the municipality. Therefore, as enrollment patterns in the region as a whole change, the local schools could be closed. When this happens, often schools are closed and used for other purposes, including offices or apartments, and the recreational and open space is lost. This has occurred repeatedly in the eastern parts of the county. Despite their temporary nature, these sources of open space are still important to Montgomery Township as they offer residents a greater range of choices to meet their recreational needs. They also add an aesthetic quality to the borough by opening up views and providing some relief to the largely developed landscape.

Public schools including Montgomery Elementary and Bridle Path Elementary provide much open space in the form of playing fields, basketball courts, and open fields.

While most of the institutional land serves as open space, both from a resource protection and an open view perspective, only the schools in the township provide areas of active recreation such as playing fields, playground, and open fields. Montgomery Township has one religious property that has a significant amount of undeveloped land. This is the Mary Mother of the Redeemer Church located on Upper State Road.

PRIVATE RECREATION OPEN SPACE

Besides the Pine Crest Golf Club, which is permanently preserved, the township only has one other large outdoor private recreation facility. This is a miniature golf course and driving range complex that was recently built on Upper State Road.

Figure 3 - 1 shows the location of the two temporarily preserved open space parcels discussed above.

SUMMARY

In total, Montgomery Township has a significant amount of protected land, with more than 1,178 acres being either permanently or temporarily protected. This land provides municipality residents with many opportunities to enjoy all that open space can offer – recreation, tranquility, beauty, and a sense of community. However, some of this open space could be lost to development in time if the land owners or land use changes. If the township acquires open and recreational land, residents can be assured that Montgomery Township will be able to offer them the same or greater level of active and passive open space as they enjoy today.

CHAPTER 4 INVENTORY OF POTENTIALLY VULNERABLE RESOURCES

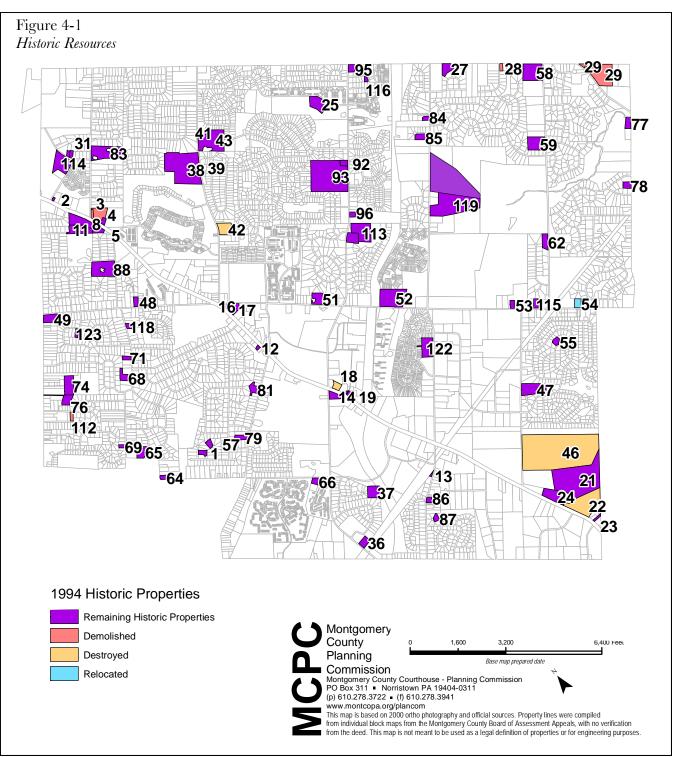
Although Montgomery Township has developed significantly during the past ten years, the township still has vulnerable resources that could be destroyed or damaged if further development occurs. These resources, which include historic buildings, scenic views and roads, steep slopes, farms, streams, wetlands, and wood-lands, are discussed below and shown on the accompanying maps.

HISTORIC AND CULTURAL RESOURCES

George Washington really did sleep in Montgomery Township, along with some of the Revolutionary Army. When Washington and his aides were moving from Valley Forge to Trenton, they stayed at the Knapp farmstead (#67 in Figure 4-1), which is on the National Register of Historic places. Other significant historic buildings in Montgomery Township include the Montgomery Baptist Church (#9?), which was founded in 1719 and is the earliest church of this denomination in the Montgomery County area; the Montgomery Square Methodist Church (#14); and the Free School Building (#19?), which was an early residence of Winfield S. Hancock, one of the heroes of the battle of Gettysburg.



The farmstead buildings, village houses, crossroad shops and important bridges demonstrate the considerable skills of craftsmen working with largely local materials. The proportion and design of these



historic, vernacular structures today are copied and imitated by modern builders with a worldwide source of materials and with extremely sophisticated tools. The functional beauty of the historic architecture and bridges of rural Southeast Pennsylvania is widely appreciated by both township residents and by visitors from throughout the United States. Farmhouses, barns, wagon sheds, associated outbuildings and bridges were built largely from stone, brick and lumber from the local area, and in some cases from materials found entirely within the township. The various structures were critical to the area's agricultural operations on the surrounding land; for housing the extended farm family, draft animals, livestock, equipment and implements, as

Figure 4-2 *Historic Resources*

No.	Address	Property Owner 2005	Condition	Status February 2005
1	103 Aspen Place	Bunch, David		
2	577 Bethlehem Pike	Formica, William A. Jr.		age in question! (Wireless phone company)
3	601 Bethlehem Pike	JLM Real Estate LLC	Demolished	Demolished in 2002 (?)
4	611 Bethlehem Pike	Franklin Montg. Assoc.	Demolished	Demolished in 2002 (?)
5	509 Bethlehem Pike	Callahan, Bonnie L. &		Dead truck driver crashed into building causing minor dam-
		Wroblewski, Kathleen R -		age 2004
		Trustees.		
-	Bethlehem Pike			Home
	Bethlehem Pike			Church
	Bethlehem Pike			
	Bethlehem Pike			
13	Bethlehem Pike			Developed as Montgomery Square Shopping Center. Building rehabbed as Bank
14	Bethlehem Pike			Church - Cemetery relocated in 2004.
15	Bethlehem Pike			Abat Auto Tag
16	Bethlehem Pike			Was Gen. Hancock Antiques - vacant in 2004
17	Bethlehem Pike			Fabric Store - this was the old school.
18	917 Bethlehem Pike	General Hancock Properties, LLC	Destroyed	Lancaster Dress ShopDestroyed by Fire in 1999.
19	925 Bethlehem Pike	Ski Properties LP		This was the school where Gen. Hancock's father was a teacher. Now a ski shop
21	Bethlehem Pike			Property currently for sale - Cutler has plans pending.
22	Bethlehem Pike		Destroyed	Destroyed by Fire in 1996 (?)
23	1109 Bethlehem Pike			
24	Bethlehem Pike			
25	300 Claremont Drive			
27	County Line Road			Land development - must confirm existence
28	County Line Road		Demolished	Demolished
29	1900 County Line Rd		Demolished	Truck ran into home causing extensive damage. Demol- ished in 2003
31	116 Crystal Road	Wenzel, Denise M.		
32	114 Crystal Road	Mannon, Charles G.		
33	391 DeKalb Pike	Hampton Green Inc.	Demolished	Demolished - This was the small house (one-time Bar?) near Knapp Road.
34	DeKalb Pike	Hampton Green Inc.	Demolished	Demolished - was Green Baron Nursery
35		Hampton Green Inc.		Vacant house and Barn - incorporated into Hampton Green Development
36	104 DeKalb Pike			Converted to office building
37	1142 Knapp Road			Address changed from DeKalb Pike. Owned by Historical Society President.
38	Doylestown Road	Cooper, William		Qualifies for Historical Preservation Development.
39	101 Grays Lane			
	501 Doylestown Road			Alleged to be a log structure.
42	Doylestown Road		Destroyed	Destroyed by fire - Log structure. Site of future township firehouse.
43	495 Doylestown Road	Hurd, Jesse J. III		Qualifies for Historical Preservation Development.
44	Hartman Road	,	Demolished	Demolished
45	Hartman Road		Relocated	JOHN ROBERTS HOUSE - relocated to Joseph Ambler Inn in 2003
46	Hartman Road		Destroyed	Destroyed by fire
	Hartman Road	Aschenbrand, Jean		
	509 Cowpath Road			Originally a single room schoolhouse.
-			1	

Figure 4-2, continued *Historic Resources*

No.	Address	Property Owner 2005	Condition	Status February 2005
49	1819 N. Line Street	Spence, Michael		Corner of Cow Path Road and Line Street.
51	953 Horsham Road	Archibald, James		Built by Joseph Ambler. Was Parcel No. 46-00-01156-013
52	1005 Horsham Road			"Joseph Ambler Inn"
53	1079 Horsham Road			Originally a single room schoolhouse.
54	1123 Horsham Road	Prousi, Steven A.	Relocated	relocated to Joseph Ambler Inn - Subdivision, split from Parcel No. 46-00-01093-004
55	101 Browning Circle	Cooney, Dennis		Subdivision from Parcel No. 46-000-1066-004.
56			Demolished	Demolished
57	115 Jason Place			
58	Kenas Road			Land development plans submitted under Historical Preservation Ordinance.
59	1492 Kenas Road			Brick house.
61	Kenas Road			Incorporated into Windlestrae Park. Home is rented by township.
62	1145 Kenas Road			
63	Kenas Road		Demolished	Demolished. Developed by Cutler Group - Raven Hollow
64	133 Knapp Road			
65	107 Knapp Road			
66	Knapp Road			
67	1142 Knapp Road	Montgomery Township Historical Society	Preserved	Knapp Farm
68	1106 Lansdale Avenue			
69	904 Lansdale Avenue			
71	1204 Lansdale Avenue			
74	Line Street			
75	1411 N. Line Street			
76	Line Street			
77	1501 Lower State Rd			Property currently for sale
78	1307 Lower State Rd			
79	513 North Wales Road			Need to confirm existence of old structure.
81	623 North Wales Road			
83	202 Richardson Road	Moser, Edward		Partially Log structure. Being developed under Historical Preservation Ordinance
84	1301 Stump Road			Need to confirm existence of old structure.
85	Baker Place	Springville Farm LP		Being developed under Historical Preservation Ordinance
86	276 Stump Road	Fahey, Thomas		Subdivided
87	102 Willowood Court	Okhovat, Mohsen		Subdivided - "Col. Selser Home"
88	1425 Taylor Road	Charter Oak Construc- tion Inc.		Being developed under Historical Preservation Ordinance
89	Upper State Road	need to confrim ad- dress and owner		Birthplace of Gen. Winfield Scott Hancock. Developed under ECPOD Ordinance
92	Upper State Road			
93	Upper State Road			Mary, Mother the Redeemer R.C. Church. Restored farmhouse and springhouse.
94	1124 Upper State Rd			
95	Upper State Road			
96	1210 Upper State Rd			
112	N. Line Street		Demolished	Demolished - confirm parcel no may have been block 5/91
112	IN. LINE SUPER		Demonshed	Demonshed - commini parcerno may have been block 5/91

Figure 4-2, continued *Historic Resources*

No.	Address	Property Owner 2005	Condition	Status February 2005
113	Upper State Road			converted to office. Qualifies for Historical Preservation Development
114	Crystal Road			converted to apartments. Qualifies for Historical Preservation Development
115	1103 Horsham Road			House demolished. Barn remains
116	113 Horseshoe Lane			Split from Parcel No. 46-00-03967-001
118	1315 Lansdale Ave			
119	Stump Road			Qualifies for Historical Preservation Development. Potential park- land
122	521 Stump Road			Home rehabbed into The Village Tavern; Barn rehabbed into Bank
123	113 Heartwood Drive			Need to confirm existence of old structure.

well as for providing work spaces for domestic tasks such as washing, butchering and food preservation as well as getting these goods to markets near and far. The self-sufficiency of the family farmstead is still an admired quality in Montgomery County. The farm buildings that remain are visual reminders of valued past lifestyles. Some of the non-farm buildings from the township's history are also still standing. Churches, an inn, schoolhouses, an old stonearch bridge, and old stores also tell other parts of the story of the township.

While the first homesteaders were very independent, they quickly discovered they needed not only the companionship and advice of others nearby, they realized they needed to work together to accomplish projects of benefit to a wider community. Churches, roads, bridges and, a little later, schools were often communal projects. Some roads and bridges were also the result of individual entrepreneurs who charged tolls on their "turnpikes." Bethlehem Pike, Limekiln Pike and DeKalb Pike are the major such roads in Montgomery Township. Over



the years, these roads have been replaced many times and, unless buried beneath the current roads, there remain few traces of this history. The one most apparent remnant of this era, however, is the stone arch bridge at Limekiln Pike and Lower State Road, built in 1838.

Today, we are still building private and community projects and we will always ask how to pay for them and how sturdy to build them. Preservation of these resources is important because, among other reasons, these historic structures can help us to make those decisions.

"Those who cannot remember the past are condemned to repeat it."

- George Santayana

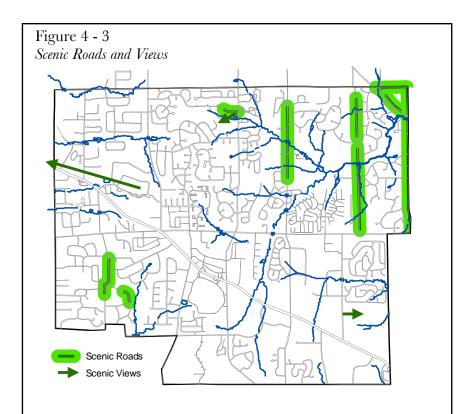
For resources of historic value, preservation of these resources in their historic landscape is important for maintaining the value as a historic resource and sometimes for retaining township or neighborhood character.

Montgomery Township has nearly 73 buildings that are over 100 years old. The location of these buildings is shown in Figure 4-1, and each building is listed in Figure 4-2. Montgomery once had many more old buildings, but many of these have been torn down to make room for new development. The map and list include a few non-building historic resources such as the stone bridge for Limekiln Pike in the Eureka area. Since the last Open Space Plan there have been some successes and some losses. The Knapp farmhouse has been preserved and the farm has been developed; Indian Lake, a farmhouse with a historic log portion, has been approved to develop the land around and behind the farmhouse but preserving the farmhouse, the pond and the view of the farmhouse from the road; a few historic buildings have been destroyed by fore or demolition. One house has even been relocated, but remains in the township.

Perhaps most importantly, in the 1990s, the Township adopted a special zoning ordinance that gives developers a small, but effective, bonus if they retain and rehabilitate a historic building. This has worked to save at least five, potentially six, historic buildings to date without incurring costs to the Township or to the Historic Society. Additionally, these buildings stay in private hands where resources may be more reliable over the long term than the public sector.

SCENIC RESOURCES

Montgomery Township no longer has a large number of scenic roads, since most of the roads in the township have new development along them. The most scenic road in the township is Lower State Road, which fronts a number of open fields, still has a rural character, Limekiln Pike extends this scenic character up to County Line Road. Other scenic roads include Kenas Road, part of Stump Road, the





Scenic view of Spring Valley Park natural area

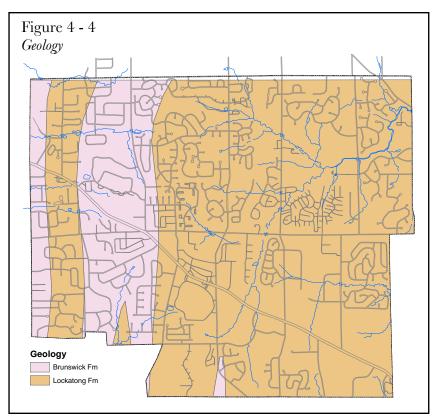
Photo: MCPC

mature tree canopy of the Claremont Drive median trees, a segment of Lansdale Avenue, and a segment of Pecan Drive.

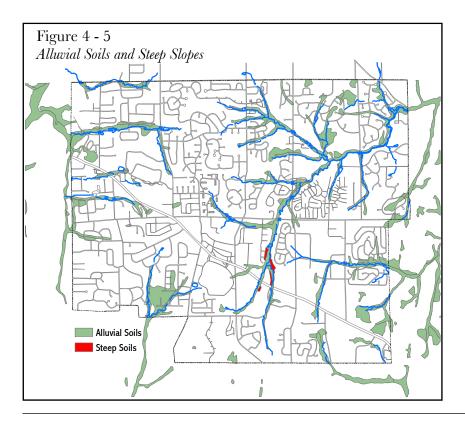
Because of the township's amount of development and relatively flat character, Montgomery has few scenic views. Hartman Road, looking towards the east, currently has some scenic views across open fields and along the power line, although the field views will probably disappear once the agerestricted development is built. A long range view from the Pinecrest Golf Course towards Hatfield is the longest view in the township. The view of the natural part of Spring Valley Park is perhaps the most beautiful one in the township. Figure 4-3 shows the location of scenic roads and vistas in Montgomery Township.

GEOLOGY

Except for surface outcrops, bedrock geology is unseen, and as a result its influence on natural features is not always acknowledged. However, the influence is both strong and pervasive, for bedrock geology is the foundation of an area. Bedrock, along with the hydrologic cycle, is responsible for the changes in elevation, steep slopes, location of watercourses, and orientation (orientation, in turn,



will influence vegetative communities, soils, and availability of sunlight). The bedrock or parent material has a great influence on the type of soil formed. For example, hard, igneous bedrock has resulted in soils with a high stone and boulder con-



tent. Groundwater yield differs from one bedrock formation to the next. In Montgomery County, the difference ranges from under 1 gallon per minute (gpm) to over 30 gpm.

Two types of Triassic Shale formations, as shown in Figure 4 - 4, are found in Montgomery Township -Brunswick and Lockatong. The Brunswick formation is present in the western portion of the municipality. Brunswick is characterized by reddish brown shale, mudstone, and siltstone. The topography of this formation is distinguished by rolling hills. Groundwater yields vary, although secondary openings such as joints and fractures can provide adequate flows.

The Lockatong formation forms a prominent ridge, several miles wide, which runs from Mont Clare north to the border with Montgomery Township. Lockatong underlies the largest area of the township and consists of dark gray to black dense, hard shale (agrillite) intermixed with beds of impure limestone and other types of shale. These rocks are hard and resist weathering. Generally, the Lockatong formation exhibits low ground water yields.

TOPOGRAPHY

Montgomery Township consists of flat land and gently rolling hills with very few steep slope areas.

The Soil Conservation Service (SCS), in its <u>Soil Survey</u> for Montgomery County, has four classifications for slopes: 0 to 3%, 3 to 8%, 8 to 15%, and 15 to 35%. Not all sloping areas fit neatly into these four classes of slopes, and slopes do not always exhibit the same characteristics. Usually, as the slope increases, the depth of topsoil and the ability of the soil to support structures decreases.

Generally, 0 to 8 percent slopes are suitable for institutional, industrial, commercial, and residential development. Residential development is also suited for 8 to 15 percent slopes. Only large lot residential development should be allowed on 15 to 25 percent slopes, as the lot size allows flexibility in siting the building structure away from steep slopes. Any slope above 25 percent should be used for parks, forests, and open space.

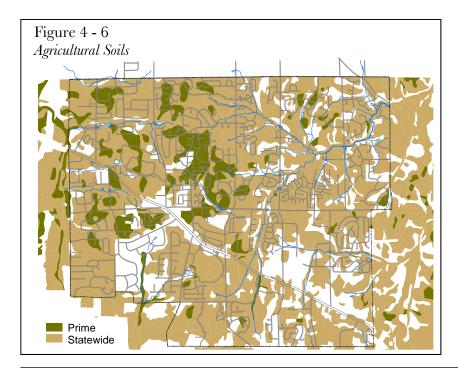
Steep slopes are slopes with a grade of 15% or greater and are natural features of the landscape which cause limitations to development and provide community character. Steep slopes are also environmentally sensitive areas. The slope and soils present on steep slopes are in balance with vegetation, underlying geology and precipitation levels. Maintaining this equilibrium reduces the danger to public health and safety posed by unstable hillsides.

Steep slopes often have a combination of vegetation, climate, soil and underlying geology that differs from the surrounding area. Frequently, this means that the environmental sensitivity of the steep slopes are different as well. Susceptibility to erosion and mass movement may be greater than the surrounding area, especially if vegetation is removed. Increased runoff and sedimentation from disturbed slopes require increased public expenditure for flood control, water quality, and stormwater management. Also, different species of plants and the associated wildlife that depends on these plants may be present only on the slopes, creating unique natural habitats and recreation opportunities.

The SCS <u>Soil Survey</u> shows that Montgomery Township has very few steep slopes. These are located along the southern portion of Little Neshaminy Creek, near Route 309. Areas with slopes greater than 15% are shown in Figure 4 - 5. Development has occurred near these steep slope areas.

SOILS

Soils are a natural assortment of organic materials and mineral fragments that cover the earth and support plant life. The composition of soils changes slowly over time, due to weathering of rock and



activity of soil organisms. As a consequence, soils vary with respect to depth to bedrock, depth to groundwater, color, mineral characteristics, fertility, texture, and erodibility.

Though soils are diverse, soil scientists have classified the soils found in Montgomery County into several groups called soil series. Soils listed within the same series will display similar subsurface characteristics. The surface characteristics of soils within a particular series can vary in slope, degree of erosion, size of stones, and other easily recognizable features.

Soils are one of the most influential natural features. The soils in Montgomery Township are a result of the hydrology and the weathering capacity of the underlying geology. They are also influenced by the orientation of the land and the types of vegetation that grow in them. Conversely, the type of soil influences the vegetative cover of the land, which effects the quality and quantity of surface and groundwater, wildlife diversity, rates of erosion, and the aesthetic quality of the landscape.

Detailed information on soils is available in the Montgomery County Soil Survey, completed by the Soil Conservation Service of the U.S. Department of Agriculture in 1967.

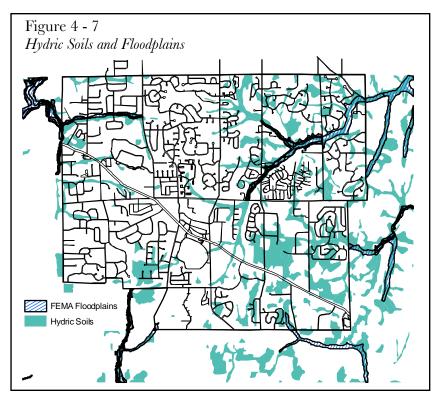
Two specific characteristics of soils, their agricultural importance and water table depth, are discussed in detail below.

AGRICULTURAL SOILS

The agricultural capability of soil is measured based on fertility, depth to bedrock and groundwater, texture, erodibility, and slope. Class I and II soils are the best soils for agriculture. They include deep, well drained, and moderately sloped soils that can support high yields of crops with little management.

In Montgomery Township, there are no class I soils; however, the township does have extensive class II soils, which are shown in Figure 4 - 6. These are mostly located in the western half of the township in areas that are already developed.

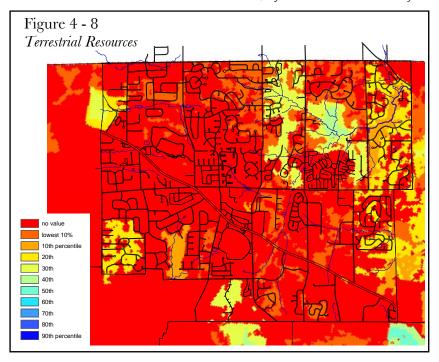
Montgomery Township also has many areas with soils that are of statewide importance. These soils support cultivation but require careful crop management. Other portions of the township have soils that are best used for pasture and woodlands.



HIGH WATER TABLE (HYDRIC) SOILS

Figure 4 - 7 demonstrates that large portions of the township have a seasonal high water table, which means that the water table ranges from 0 to 3 feet below ground level.

These soils are periodically wet and in an undrained condition that often support the growth of wetland vegetation. As a result, in an undisturbed, undrained condition, hydric soils are almost always



wetlands, with a seasonal high water table at or near the surface, and therefore are subject to regulation by the U.S. Army Corps of Engineers and the Pennsylvania Department of Environmental Protection (DEP). However, since not all hydric soils are found in undrained conditions, especially in more urban locales, not all hydric soils develop wetland vegetation. Other soils that have hydric components are found in depressions, bottomlands, swales, drainageways and alluvial soils. Hydric soils should not be developed for several reasons such as erosion potential, seepage from septic systems into the groundwater, and the difficulty to build solid foundations.

Therefore, land with hydric soils may be more attractive, or at least more economical, for open space preservation or open space uses. As seen on the map, these soils are concentrated in the eastern portion of the township.

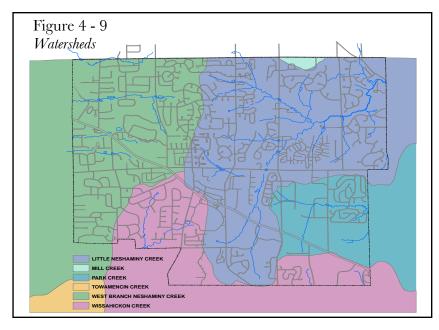
TERRESTRIAL RESOURCES

The Natural Lands Trust, with funding from the PA Department of Conservation and Natural Resources, the PA Department of Environmental Protection and The William Penn Foundation, has compiled a Piedmont Region map-based and regionally prioritized database of natural conservation resources called SmartConservation[™].

SmartConservation[™] is a critical conservation planning tool for regional assessments. Policy-makers and conservation practitioners can use this tool to make educated decisions about how to prioritize between conservation projects, thereby focusing conservation dollars for the maximum impact. A variety of criteria evaluate a site's ecological assets, conservation potential, and development threat. These science-based criteria reflect the input of the region's best aquatic specialists, botanists, community planners, conservationists, herpetologists, ornithologists, and mammologists.

Figure 4 - 8, Terrestrial Resources, is an excerpt from the SmartConservation[™] regional terrestrial resources map. That map is the result of combining and scoring the following terrestrial resources:

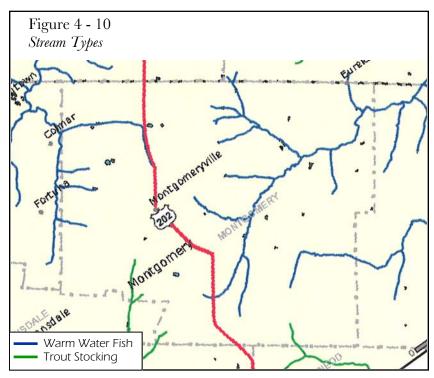
- Steep Slopes
- Interior Forest Habitat
- Natural Vegetation Habitat Blocks
- Contiguous Grassland Habitat Blocks



Contiguous Scrub/Shrub or Barrens Habitat
Blocks

The map in Figure 4 - 8 shows that most of Montgomery Township has little or no regional value for terrestrial conservation resources. However, some areas rank somewhat higher, reaching as high as the 50th percentile, such as in Windlestrae Park, putting that land in the top 50% of all land in the region with regard to its value as terrestrial resources.

This map indicates what parts of the township would be most suited, from a regional perspective,



to open space preservation to protect natural terrestrial habitat for many plant and animal species.

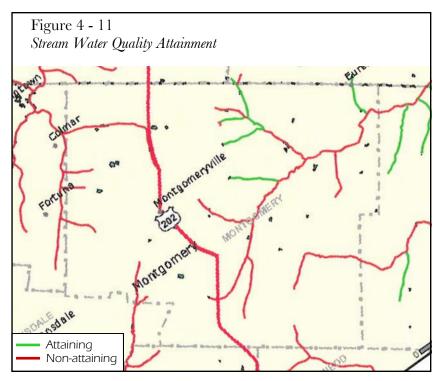
SURFACE WATERS, HYDROLOGY, AND WETLANDS

Water is a valuable resource, consumed by people and industries, enjoyed at recreation facilities, employed in the assimilation of treated sewage, and integral to the landscape. The average rainfall in the county varies from 43 inches near City Line Avenue to 47 inches in the vicinity of the Green Lane Reservoir. It should be noted that in any given year, annual precipitation can vary from the average by as much as ten inches. In Montgomery Township, 28% of precipitation becomes direct runoff, 60% evaporates or is transpired by plants, and 12% replenishes groundwater.

SURFACE WATERS

The surface water that falls on or is carried through Montgomery Township affects the topography, soils, vegetation, and groundwater. The major surface water features in Montgomery are creeks, and the primary creek in the township is the Little Neshaminy Creek; however, portions of Park, Trewellyn, Wissahickon, and the West Branch of Neshaminy Creek also fall into the township.

Little Neshaminy, Park, and Trewellyn Creeks, along with a portion of the West Branch of Neshaminy Creek, have a 100-year floodplain along most of their length. This floodplain can affect the health, safety, and welfare of Montgomery's residents. Although the floodplain is dry much of the time, it stores and conveys floodwater during a storm. Development within the floodplain should be avoided since it reduces the carrying capacity and increases the height and destructive ability of floodwater. In addition to carrying flood waters, the floodplain and stream corridor serve other important functions. The condition of the stream corridor itself is important in minimizing erosion and water pollution, protecting water quality (temperature and velocity), and providing animal habitat and recreation opportunities. Well-vegetated corridors will reduce pollutant loads to streams, shade the stream, and provide habitat for wildlife. If vegetation is preserved along the banks of feeder streams as well as the main stem, pollutant loads are greatly reduced. Wetlands that filter and impede stormwater and provide a habitat for aquatic life are frequently



found along the corridor. Unconsolidated gravel and stone deposits along the corridor allow for groundwater recharge.

Figure 4 - 7 shows Montgomery's floodplains. These floodplains are comprised of 100-year floodplains and alluvial soils.

Alluvial soils are frequently, but not always, located within a floodplain and are not suitable for development because of flooding during high water periods. These soils have been deposited by flowing water and are not stable as a result of their texture and composition. The presence of alluvial soils is only one indicator of a floodplain. Alluvial soils do not, however, indicate the probability of recurrence of a flood (for example, a 100-year flood). An important aspect of alluvial soils is that they often form aquifer recharge areas.

WATER QUALITY

Pennsylvania, as required by the Federal Clean Water Act, has established water quality standards that apply to all streams and other waterbodies in the Commonwealth, including the creeks located in Montgomery Township. The water quality standards, codified in Title 25 PA Code Chapter 93, establish water quality criteria that need to be maintained to protect designated water uses.

Discharges to waters of the Commonwealth are

evaluated to assure that water quality standards are complied with. Where needed, effluent or other discharge limitations are established to assure that water quality criteria are achieved and designated uses protected. Non-point source discharges are required to incorporate Best Management Practices.

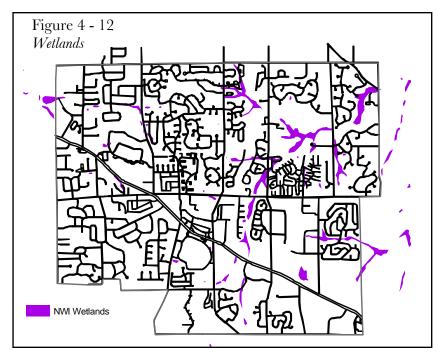
The Pennsylvania Department of Environmental Resources (DER) classifies streams according to the type of wildlife they can support. The cleanest streams, which are those with the least amount of pollution, are called exceptional value waters. Montgomery Township does not have any streams falling into this category. The next cleanest level is cold water fishes streams. Once again, Montgomery does not have any streams falling into this category. Next, come trout stocking streams. Wissahickon Creek and its tributary, Trewellyn Creek, fall into this category. Finally, there are warm water fishes streams. Little Neshaminy Creek its tributary, Park Creek, and the West Branch of the Neshaminy Creek all fall into this category. These creeks drain most of the township's land. Figure XX shows the location and designation of the township's streams.

GROUNDWATER

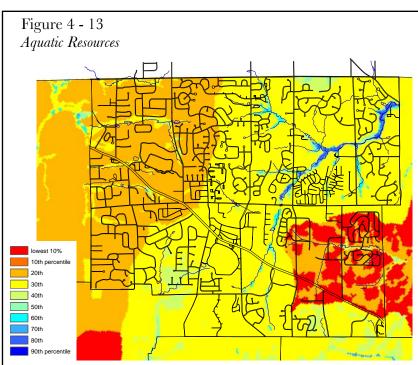
Groundwater behaves much like surface water, flowing like a stream, only much slower. Groundwater is tapped as a source of drinking water and for industrial purposes where surface water is unavailable. Montgomery Township is partially dependent on groundwater for its water supply. This makes the area somewhat vulnerable. In the case of an emergency, there is an alternative source of water supply if groundwater becomes contaminated. Groundwater replenishment occurs slowly, as precipitation and in some cases stream water seeps through the soil, down to the aquifer. Open, undisturbed land is essential to groundwater recharge. Vegetation serves to retain precipitation where it falls, allowing it to soak into the soil rather than run off the surface. Impervious surface from development prevents infiltration of precipitation.

WETLANDS

Many of the township's stream corridors contain wetlands. Wetlands have value and are worthy of protection due to a number of characteristics. However, it is easier to discuss the benefits of wetlands than it is to delineate the wetland itself. Some wetlands are easily recognizable by most people because the presence or influence of water is obvious.



However, many wetlands are subject only to seasonal flooding. For much of the year, surface water may not be present. Still other wetlands develop in areas where the soil is saturated for long periods, but never flooded. The Environmental Protection Agency and the Army Corp of Engineers have defined wetlands as, "Those areas that are inundated or saturated by surface or groundwater at a frequency and duration sufficient to support and under normal circumstance do support, a prevalence of vegetation typically adapted for life in saturated soil conditions."



Depending on where they are located, wetlands may serve one or more beneficial functions. Almost all wetlands provide habitat for birds, amphibians, and fish. These in turn support other wildlife. Wetlands also mitigate flooding, by holding back floodwater and slowing stream velocity. Wetlands improve water quality, too. As water flows through a wetland, it slows and drops much of its sediment load. In addition, nutrients that can cause algae blooms and other pollution problems are taken up by wetland vegetation. Wetlands located in depressions often encourage infiltration of stormwater, contributing to groundwater recharge.

Figure 4 - 12 shows where wetlands might be located in Montgomery Township, based on hydric soils identified in the Montgomery County Soil Survey; however, this map is only a general guide of where wetlands might exist. Specific, comprehensive wetlands studies must be done for individual parcels before any development occurs.

AQUATIC RESOURCES

Figure 4 - 13, Aquatic Resources, is an excerpt from the SmartConservation[™] regional aquatic resources map. That map is the result of combining and scoring the following aquatic resources:

- National Wetland Inventory
- Hydric Soils
- Floodplains
- Forested Water Quality
- Riparian Buffer Quality
- Water Quality from DEP's Unassessed Waters 303 [d] List
- Headwaters Protection
- Impervious Cover (2000)
- Impervious Cover Change (1985 2000)

The map in Figure 4 - 13 shows that Montgomery Township has a full range of regional value for aquatic conservation resources. Some areas, particularly along the Little Neshaminy Creek, rank high, reaching as high as the 70th percentile, putting that land in the top 70% of all land in the region with regard to its value as aquatic resources.

This map indicates what parts of the township would be most suited to open space preservation to protect natural habitat for aquatic species and water quality.

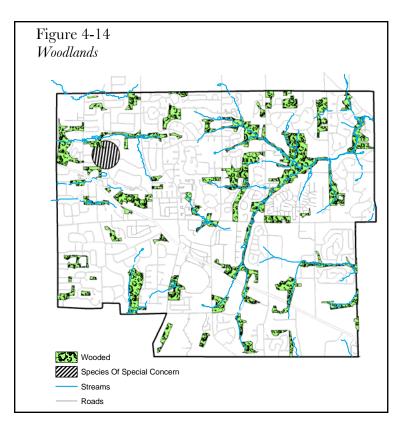
VEGETATION

Montgomery Township has a variety of wildlife habitats, including the four habitats normally found in this portion of the Piedmont region. These include deep woodlands, riparian woodland corridors, upland fields, and wetlands.

Wetlands were discussed above. Upland fields, generally, consist of farms or the edge of farmfields and fallow fields. Deep woodlands, which are woodlands at least 300 feet from open land, and riparian woodlands, which follow streams, are shown, along with all other wooded land and hedgerows, in Figure 4 - 14.

Woodlands, comprised of a dense forest of hardwoods, once covered 99 percent of Montgomery County. Oaks were the dominant species, but chestnut, tulip poplar, hickory, ash, red maple, and dogwoods were also present. Several hundred years of clearing and cultivation, and in more recent times the rapid development of houses and commercial facilities, have reduced woodlands to a shadow of their former extent. The principle types of woodlands remaining in the county are:

Red Oak - About 60% of all remaining woodlands. Northern Red Oak is predominant, but Black, Scarlet and Chestnut Oak are also abundant.



Ash/Maple/Elm - About 19% of all woodlands. Local mixtures will vary, and include minor species, such as the Slippery Elm, Yellow Birch, Black Gum, Sycamore, and Poplar.

Eastern Red Cedar - 18% of the county's wooded acres are covered with this species and associated species: Gray Birch, Red Maple, Sweet Birch, and Aspen.

Sugar Maple/Beech/Yellow Birch - The remaining three percent of woodlands is comprised of this association. Associated species include Red Maple, Hemlock, Northern Red oak, White Ash, and Tulip Poplar.

Woodlands and hedgerows serve many purposes, both functional and aesthetic. These areas provide habitat for many animal and plant species, control erosion, clean the air, protect privacy, provide windbreaks, cool the air in the summer, reduce the impact of rainfall, muffle noise, absorb odors, and improve the appearance of an area. Because of all of these benefits, woodlands and hedgerows improve the quality of life of a community and usually increase property values.

The species of tree found within woodlands depends on the soil, slope, and orientation. For instance, as a result of the short period of solar exposure, the soils on north facing slopes will tend to be cooler and moister than on south facing slopes. Trees growing on north slopes tend to be softwoods (evergreens such as Pines and Hemlocks) while the south slopes tend to have hardwoods (deciduous trees such as Oak and Beech). Different species of trees attract different types of wildlife. In general, the more diversity in vegetation, the more species of animals it can support.

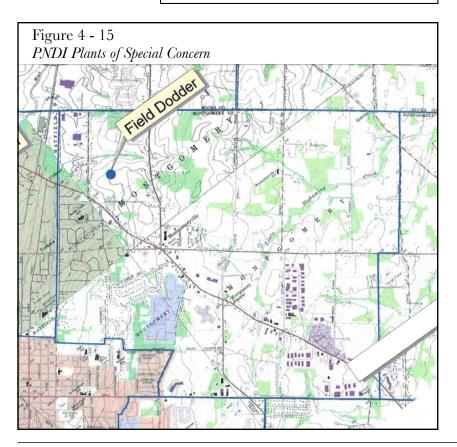
The distribution of woodlands in Montgomery County can be described in three different patterns. Small, widely scattered stands can be found east of the central county ridge, often strung along alluvial soils. Long, linear stands along streams and on alluvial soils are typical in the central part of the county. Large forested blocks of land, often hundreds to thousands of acres in size, are found on ridges in the central and northern areas of the county.

Approximately 35% of the county's woodlands are located on soils that provide an excellent site for trees. From a commercial standpoint, the returns from woodlands on these soils justify expenditures for forest management programs. The remaining woodlands are on soils that provide a good to poor site for woodlands. Woodlands are probably still the best use for the poorer soils, as those soils also have a low value for cropland and agriculture.

Montgomery Township has a large amount of forested land cover, with a large concentration in the northeast section of the township, bounded by Horsham Road, County Line Road, Upper State Road, and Lower State Road, and in the Montgomery Township Natural Area. Please refer to Figure 4 - 14. In addition, many of the residential developments in the township have preserved some trees



Field Dodder, Cuscuta pentagona Photo:copyright © 1980-2002 by Curtis Clark



around the edges of the developments. These wooded areas, however, are not usually capable of supporting the flora and fauna typically found in deep woodlands.

SPECIES OF SPECIAL CONCERN

There are significant natural areas in Pennsylvania that provide benefits to the residents of the state by purifying groundwater, controlling erosion, maintaining plant and animal diversity, providing educational opportunities, and containing scenic vistas. In order to plan for the wise use of these natural areas and the important resources they contain, the Pennsylvania Natural Diversity Inventory (PNDI) was established in 1982 as a joint venture of The Nature Conservancy, the Pennsylvania Department of Environmental Resources, and the Western Pennsylvania Conservancy. The PNDI has become Pennsylvania's chief storehouse of information on outstanding natural habitat types, sensitive plant and animal species, and other noteworthy natural features.

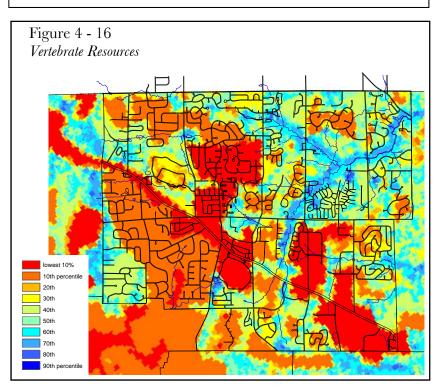
The PNDI specifically identifies the best natural areas and the location of all known animal and plant species "of special concern" (i.e. endangered, threatened, or rare). Currently, as of May 2005, Montgomery Township contains one specific area on the PNDI and one general area, see Figure 4 - 15. The specific area contains a plant species of special concern, the Field Dodder, Cuscuta pentagona. The status of this plant is "tentatively undetermined" at the state level and has no current legal status. According to an introduction to an internet web page for Britton and Brown Illustrated Flora, 2nd Edition, published in 1913, the Field Dodder may be one of many plants with "substantial therapeutic use, either pharmaceutical or herbal, ..." or may have "widespread former or current Native American use." The University of Nebraska, Omaha, uses this plant to teach biology students because it "is a rootless and leafless vine that, unlike most plants, performs very little photosynthesis. To make a living, Cuscuta infests a host plant, from which it derives water, minerals and food resources. Several physiological changes have accompanied Cuscuta's adaptation to the parasitic habit, particularly with respect to growth and metabolism. Students will be introduced to standard molecular and biochemical techniques used in physiological research and will apply these toward understanding how Cuscuta has adapted to life as a parasite." The approximate location of this plant is delineated in figure 4 - 15.

WILDLIFE SPECIES OF SPECIAL CONCERN

In addition to that specific PNDI location, Red-bellied Turtles, Pseudemys rubriventris, have been identified by the Pennsylvania Fish and Boat Commission to exist in or near Montgomery Township. They provided the following important information about these turtles. "The Red-bellied Turtle is one of Penn-



Eastern Red-bellied Turtle



sylvania's largest native aquatic turtles and is restricted to the southcentral and southeastern regions of the Commonwealth. The continued existence of this turtle is threatened by habitat destruction, poor water quality, and competition with aggressive non-native turtle species that share its range and habitat (e.g. Red-eared Slider, Trachemys scripta elegans). Red-bellied turtles are known to inhabit relatively large, deep streams, rivers, lakes and marshes with permanent water and ample basking sites. Near to and within [Montgomery Township], the turtles are known to use Neshaminy Creek and Peace Valley Reservoir and their surrounding areas and tributaries. Because the turtles are highly mobile and are known to travel significant distances, these use areas could include waterways and water impoundments within the [township]. Of special concern would be any waterways and impoundments that have direct connections to Neshaminy Creek (such as, but not limited to, Little Neshaminy Creek) or to Peace Valley Reservoir."

VERTEBRATE RESOURCES

Figure 4 - 16, Vertebrate Resources, is an excerpt from the SmartConservation[™] regional potential vertebrate resources map. That map is the result of combining and scoring the following vertebrate resources:

- Potential Mammals Conservation Value
- Potential Fish Conservation Value
- Potential Herps Conservation Value
- Potential Birds Conservation Value
- Important Bird Areas (PA Audubon Society)

The map in Figure 4 - 16 shows that Montgomery Township has a full range of regional value for potential vertebrate conservation resources. Some areas, particularly along the Little Neshaminy Creek, rank high, reaching as high as the 70th percentile, and some spots even reaching the 80th percentile, putting that land in the top 70% and 80% of all land in the region with regard to its value as potential vertebrate resources.

This map indicates what parts of the township would be most suited to open space preservation to protect natural habitat for many kinds of vertebrates.

COMPOSITE CONSERVATION RESOURCES

Figure 4 - 17, Composite Conservation Resources, is an excerpt from the SmartConservation[™] regional composite conservation resources map. That map is the result of combining and scoring the following composite conservation resources:

- All the resources of the Terrestrial Resources Map
- All the resources of the Aquatic Resources Map
- All the resources of the Vertebrate Resources
 Map
- County Natural Areas Inventory and Rare Plants

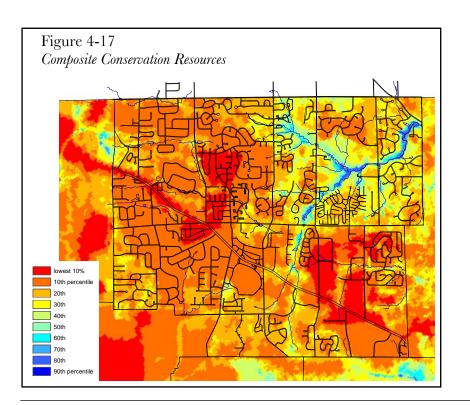
The map in Figure 4 - 17 shows that Montgomery Township has a full range of regional values for composite conservation resources. Some areas, particularly along the Little Neshaminy Creek, rank high, reaching as high as the 70th percentile, and some areas even reaching the 80th percentile, putting that land in the top 70% and 80% of all land in the region with regard to its value as potential vertebrate resources.

This map indicates what parts of the township would be most suited to open space preservation to protect a variety of natural habitats for many kinds of plants and animals.

SUMMARY

Cultural, natural, and scenic resources will only become more vulnerable as redevelopment continues. New development should enhance resources and preserve local character. Efforts to protect historic structures and benefits from the Historic Preservation Overlay District will help protect the character of Montgomery Township.

The constant amount of development in the township leaves ever fewer historic, cultural and natural resources remaining for preservation or protection. Past efforts of the township have protected valuable stream corridors and woodlands. To enhance these features, further protection of these remaining resources should be developed. The enhancements could help to increase historic preservation, groundwater infiltration, protect surface water quality, and provide more and improved habitat for native birds and other animals and for native plant species.



CHAPTER 5 potential open space linkages

An important aspect of open space is the accessibility of that space to community residents and to the region as a whole. This section of the plan identifies potential open space linkages that can tie together open space sites within the Township and connect to open space in adjacent communities. Such connections help form a more comprehensive open space system for residents and contribute to the creation of a more effective and enjoyable regional network. They can increase the accessibility of parks by allowing off-street pedestrian and bicycle access and can offer recreational opportunities in and of themselves as passive, natural recreational space. Open space connections can also increase natural species diversity by increasing the safe, natural passage of animals to various types of environments that are needed for different life functions and stages. This type of connection we will call a natural corridor.

Some connections already exist; usually by virtue of simple adjacency. However, this chapter will identify as many potential connections, or linkages, as possible. Examples of potential linkages include utility corridors, stream valleys, abandoned rail lines, sidewalks, potential routes through future development on currently undeveloped land, and similar linear features.

Identification of potential linkages on a regional

level will help to contribute to Montgomery County's vision of a Countywide Trail System as well as foster intermunicipal trail linkages that can be mutually beneficial to residents of all the municipalities involved.

These linkages can take various forms: from simple, undeveloped, natural land to dirt paths, to sidewalks, to equestrian trails, to paved multi-purpose trails or other configurations. The purpose of the connection, the constraints and opportunities of the land, and the disposition of its owners will determine the final form and location of these connections. This chapter will discuss the possibilities and suggest some form and location for these connections, however, information is not as detailed as necessary to make any final determinations. As implementation proceeds, the suggestions herein may change significantly.

COUNTY TRAILS

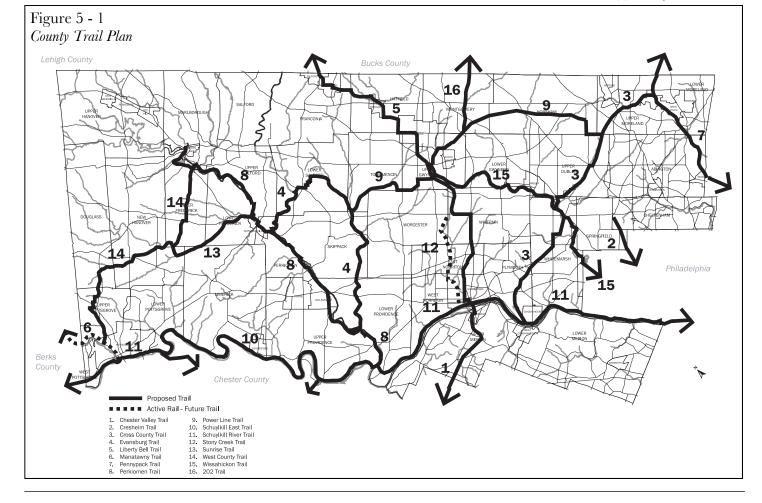
There is one Montgomery County trail that is planned to cross Montgomery Township. Construction of and connection to this trail would afford Worcester residents access to almost a hundred miles of trails throughout the county, to other counties and all the way to Center City Philadelphia. The County trail system is shown in Figure 5 - 1. Note the potential connection of Montgomery Township via the Powerline Trail to a major hub in the County network in Upper Gwynedd and, in the other direction, to the Cross County Trail. Access to that hub and the Cross County Trail affords access in multiple directions throughout the county and beyond.

POWERLINE TRAIL

The County has planned for this regional trail to connect from the Evansburg Trail in Evansburg Park all the way to Upper Moreland Township and connect there to the County's planned Cross County Trail. This route directly involves Montgomery Township from the Gill tract along the Horsham border to the area of DeKalb Pike (Rt 202) and Welsh Road (Rt 63).

The Powerline Trail has one very large obstacle to cross in Montgomery Township, the 4- to 6-lane, divided highway, Bethlehem Pike (Rt 309). This obstacle is so daunting that county trail planners do not believe even the traffic signal crossing at Stump Road would work as a trail crossing. As a result, the Powerline Trail is currently expected to leave the close alignment with the PECO powerlines, instead paralleling Bethlehem Pike and the proposed Route 202 Bypass/Parkway and then, after crossing Bethlehem Pike as part of the bridge along with the bypass/parkway, rejoining the PECO alignment.

The Powerline Trail will not only provide access to distant destinations, but also to many nearby destinations. The "hub" area in Upper Gwynedd is the



location of Merck Pharmaceuticals, the county's largest employer with over 10,000 employees. Many of those are probably Montgomery Township residents. Also near the "hub" is a fantastic natural preserve, the Gwynedd Wildlife Preserve. Other destinations in this westerly direction from Montgomery Township are the village center of North Wales, the Nor-Gwyn Pool in the Upper Gwynedd municipal complex and the Lansdale School of Business. In the other direction, to the east, there are many parks in Horsham Township.

Just as the Powerline Trail will allow Montgomery residents to access other places, so too, will it allow residents of other municipalities to access destinations in Montgomery Township. This might be particularly appealing to businesses near the bypass/ parkway crossing of Bethlehem Pike since the trail might bring many new people, particularly hungry, thirsty, or health- or recreation-conscious ones, near their businesses.

The Powerline Trail is also an essential piece of the township's overall loop-shaped system. This piece will allow residents of the township to completely encircle the township or to access any one of the many public open spaces, especially the new park at the Gill quarry as well as other parks connected by other trails, such as the Horvath tract park, Windlestrae Park and Bark Park.

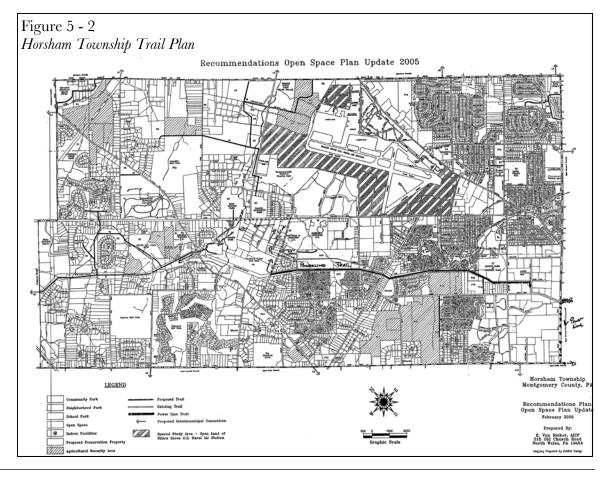
NEIGHBORING MUNICIPAL TRAILS

Almost all of the neighboring townships also have plans for trails in their townships that connect open spaces. Several of these trails come near Montgomery or are intended to allow for an extension into Montgomery Township.

These potential connections for Montgomery Township are described below.

HORSHAM TOWNSHIP

Horsham Township has an ambitious trail network plan that includes off-road multi-use trails, on-road bike lanes and various other trail types throughout the township. They have already accomplished a major portion of the network by constructing a large segment of a multi-use trail though their township. It is located in the alignment of the County's Powerline Trail, which is expected to cross the southern corner of Montgomery Township as well.



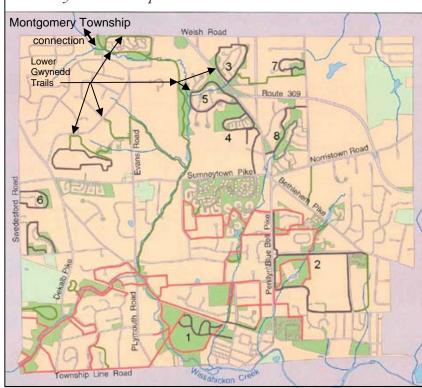
Possible connections for Montgomery Township to and from Horsham Township's trail network are shown in Figure 5 - 2.

LOWER GWYNEDD TOWNSHIP

Lower Gwynedd Township also has a trail network plan. Their plan includes a trail segment that continues to the Montgomery Township boundary on Welsh Road. If the Montgomery trail system connected to this part of the Lower Gwynedd system, Montgomery residents, workers and visitors would have the benefit of the facilities at Oxford Park, which has an entrance directly across from Montgomery Township along Welsh Road, and, following the trail a short distance along the Trewellyn Creek, the nature center. Further along the trail system are several other open spaces, parks and trail segments. Refer to Figure 5 - 3 for an overview of this area.

Lower Gwynedd has an extensive existing horse trail network. Eventually, the township proposes to expand this system. The township's 1988 park plan shows a trail ending at Welsh and Stump roads. This is not far from the PECO corridor that runs through Montgomery Township.

Figure 5 - 3 Lower Gwynedd Township Trail Plan with Potential Connection



Lower Gwynedd Township Park and Trail Facilities

- Oxford Park
- Softball field
- Playground
- Picnic Area

Lower Gwynedd Trail System:

- Dager Road Trail
- Cedar Hill Trail
- Trewellyn Reserve Trail
- Trewellyn Estate Trail
- North Penn Oak Drive Trail
- Wooded Pond Trail
- Centennial Park Trail

Penllyn Woods:

- 2 Little League fields
- 1 90' baseball field
- Soccer field
- Multipurpose field
- Picnic pavilion
- Walking trails

Penllyn Park:

- Baseball field
- Basketball court
- Playground
- Walking trail
- Picnic pavilion

Ingersoll Park:

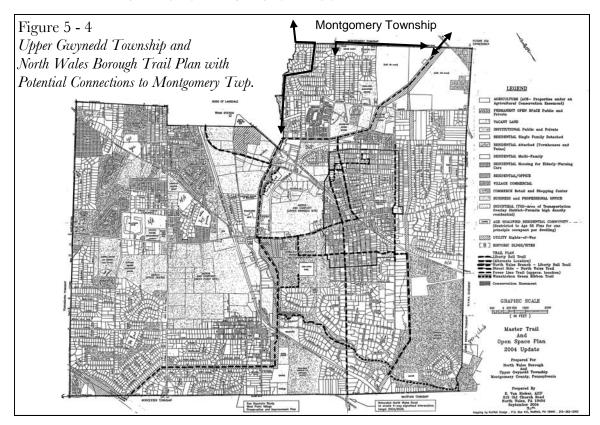
Baseball fields

UPPER GWYNEDD TOWNSHIP

Thanks to the crossings of three County trails Upper Gwynedd Township is kind of a "hub" for trail users in Montgomery County. If Montgomery Township residents and visitors could reach that hub, they could travel in any of five other directions to many destinations in the region. The Powerline Trail and the trail in the Township's Natural Park, through Lansdale, are potential linkages to that tremendous resource (see Figure 5 - 4).

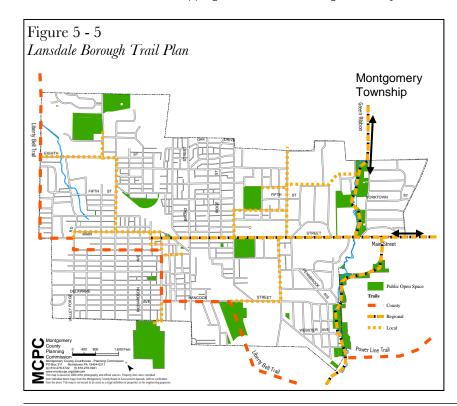
In addition to these connections to the county trail system, Upper Gwynedd Township has pedestrian and bicycle destinations of its own that would interest Montgomery Township residents, visitors and workers, such as the Merck facilities, the schools, and parks.

Therefore, Montgomery Township would like to work with Upper Gwynedd Township as much as possible to accomplish and improve these connections.



LANSDALE

As the historic and infrastructure center of the North Penn region, Lansdale has destinations that would interest Montgomery Township residents, visitors and workers. The Lansdale train station, Main Street shopping, recreation and dining, and many civic



and religious functions, not to mention the open spaces and parks, are some of the many reasons Montgomery Township residents would want to use a trail to get to and from Lansdale.

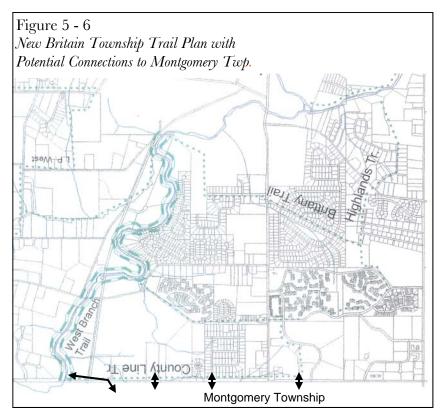
Possible connections for Montgomery Township are along the Wissahickon Creek to and from Montgomery's Natural Park and along Main St./Welsh Road, as shown in Figure 5 - 5.

HATFIELD TOWNSHIP

According to the 2006 Hatfield Borough and Hatfield Township Open Space Plan, while Hatfield Township has several trails either existing or proposed, none of them approach the boundary with Montgomery Township. The Montgomery Township trail network already extends to Whistlestop Park in the (north)eastern corner of Hatfield Township. This could be a potential future trail connection area for Hatfield Township. Hatfield's trails show up on Figure 5 - 8, the Composite of Neighboring Trail Plans.

NEW BRITAIN TOWNSHIP

New Britain Township is planning an extensive trail network, especially in the area near Montgomery Township. In fact, one segment of the network is

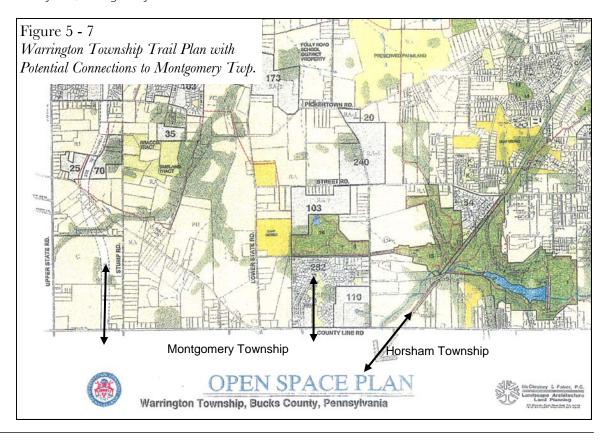


planned to be along County Line Road, which is the boundary between the two townships, making a connection possible with a simple road crossing. If Montgomery Township connected to New Britain's trail system, Montgomery residents would have access to the various facilities in and near New Britain. Possible connections for Montgomery Township are shown in Figure 5 - 6.

WARRINGTON TOWNSHIP

Connections to Warrington Township's trail system will depend on changes in to the current plan for their network since none of the trails are currently planned to connect directly to Montgomery Township. Their current plan is also does not reflect more recent plans for a multi-use trail along the future Route 202 Parkway, the Parkway Trail, which would be the one direct connection to Warrington Township. The one connection indicated in the plan is to the corner of Horsham Township along the Little Neshaminy Creek. If Montgomery, Horsham and Warrington achieve a trail along the Little Neshaminy, a significant link could be achieved that connects Windlestrae Park to several other significant destinations. There are, however, a few other locations that come close to Montgomery. These suggest locations toward which the Montgomery trail system could be extended to the boundary to facilitate future linkages.

Possible connections for Montgomery Township are shown in Figure 5 - 7.



COMPOSITE OF NEIGHBORING TRAIL PLANS

Figure 5 - 8 provides a composite view of the trails most relevant to Montgomery Township that are proposed by neighboring communities and the potential linkages.

COUNTY PARKS

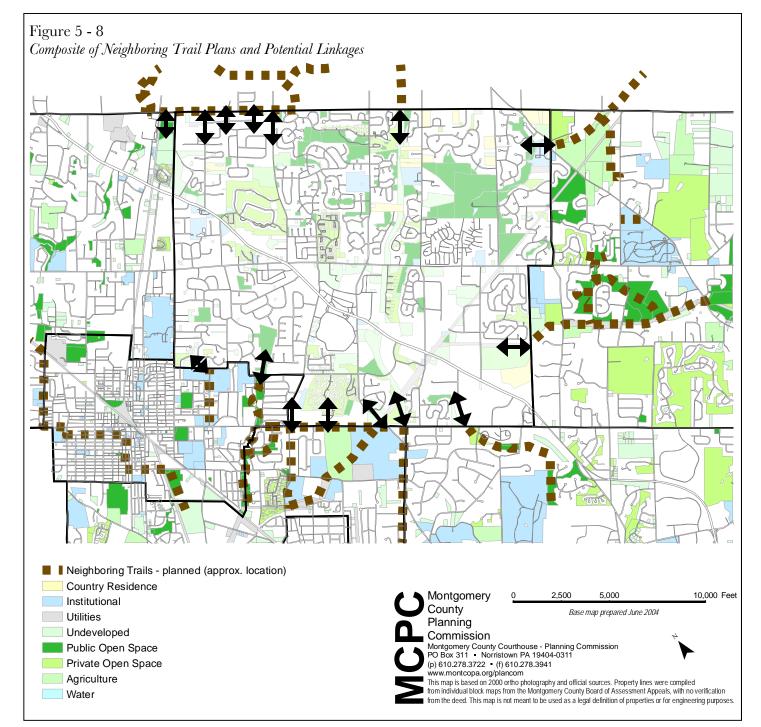
While Montgomery County has no active, passive or historic parks in Montgomery Township or the

neighboring municipalities, Bucks County does. With trail connections to the two neighboring Bucks County townships, Montgomery residents could access these facilities, too.

BUCKS COUNTY FACILITIES

Dam 611 "Bradford Reservoir":

- Flood control
- Fishing
- Picnicking
- Nature study



Peace Valley Park:

- Playground apparatus
- Picnicking
- Hiking
- Horseback riding/trails
- Boating
- Fishing
- Nature study
- Ice skating

Tile Works (The Moravian Pottery & Tile Works):

- Historic Mercer tile factory
- Educational programs
- Picnicking
- Hiking

Churchville Nature Center:

- Nature programs and workshops
- Evening programs
- Club activities
- Nature study/areas
- Bird watching
- Horseback riding
- Hiking
- Biking

Playwicki Park:

- Playground apparatus
- Picnicking
- Hiking
- Play areas
- Sport fields
- Fishing

LINKAGES WITHIN MONTGOMERY TOWNSHIP

Montgomery Township has a number of natural and man-made features that can be used for trails, especially for ones that link different parks together. The most prominent potential linkage is Little Neshaminy Creek and its tributaries. This creek runs through the Township municipal complex and Windlestrae Park. A tributary of the creek connects with Spring Valley Park. Some open space has been preserved along this creek by developments, especially between Kenas Road and Limekiln Pike. Horsham Township has proposed a walking and hiking trail along its portion of Little Neshaminy Creek, and this trail will connect with a proposed hard surface trail.

Other streams in the township, besides the Little Neshaminy Creek, could be used for trails. A tributary of the West Branch of Neshaminy Creek could have a trail along it, as could the Wissahickon, Trewellyn, and Park Creeks. Horsham Township proposes to have a hard surface trail along the PECO power line, which parallels Park Creek. Potential stream open space linkages are shown in Figure 5 - 8.

In addition to stream corridors, other linear features in Montgomery Township could be used for trails and open space linkages. Existing utility corridors would probably be the easiest to use. Montgomery Township is crossed by a couple of PECO transmission lines, as shown in Figure 1 - 5. One of these, as mentioned above, is proposed to be used for a trail corridor in Horsham Township and connected to the county trail "hub" in Upper Gwynedd Township.

The right-of-way that has been preserved for the proposed Route 202 Expressway could also be used for a trail, especially if PADOT does not choose to build on this corridor. Even if a highway is built in this corridor, a trail could coexist in the corridor. This has been done successfully in a number of places across the country.

In its recent plans, Montgomery Township has proposed to create a trail system that uses some of these creek and utility corridors as well as existing and new parkland, streets and sidewalks. The entire proposed trail system is shown in Chapter 10.

SUMMARY

There are many potential open space linkages for Montgomery Township. There are internal connections that can be made between destinations within Montgomery and there are connections that can be made to networks and destinations right at or near the township boundaries. Linkages are one of the most effective and economic means to improve access to parks and recreation opportunities for Worcester residents. These linkages also serve relatively well for expanding or preserving natural habitats by keeping natural areas connected.

For these reasons the Township has determined the creation, acquisition and development of these linkages a high priority. Some of the trails are shortterm priority and some are envisioned as more longterm. These are specified in the recommendations and implementation chapters at the end of this plan.

CHAPTER 6 **ANALYSIS OF UNPROTECTED RESOURCES**

As outlined in chapter four, important vulnerable resources such as floodplain, steep slopes, woodlands, scenic views, and historic sites are found in the Township. This chapter identifies areas where they are not permanently protected and proposes priorities for their future preservation. Generally, the priority categories are based on the extent of resources found in a given area, particularly where a concentration exists, their location and contribution to community identity, and the open space goals established in chapter two.

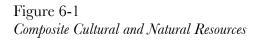
COMPOSITE MAPS

COMPOSITE CULTURAL AND NATURAL RESOURCES

In Chapter 4 many resources were shown to exist in Montgomery Township. It can be useful for future open space preservation to understand what pieces of land have the most value in terms of the amount of resources that could be preserved, protected or restored on that land. For this reason many of the resources shown in Chapter 4 have been combined together onto one map, Figure 6 - 1, to identify lands which have multiple resources located at or near the same place. The map shows a concentration of resources along the township's streams. Even many of the historic properties are located near streams.

MOST VULNERABLE CONSERVATION RESOURCES

Of course, just because several resources are located at the same location does not necessarily mean they are the most important resources to be preserved or protected. In Chapter 4 three maps were presented which showed the regional conser-



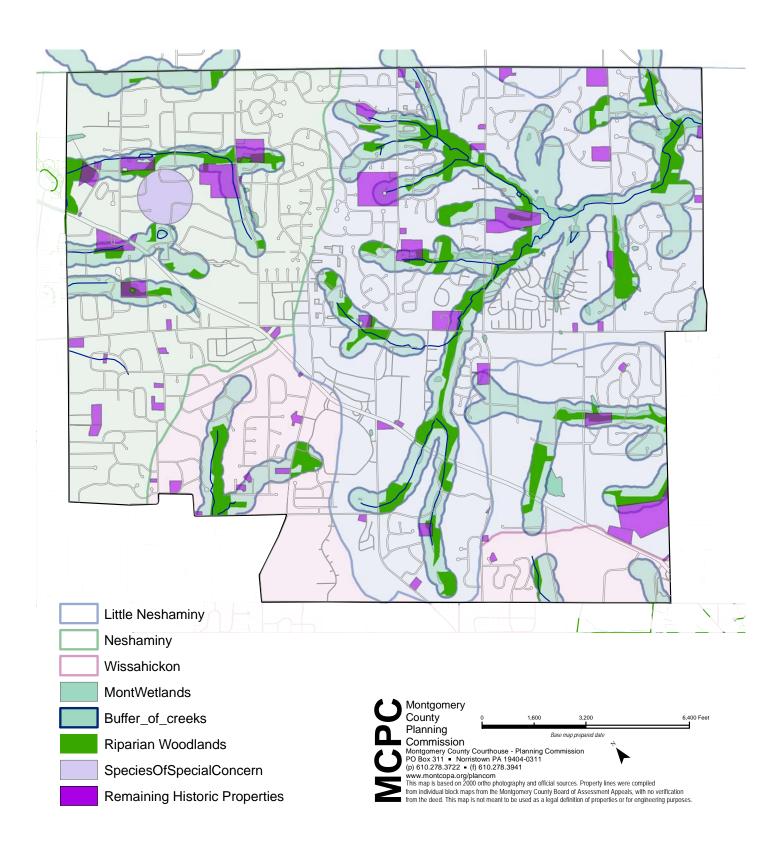
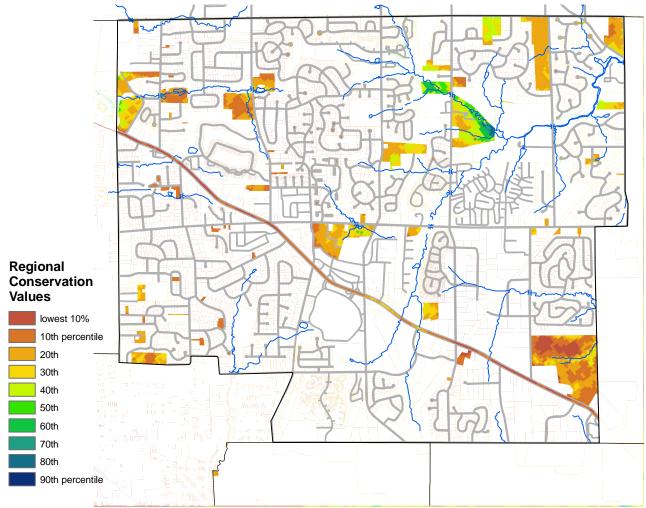


Figure 6-2 Most Vulnerable Conservation Resources



vation values of all the land in the township: Terrestrial Resources, Aquatic Resources, and Potential Vertebrate Resources. The Natural Lands Trust produced the maps for the region and the maps in Chapter 4 were excerpts from those maps. The natural Lands Trust also produced a map which combines all the values of these three maps plus the values of a fourth map for species of special concern. That map is Figure 4 - 17.

While useful to understand the vast amount of various resources in the township and also to help understand the value of township-wide preservation efforts such as conservation ordinances, this map can also be overwhelming. To simplify understanding where the township might act most effectively and most directly in the future, all parcels which have been developed, as well as any land that has been preserved or is owned by the public, have been rendered white, creating a new map, Most Vulnerable Conservation Resources (Figure 6 - 2), showing the areas that could be subject to future Township action. This map removes a lot of information, allowing the township to focus on specific areas of the township or specific properties for conservation efforts.

This map indicates what specific properties would be most suited to open space preservation to protect a variety of natural habitats for many kinds of plants and animals.

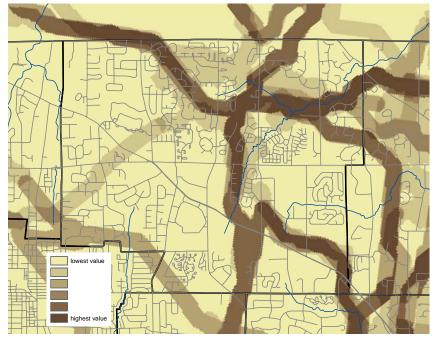
NATURAL CORRIDORS MAP

In addition to the analysis and valuation of the conservation resources, Natural Lands Trust has taken the data and analysis one step farther and has computed what can best be described as the natural corridors of least resistance between the region's major natural habitat areas. Figure 6 - 3 shows the results of that analysis for the area in and around Montgomery Township. The darkest areas are wide lines. These are the corridors identified by computer analysis where animals would be safest and find the most food and shelter as they move from one large habitat area to another during their various life functions and life cycles.

In Montgomery Township most of these corridors are concentrated in the east, along the Little Neshaminy, in Windlestrae Park, and along the future Route 202 By-pass/Parkway. The highest value area is around the elementary school where several corridors cross.

This map implies additional importance for land in the dark areas as part of these corridors. In addition, the barriers along these corridors need to be removed, diminished or bridged. For example, one major corridor crosses 309. Somewhere in or near the dark area, provisions should be made for wildlife to cross or go under 309. So, too, should other barriers, such as the other major roads, be managed or improved to facilitate the movement of animals through the township with the least amount of conflict with humans (i.e. accidents) as possible.

Figure 6-3 Natural Corridors



COMPOSITE MAP OF EXISTING PROTECTED LANDS, VULNERABLE RESOURCES, AND HABITAT CORRIDORS

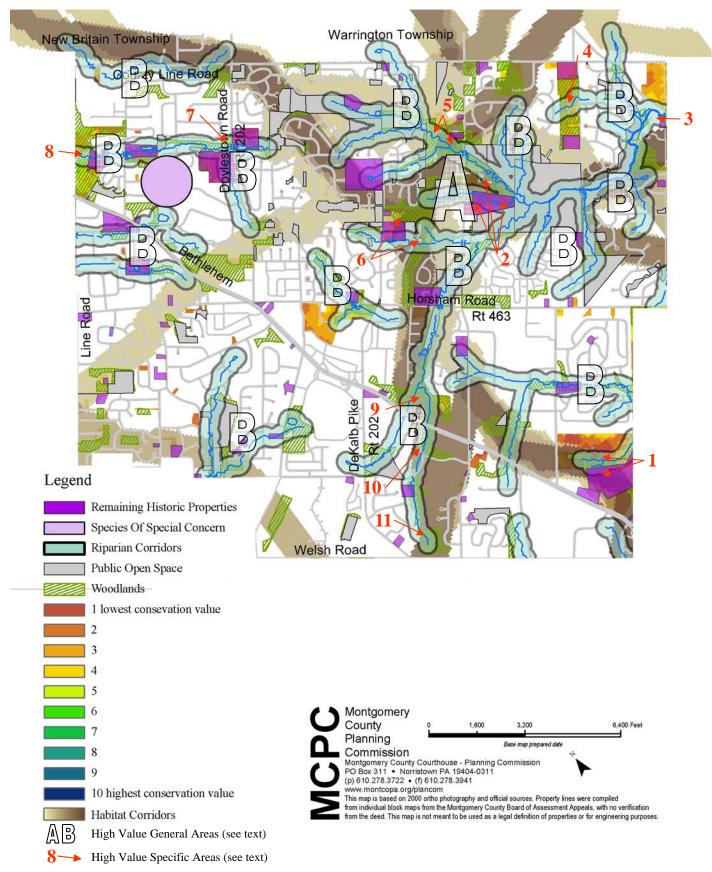
The maps in Figures 6 - 1 through 6 - 3 each show different kinds of valuable township resources. To simplify understanding where the township might act most effectively and most directly in the future, these maps were combined and all parcels which have been developed, as well as any land that has been preserved or is owned by the public, have been rendered white, creating a new map, Most Vulnerable Composite Township Resources (Figure 6 - 4), showing the areas that could be subject to future Township action. This map removes a lot of information, allowing the township to focus on specific areas of the township or specific properties for conservation efforts.

The Most Vulnerable Composite Township Resources Map shows that the resources appear to be spread throughout the township, with a concentration focused in the area in and near Windlestrae Park and along the streams, particularly the Little Neshaminy Creek. However, at least one of the vulnerable resources can be found in almost every part of the township.

Additionally, this composite map shows the importance of having good resource protection ordinances in place which cover the entire township, so that as future development takes place, the resources throughout the township are afforded some level of protection. However, the Township may wish to provide more comprehensive protection by having control over the management of resource lands in certain situations. For example, there are instances where two or more of the resources overlap on the map and the township could protect multiple resources within one property. This might make that property a higher priority for protection.

Protection of resource lands may also complement other land preservation purposes. This may occur when a property that the township may be considering for active recreation or farmland preservation also has a concentration of significant natural resources worthy of protection.

Figure 6 - 4 Most Vulnerable Composite Township Resources Map



Montgomery Township 2006 Open Space Plan Chapter 6: Analysis of Unprotected Resources

Therefore, it can be quite useful to compare the natural resource values between two pieces of property. For example, a property that has three resources overlapping (i.e. alluvial soils, woodlands, and buffer area) might have a greater relative value than a piece of property that contains only high water table (hydric) soils. This analysis should also take into account the fact that the township does not value all resources equally. For example, the preservation of farmland is a significant township goal, and since floodplains already have a certain amount of protection with existing land use regulations, if all other things are equal, the farmland will be a higher priority than the floodplain preservation.

Primarily, however, this map is very useful to direct Township action at a specific location as well as to understand the overall value township-wide actions can have on individual or multiple resources. For example, if the Township were considering a historic preservation program or ordinance, the map shows that historic resources are found in many parts of the township, often with other resources at the same location. Also, a stream restoration program or a riparian corridor ordinance might serve to protect many resources at once, since many of the resources are located in, along or near the creeks.

MOST VALUABLE LOCATIONS OF RESOURCES

GENERAL AREAS

As previously mentioned, there are several general areas that are most vulnerable for conservation of the township's most valuable resources:

A. In and near Windlestrae Park

B. Along the streams, particularly the Little Neshaminy Creek.

SPECIFIC AREAS

Figure 6 - 4 also points out several specific areas that are most valuable for conservation of the township's resources:

- 1. The Gill tract
- 2. The Zehr tract
- Municipal Authority and Steever Mill creekway area
- 4. Kenas Road properties
- 5. Stump Road properties

- 6. 202 Parkway and Marra and Connelly properties
- 7. Hurd and Cooper farms
- 8. Fox tract
- 9. Hopkins tract and nearby creekway
- 10. Witchwood area
- 11. 202 Parkway and PECO powerline area

SUMMARY

Montgomery Township's natural resources have been analyzed in combination in order to identify areas with concentrations of resources. These areas were combined and the developed or preserved areas removed to identify the areas of unprotected resources in the township which would yield the highest concentration or value of resources if protected.

This chapter will serve as the analytical basis for the recommendations and implementation set forth at the end of the plan.

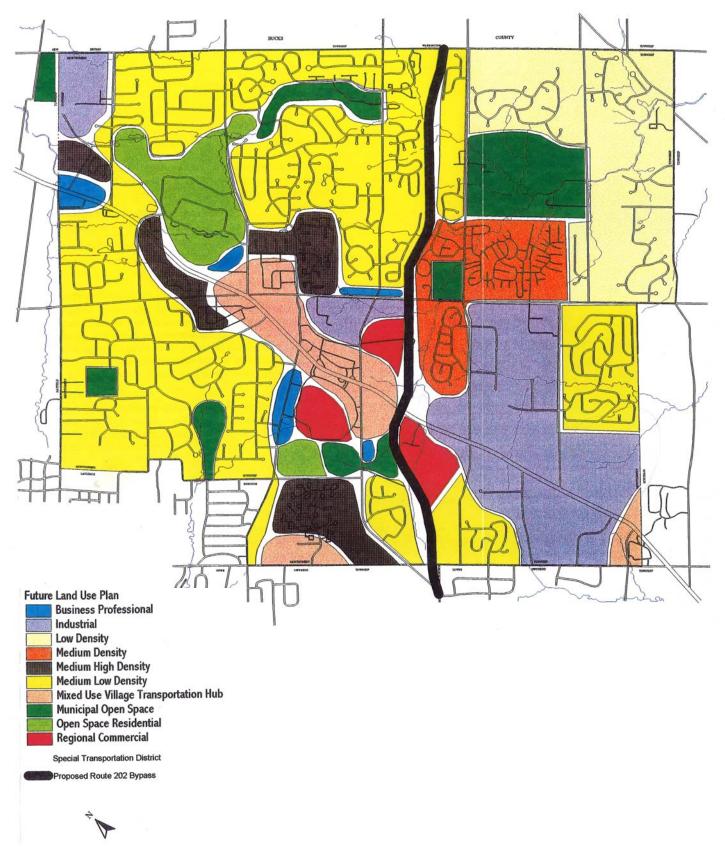
CHAPTER 7 EVALUATION OF GROWTH

In addition to establishing open space preservation areas, it is important to identify areas that can accommodate any projected community growth. Over the past decades, Montgomery Township has become a suburban township. In an effort to plan for the future, Montgomery has adopted a new Comprehensive Plan in 1999. The 1999 plan delineates future revitalization areas, a special transportation district, as well as areas to be preserved for open space. The Future Land Use Plan from the Comprehensive Plan is shown in Figure 7 - 1.

BUILD-OUT ANALYSIS

The Future Land Use Plan adopted as part of the 1995 Comprehensive Plan outlines the Township's desired growth patterns, and Montgomery's current zoning technically meets the minimum standards described in that plan. However, a good amount of growth has already happened.

As mentioned in Chapter 1, the population forecast is for 3,265 more people between 2000 and 2010. With an average of about 2.74 persons per household, that is about 1,191 housing units that will be needed to fulfill the projection of population growth between 2000 and 2010. According to building permits, 925 of these units have already been built Figure 7 - 1 Future Land Use Plan



by the end of 2004, resulting in 8,978 total dwelling units in the township. In addition, there are 3 large housing projects, totaling over 500 housing units, under construction or under review to consider approval, already exceeding the housing projected to be required by 2010.

So, either the population projection was low or the growth has been faster than expected. The ultimate amount of growth is limited only by the zoning and the amount of available land. So, theoretically, a certain amount of growth is still possible under the existing zoning ordinance, and so new buildout analyses have been performed to illustrate the total amount of growth that is possible in the future.

SIMPLE PROJECTION CALCULATIONS

Figure 7 - 2 shows one simple method that uses the projected future population to calculate the number of homes necessary to house the future population. The Projected Population was mentioned in Chapter 1 and is an estimate by the Delaware Valley Regional Planning Commission. The Future House-hold Size is an estimate by the MCPC, based on the year 2000 household size of 2.74 and national, state, regional and county trends toward slightly smaller households. The Vacancy Rate is based on the vacancy rate in 2000, which was about 0.6%. The Total Future Housing Units is the resulting calculation and New Future Units is determined by subtracting the number of homes existing in 2000, 8,978, from the total.



New apartment complex along DeKalb Pike

Figure 7 - 2 Residential Buildout Estimate

Residential	2025	
Projected Population in Households	28,210	
Future Average Household Size	2.66	
Vacancy Rate	0.6%	
Total Future Housing Units	10,669	
New Future Units Needed after 2005	1,691	
Potential Residential Land Remaining	386 acres	
Acres Per Unit, average	0.35	
Potential Acres Consumed	592 acres	
Residential Land Remaining after 2025	-206 acres	
Approximate Year of Buildout (989 units)	2008	

Potential Residential Land Remaining includes all the residentially zoned undeveloped lands shown in Figure 1 - 3. The Gross Acres Per Unit average is based on the following: at the end of 2004 there were 8,978 units and in 2005 residential housing occupied 3,140 aces, which is 0.35 acres per unit. From this information the Potential Acres Consumed and the Remaining Residential Land are calculated. The negative number indicates that Montgomery will run out of available residential land before it reaches the projected population in 2025.

The Approximate Year of Buildout assumes all of the available residential land would be built with housing and using the current average acres per unit, and the approximately 500 units that are already expected to be built, resulting in an estimate of 2008 as to when all the residentially zoned land will be filled with housing.

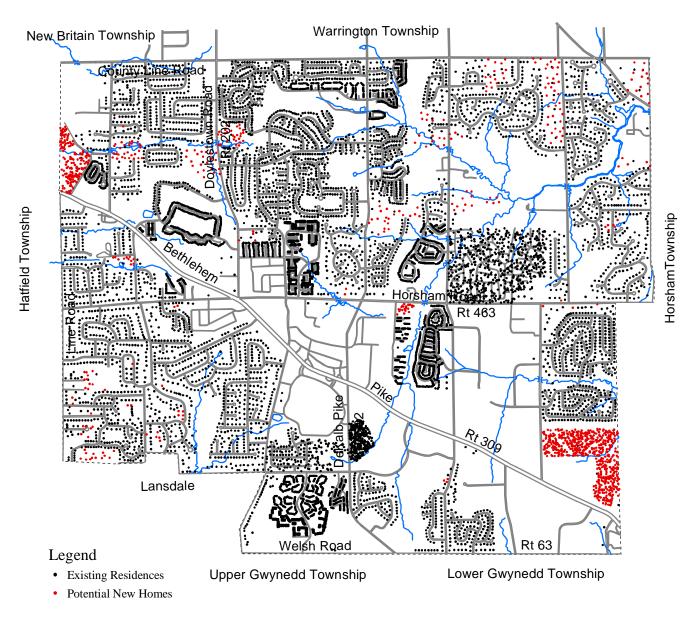
This indicates any of a number of possibilities: the population projections for 2025 are too high and the population increase will flatten out sooner, the pressure for higher density housing will increase, the pressure to change the zoning of non-residential land to allow residential uses will increase, or a combination of these.

MAPPED TOTAL BUILDOUT

This time the method used to determine residential build-out is the same method used by the County to conduct a fair share housing analysis. This method examines undeveloped land (those parcels with

Photo: MCPC

Figure 7 - 3 Future Housing Buildout Map



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NOTE: The residential buildout calculations are the result of a simplified analysis based upon vacant land and zoning. The potential new units are randomly distributed and have no relation to specific parcels. The number of units permitted on a given parcel can only be determined following a site-specific analysis and strict conformance to the township's zoning and subdivision and land development ordinances.

land use designations of country residence, undeveloped, private open space, and agriculture), but does not consider underdeveloped land (land that has development on it, but could be further subdivided or developed more intensely). It assumes that natural features including floodplains, wetlands and steep slopes will not be built upon, and that approximately 20% of a site's area will be used for roads, driveways, and utilities. The method used here results in a map that represents potential households with red dots that have been randomly placed within the developable areas based on the maximum density allowed in each zoning district. These dots do not represent the actual location of future homes. Existing homes are represented by black dots placed in the center of each residentially developed property.

Figure 7 - 3 illustrates one potential allocation scenario of full residential buildout township-wide. We have calculated the number of houses possible in each zoning district and distributed future houses throughout each zoning district. The total number of new houses possible with current zoning is 995, including the more than 500 units already expected to be built. The map does not take into consideration that some of that housing could use the historic preservation cluster option.

The buildout map shows that almost all of the potential new housing is clustered at both ends of the Bethlehem Pike commercial corridor. The remaining units are scattered throughout the rest of the low density areas of the township.

SUMMARY

In the face of buildout in a few years, and knowing which parts of the township will grow and which will not, enables Montgomery to plan for its future open space needs, as well as its needs for infrastructure and various other programs. However, the township is still subject to a certain amount of residential development, and should look for more specific ways to channel that growth and to provide ample recreation and open space areas for future residents.



A new home in Montgomery County

Montgomery Township 2006 Open Space Plan Chapter 7: Evaluation of Growth

CHAPTER 8 EVALUATION OF OPEN SPACE NEEDS

As Montgomery Township continues to grow over the next ten, twenty or even thirty years, it will need to continue to provide adequate parkland for its residents. This section examines the township's overall open space needs, determines how much and where open space is needed and looks at potential natural resource preservation opportunities.

CALCULATION OF OPEN SPACE NEED

This section of the chapter will calculate the amount of open space needed to serve the anticipated year 2025 population and employment.

As discussed in Chapter 1, the township is projected to have about 28,200 residents by 2025, 6,200 more than in 2000, and will need various kinds of open space for all these residents. The goals of this plan identify community parks, neighborhood parks, natural areas, trails, stream corridors, wetlands, watersheds, the roadway landscapes, trees throughout the township, historic resources, and farmland as the various kinds of open space that are important to the township and they should be as evenly distributed and convenient to all the residents of the township as possible.

COMMUNITY AND NEIGHBORHOOD PARKS

DETERMINING NEEDS

A 1983 guide by the National Recreation and Park Association (NRPA), Recreation, Park and Open Space Standards and Guidelines, provided strategies for calculating the acreage needs of municipal park systems. The 1983 guidelines suggested a municipal park system include 6.25 to 10.5 acres of land per 1,000 people. These standards, as well as standards from Delaware Valley Regional Planning Commission (DVRPC), were used to calculate park needs in the 1994 Open Space Plan. This publication, however, has been updated due to the expanded role parks and open space play in local communities.

The newest publication by the NRPA and the American Academy for Park and Recreation Administration titled Park, Recreation, Open Space and Greenway Guidelines was produced in 1996. The new title

Year	2000 22,025		2010 25,290		2025 28,210	
Population						
Range	From	То	From	То	From	То
		Re	commended	l Acreage [,]	**	
Community Park (for active recreation)	110	176	126	202	141	226
Neighborhood Park (for active recreation)	28	55	32	63	35	71
Total	138	231	158	266	176	290
			Existing A	creage		
Community Park (but often including signifi- cant natural areas)	245		245		245	
Neighborhood Park (but often including some natural area)	122.9		122.9		122.9	
Total	367.9		367.9		367.9	
			Differe	nce		
Community Park (for active recreation)	135		119		104	
Neighborhood Park (for active recreation)	95	68	91	60	88	52
	230	137	210	102	192	72



Community Park facilities, a regulation baseball field, in Windlestrae Park

Photo: MCPC

without the word "standards" is indicative in the shift of looking at open space. The more recent publication shifted its philosophy to provide guidance only, ultimately allowing the amount of park, recreation, and open space to be defined by individual communities. The 1996 publication emphasizes a systems approach to park, recreation, open space, and greenway planning that focuses on local values and needs rather than strict formulas.

This new systems approach looks at the level of service provided to the users of the facilities rather than the size of the facilities based upon population. This method reflects, in part, the dual function of municipal parkland: providing recreation opportunities (passive and active) and protecting important natural features. Municipal parks often contain a significant amount of environmentally sensitive land that prevents much of the acreage from being utilized for active recreation. Under these guidelines a 5acre municipal park that contains few significant natural features and is fully developed may provide the same level of service as a 35-acre park that provides recreation and also protects important woodlands, wetlands, and other environmental amenities. The difference hinges upon the individual goals of the municipality and not an arbitrary per capita acreage figure.

Montgomery Township feels strongly not only about recreation space, but also about natural resource



Neighborhood Park facilities at Windlestrae Park Photo: MCPC

protection and the preservation of the other types of open space. Therefore, the Township needs to establish park and open space plans that balance their desire to provide recreation opportunities while protecting the township's natural resources and meeting its goals for the other kinds of open space. This philosophy complements the objective to establish trail connections between open space and recreational areas since many of these connections can be provided in association with greenway protection.

LOCATIONAL NEEDS

The systems approach to defining open space needs utilizes a level of service analysis that measures how the park facilities meet the demands of



Street Hockey facilities

Photo: MCPC

the users. However, the systems approach still recognizes the need to provide open space within a uniform proximity of all residents. While there are many factors to consider when acquiring land for open space, identifying those areas of the region outside the basic service area of existing open space lands may help to further prioritize potential acquisitions.

COMMUNITY PARK AND NEIGHBORHOOD PARK SERVICE AREAS

Figures 8 - 2 and 8 - 3 indicate the service areas for two of the three park and open space classifications (community and neighborhood) in order to identify areas that are underserved in terms of access to open space, particularly for active recreation.

Overall, the service area analysis indicates that the majority of, but not all, the residents within Montgomery Township are within a reasonable proximity to municipal parks and open space. Lands classified as Community Parks achieve the most comprehensive level of service, with very few areas being underserved. In terms of Neighborhood Parks, there are several neighborhoods and portions of neighborhoods in the township that are underserved. Analysis of the parks and open space within the "Neighborhood" classification (using the 1/2 mile service area and major street cutoff) also included parks and open space within the "Community" classification. Many of the Community Parks tend to have facilities that enable them to function as a Neighborhood Park and exclusion of these lands would overstate the need for Neighborhood Parks from a service area perspective.

Figures 8 - 2 and 8 - 3 depict those area that are



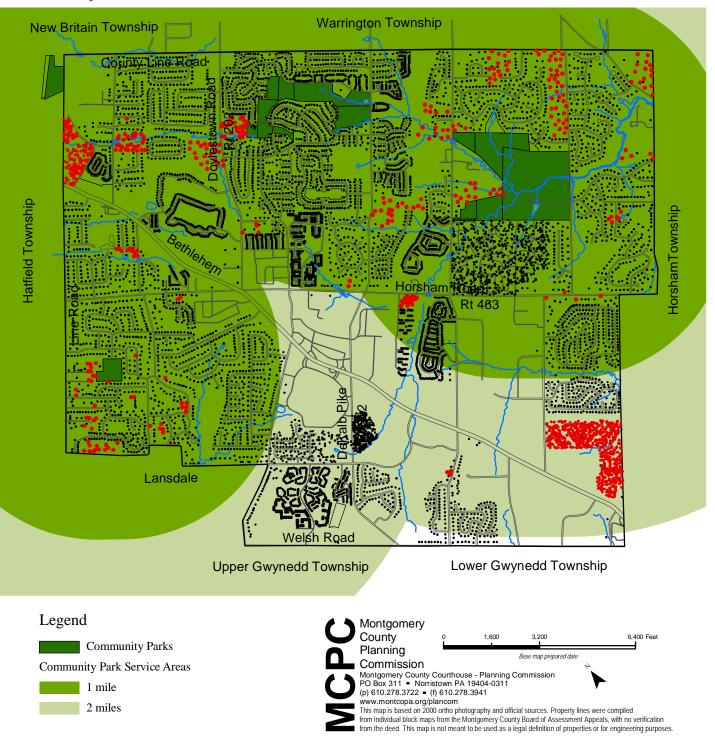
A tot lot in a shady area at Spring Valley Park

Photo: Montgomery Township

currently underserved from a park and open space access perspective and may provide additional guidance for establishing additional community or neighborhood parks and open space. However, creating new parks and open space preserves, or adding to existing parks and open space, within the existing service areas is still considered important to the overall goals of Montgomery Township and should be pursued whenever possible.

In addition to neighborhood and community-wide needs, improvements to existing facilities should be considered.

Figure 8 - 2 Community Park Service Areas



New Britain Township

Hatfield Township

Warrington Township



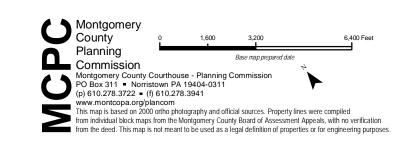
Legend



Neighborhood and Number

Existing Neighborhood Park Service Areas Existing Neighborhood Parks

- Public Open Space
- Existing Residences
- Potential New Homes

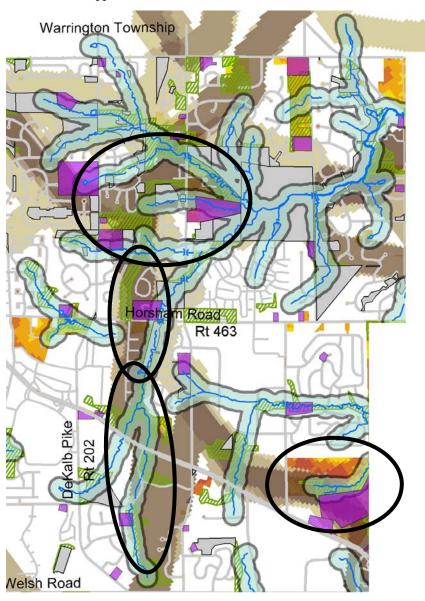


NATURAL OPEN SPACE NEEDS

Natural open space needs are harder to quantify, especially since the need may not only be for humans, but also for animals and plants, depending on the conditions. Chapter 4 gave an inventory of unprotected natural resources and Chapter 6 analyzed them. But just how many natural resources need to be preserved?

One perspective, especially since the township is so highly developed, is to preserve every single bit of natural resource that still exists. While perhaps a noble goal, there are practical issues that make such a goal impossible to achieve. The most relevant is

Figure 8 - 4 Natural Park Opportunities



how to achieve all that preservation. One method is to purchase all the land that has the natural resources, but that is met with the limitations of funds. Another is to buy conservation easements or other rights, but again, funding is the limitation. Another method is regulation, but that is constrained by legal and political limits. There may be other methods, too, but even all of these methods together may not be able to preserve all the natural resources in the township. There will, inevitably, be some natural resources lost to development in the next ten to twenty years, perhaps even in the next one or two years. Perhaps the best strategy, therefore is to preserve the most valuable natural resources first with as many methods as possible and then the least valuable ones last, potentially losing only lesser valued resources over the course of years.

Certainly endangered species habitat should be preserved, if Montgomery Township had any. The next most obvious resources that should be preserved are the ones that are the most important to animals, plants and people. As previously indicated in Chapters 4 and 6, the most valuable areas for specific plants and animals are:

- 1) a spot for the Field Dodder, Figure 4 15,
- 2) general areas for the Eastern Red-bellied Turtle, page 55,
- areas with several co-located resources, Figure 6 - 1,
- 4) high-ranked areas from the natural conservation resources analysis, Figure 6 - 2, and
- 5) high-ranked areas from the natural corridors analysis, Figure 6 3.

Figure 6 - 4 summarized these areas on one map. Figure 8 - 4 is an enlargement of that map highlighting some of the highest concentrations of most valuable resources in the township, lending those areas to be most suitable for larger natural parks.

The next most valuable natural areas that the township would like to preserve are the rest of the natural areas in the township, including the headwaters of the Wissahickon.

Many of these areas, especially since they may be part of a new development before the Township can preserve them, might be preserved as part of open space in the new development.

STREAM CORRIDOR, WETLAND, AND WATERSHED NEEDS

In addition to open space owned by the township or homeowners associations, there are private lands with natural areas that are worth preserving, especially if they improve the steam corridors, wetlands and watersheds of the township.

Not only the Township, but many private land owners, including homeowners associations, would like to improve the natural conditions of these areas.

One of the most helpful concepts to help streams and wetlands is to initiate a riparian corridor. The natural features maps in Chapters 4 and 6 show a 200-foot riparian corridor along all the creeks and ponds in the township.

The riparian corridor is most often used to establish new regulations for new development. The corridor can be used for other purposes, too. The township could initiate or support conservation efforts in all these areas, whether already part of private lots, home-owners' associations, or public land.

Stream restoration projects, backyard stormwater best management practices (BMPs), no-mow zones in the corridor, and various other programs could be carried out in the riparian corridors.

ROADWAY LANDSCAPE NEEDS

In this case, the value of roadscapes lies less on the natural habitat as it does with the pleasure of the people and the resulting image of the township. This, then, also introduces a more obvious connection of open space to business, commercial and land values. As such, this need might be measured, at least in part, by the increased value to these aspects of the community. While a poor community might have a huge need for such increased value, any community will still need to constantly maintain or preferably improve its business, commercial and land values. Perhaps the aesthetic appearance of its streets, especially its major thoroughfares, is one of the few ways the township can actually help businesses and where the businesses may not be able to so. Once again, due to practical limitations, it would be best to improve the most resources which would provide the greatest value for the investment (of funds or of effort, such as ordinances) first and work down from there.

It seems the most important roadscape needs, therefore, are along Bethlehem Pike and Route 202, especially starting at the gateways to the township and around the most businesses, such as near the mall, Other important areas are along North Wales Road, Welsh Road, County Line Road near Route 202, and Horsham Road near North Wales Road.



Roadway Landscape Along DeKalb Pike near Knapp Road

Photo: MCPC



Image of Bethlehem Pike shortly after entering the township from the south

NEED FOR TREES THROUGHOUT THE TOWNSHIP

As part of the effort to improve the visual image and property values of the township, but also to improve its overall ecology, the Township would like to plant as many trees as possible:

- along its streets,
- on its public lands, and
- would like to offer trees for planting on private open space lands,

especially in areas where the trees would help restore some of the natural ecology.

The Township already has an active Shade Tree Commission which has the mission to preserve, protect, and replace the shade trees within Montgomery Township in order to maintain an ecological balance.

HISTORIC RESOURCE OPEN SPACE NEEDS

Historic Resource Open Space can be thought of in two ways:

- open space that includes a historic resource or
- historic structures that should include their surroundings to fully understand, appreciate, or preserve the historic resources.



General Hancock Farmstead retained several acres including the barns and the pond after the farm was developed

Photo: Pictometry

Historic resource open space needs are hard to quantify and depend on what is remaining and what is valuable.

Chapter 4 includes an inventory of the properties with structures over 100 years old (Figures 4 - 1 and 4 - 2). In several of these cases the land surrounding the historic structures should be preserved along with the structure. In the 1995 Open Space Plan over 85 properties were listed as older than 100 years. Now, 10 years later, there should be more properties that qualify for this distinction, but there are less. A few of the resources have been preserved, but several have been destroyed. The township needs to act sooner rather than later to preserve the most valuable of these resources.

The Township already has an incentive-based option for developers to use to preserve historic structures and some of the area surrounding the structure the historic preservation cluster overlay zoning district.

Some resources may, however, need more protection than can be offered by incentives in zoning, especially if the incentives are not enough to preserve a valuable resource, and the Township may need to act in more direct ways, such as the acquisition of the property or easements, or work with other organizations to preserve the historic resource. Chapter 11, Heritage Resources, discusses many of the ways to preserve the township's many historic resources, including the ones that still have some of their open space around them.

FARMLAND PRESERVATION NEEDS

The township still has some farmland and would like to preserve as much of it as possible. The pressure for development is especially strong on farmland and unless decisive action is taken soon, it will all be developed.

The Township would like to discuss with the two farmers how the Township can help them keep their farms.

SUMMARY

There are many open space needs in Montgomery Township. Particularly apparent is the need for neighborhood-type parks in several of the township's neighborhoods and natural areas preservation in the remaining areas with important natural resources. In addition, the roadways and historic resources could provide open space benefits if they were improved or persevered.



Cooper farm on Doylestown Road

Photo: Pictometry

Chapter 9

EVALUATION OF COUNTY AND ABUTTING MUNICIPAL PLANS

The preceding chapters investigate the resources, needs, and opportunities that exist within Montgomery Township. With this information, recommendations can be made to effectively serve township residents. However, the land use decisions that Montgomery Township makes affect the larger region just as decisions made in neighboring municipalities affect Montgomery. Perhaps even more important, an evaluation of adjacent municipal plans may reveal that one or more neighboring municipalities have similar goals and objectives and thereby determine that working together they may be able to accomplish a goal that otherwise would have been difficult, expensive or unattainable.

This chapter compares the recommendations of this plan with those in the County Comprehensive Plan and the comprehensive and open space plans of abutting townships. The intent is to prevent conflicts between plans and to encourage collaborative efforts. By gaining an understanding of how Montgomery Township's plan will fit into the larger open space and pathway linkage picture, partners can optimize both the quantity and quality of future open space preservation and management.

COMPARISON TO MONTGOMERY COUNTY PLANS MONTGOMERY COUNTY COMPREHENSIVE PLAN

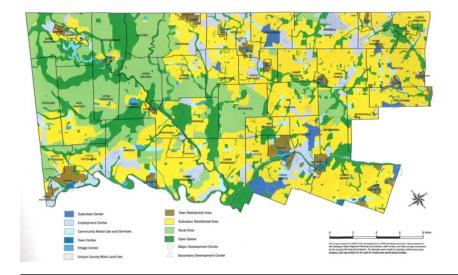
In 2005, Montgomery County adopted a new Comprehensive Plan. This plan will help guide the growth of housing, transportation, economic development, and natural and cultural resource management through 2025 and beyond. Each of these factors could potentially have a great impact on open space needs and opportunities in Montgomery Township.

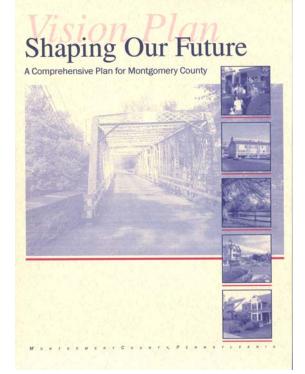
The foundation of the Comprehensive Plan is the Vision Plan. In addition to specific goals and actions across a variety of planning issues, the Vision Plan outlines five basic issues:

- Directing new development to logical places
- Effectively managing traffic congestion
- Preserving open space and farmland
- Revitalizing main streets and brownfields
- Offering a variety of housing, job, shopping, and recreational choices

Montgomery Township's Open Space Plan addresses all of these issues by setting a future course for wise land use, increasing linkages and accessibility, directing and diversifying new development, and preserving open space.

The County Comprehensive Plan lists 48 goals that describe and expand upon the vision of the County in 2025. Several of these goals parallel those in this plan, adding strength to the recommendations set forth later in this plan.





In terms of land use, the County Comprehensive Plan complements the Montgomery Township Comprehensive Plan, designating Montgomery as a combination of Suburban Residential, Employment Center, and Suburban Center areas and also containing a Major Development Center. The County Comprehensive Plan also generally coincides with the Township's plans with regard to growth areas and open space.

MONTGOMERY COUNTY TRAIL SYSTEM

The Montgomery County Trail Plan was adopted in 1996 as part of the County's Open Space Plan and is being updated in the Comprehensive Plan element dealing with Open Space, Natural Features, and Cultural Resources. Prior to adoption of the plan, a trail along the Schuylkill River, known as the Valley Forge Bikeway, had been completed between Philadelphia and Valley Forge National Historic Park. This bikeway is now known as the Schuylkill River Trail. However, since development of the Trail Plan, numerous other projects have been completed and initiated. These updates and changes are reflected in the County's new Comprehensive Plan.

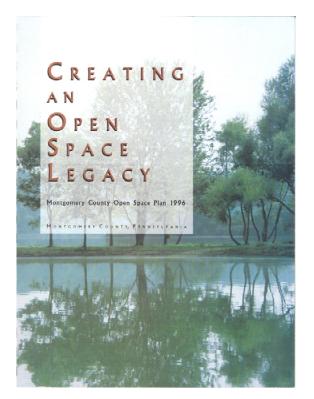
The only county trail that directly involves Montgomery Township is the Powerline Trail. One long segment of the Powerline Trail is already open in Horsham Township. The entire trail connects the Cross County Trail in Upper Moreland Township with the Evansburg Trail in Evansburg State Park.

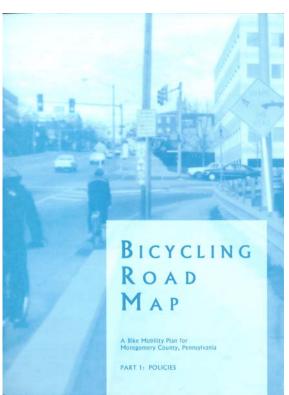
Other nearby proposed trails that may provide opportunities for Montgomery Township include the Liberty Bell Trail, connecting the Schuylkill River Trail in Norristown to Lansdale, Souderton, and Quakertown; the Green Ribbon Trail, traveling along the Wissahickon Creek from Upper Gwynedd Township to the Cross County Trail in Whitemarsh Township; and the Evansburg Trail, which will loop though Evansburg State Park and the Lower Salford Trail system and connect to the Perkiomen Trail at both ends.

There is a more detailed discussion about this in Chapter 5, Potential Open Space Linkages.

MONTGOMERY COUNTY BICYCLE MOBILITY PLAN

The Montgomery County Bicycle Mobility Plan was adopted in 1998 and will be updated as part of the Transportation element of the new Comprehensive Plan. The purpose of the plan is to increase bicycling as a valid and safe alternative to automobile transportation. The plan recommends roles and responsibilities for both public and private sectors to provide bicycle-supportive facilities and programs, including necessary road improvements. Specifically, the plan identifies roads in the county that should be im-



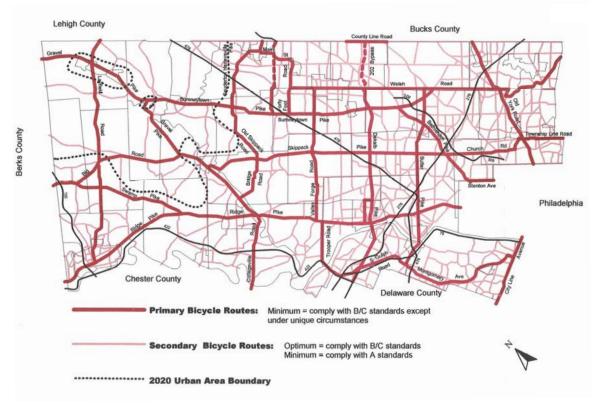


proved to accommodate bicyclists. These roads are divided into two categories: primary routes and secondary routes. The purpose of the two categories is to match the road difficulty with the skill level of bicyclists. Primary routes are intended for expert users and secondary routes for expert and casual users. Some roads have high traffic volumes at high rates of speed while others have lower traffic volumes at lower speeds. While experienced bicyclists may be comfortable with all types of streets, the less experienced riders may be comfortable only on local, low-volume streets.

To take into account both the nature of the street and the experience level of bicyclists the Federal Highway Administration (FHWA), in its 1994 publication Selecting Roadway Design Treatments to Accommodate Bicycles, divided bicyclists into three classes:

- Group A (Advanced) Bicyclists These are experienced riders who can operate under most traffic conditions. They comprise the majority of the current users of collector and arterial streets. Advanced bicyclists are best served by sufficient operating space on the roadway or shoulder to reduce the need for either the bicyclist or the motor vehicle to change position when passing.
- Group B (Basic) Bicyclists These are casual or new adult and teenage riders who are less confident of their ability to operate in traffic without special provisions for bicycles. Basic bicyclists are

Figure 9 - 1 The County's Recommended Bicycle Routes



best served by bike paths and other facilities that provide a well-defined separation of bicycles and motor vehicles on arterial and collector streets.

Group C (Child) Bicyclists – These are preteen riders whose roadway use is initially monitored by parents. As their riding skills develop, child bicyclists are accorded independent access to the system. Like Group B bicyclists, children are best served by bike paths and other facilities that provide a well-defined separation of bicycles and motor vehicles on arterial and collector streets.

Based on practical and professional judgment, the FHWA guidelines prescribe four basic types of road improvements (shared lanes, wide curb lanes, shoulders, and bike lanes) to accommodate the three classes of bicyclists on public roads.

In Montgomery Township, Welsh Road (Rt. 63), a portion of County Line Road, and the future Route 202 Parkway are designated as Primary Bicycle Routes. Many other roads in the township are designated as Secondary Bicycle Routes, see Figure 9 - 1. A more detailed map and discussion of these recommended routes are found in Chapter 10, Municipal Trail and Pathway Development. Related to the County Bike Mobility system, the state has designated Stump Road as part of the State Bike Trail "S," which connects Ohio to New Jersey through Phoenixville, past the Community College, along Stump Road and then through Bucks County.

Finally, as part of PennDOT's process for widening, repaving and restriping roads, municipalities and counties are contacted for their review comments. One aspect of this review is the accommodation of bicycles. When feasible, PennDOT will restripe a road so that bicycles have more room on the edge of the road. Montgomery County reviews all proposed widenings, repavings and restripings and, based primarily on the Bicycle Mobility Plan, notifies a bicycle committee at PennDOT of any change it feels should be made to accommodate bicycles.

RELATION TO PLANS OF ABUTTING MUNICIPALITIES

Six townships and one borough abut Montgomery Township. The principles from the current or draft open space policies and sometimes other pertinent information of each township are briefly summarized below. Adjacent yet incompatible land uses may result in conflicts, whereas potential linkages could lead to cooperative partnerships between municipal neighbors.

To participate in the Montgomery County Open Space Program in the mid-1990's, each of the Montgomery County municipalities developed open space plans. In the ten years since these open space plans were written, parcels have been preserved, trails proposed and developed, and the needs of the communities have changed. It is therefore vital that Montgomery keep abreast of the continually evolving planning efforts of its neighbors and the county.

Chapter 5 already discussed the many trails of these municipalities. This chapter will therefore look instead at the open space planning of Montgomery's neighbors, with only minimal discussion, if any, of their trails.

LANSDALE BOROUGH

Lansdale adopted a new Open Space plan in July, 2005. Of most relevance to Montgomery, their

plan includes:

- Creating green gateways at strategic borough entrances, including one from Montgomery Township (letter G on Figure 9 - 2);
- Participating in regional trail planning;
- Developing a local trail plan to compliment the regional system;

As shown in Figure 9 - 2, number 11, Lansdale would like to connect their trail system along the Wissahickon Creek to Montgomery's Natural Park, where it could continue to, or close to, the headwaters of the Wissahickon.

Additionally, Number 14 in Figure 9 - 2 represents the desire of the borough to work with Upper Gwynedd and Montgomery Townships to accomplish bike lanes and signage along Welsh Road to the 202 Parkway Trail, crossing the Powerline Trail at DeKalb Pike.

The plan also calls for more environmental protection of the Wissahickon Creek, number 16 on Figure 9 - 2, including implementation of the detailed plan of the borough parkland along the creek upstream

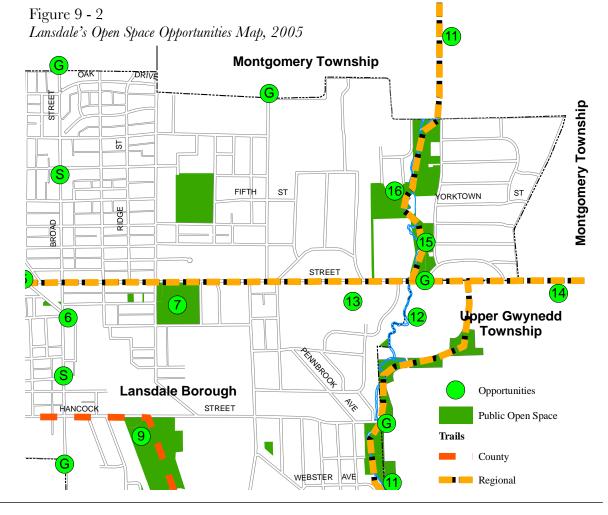


Figure 9 - 3 Wissahickon Creek Infiltration Basins & Riparian Corridor Wallace, Roberts, & Todd LLC



from Main Street, Wissahickon Park, number 15 on Figure 9 - 2 and also shown in Figure 9 - 3. Not only could this park be a destination for Montgomery residents, but the success of its environmental features may depend significantly on effects of waters from Montgomery Township.

All these projects are in the borough's highest priority category for implementation.

HATFIELD TOWNSHIP

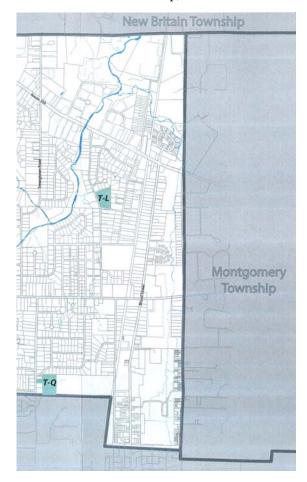
Hatfield Township has been developing a new Open Space Plan in partnership with Hatfield Borough. An August 2005 draft of the plan indicate the following general items of most relevance to Montgomery:

- Creating a trail network throughout the township and borough;
- Creating connections to adjacent communities;

In addition to these general items, Hatfield has specific proposals for locations throughout their township. The most relevant locations are:

- Lenhart Road Preservation Area Open Space Amenities (#T-L on Figure 9 - 4). The Township would like to create a walking trail and naturalized meadow. This is a high priority project.
- Schweiker Park Acquisition (expansion) (#T-Q on Figure 9 - 4) to enlarge the existing park. This is a moderate priority project.

Figure 9 - 4 Excerpt from Hatfield Township Open Space Plan Recommendations Map, 2005

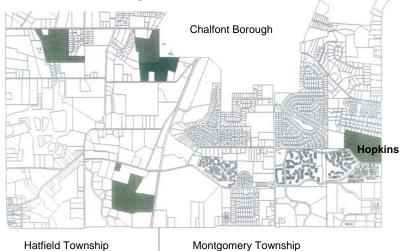


NEW BRITAIN TOWNSHIP

New Britain Township adopted an open space plan in 2000 which includes the following items of most relevance to Montgomery Township:

- The objective to protect and enhance the quality of the natural resources found within the township, as well as those having an ecological relationship to surrounding municipalities.
- The objective to establish a system of linked open space to serve as multi-purpose community greenways through, among other polices, creation of natural, cultural, and recreational linkages that will promote the connecting of municipal, county, and state preserved lands.

Figure 9 - 5 Excerpt from New Britain Township Open Space Plan Land Preservation Map, 2000

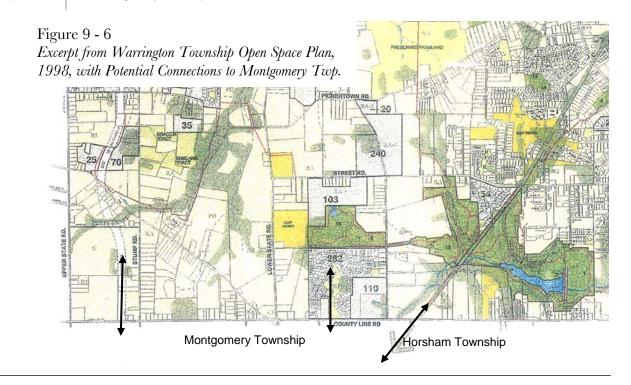


This is to be carried out by the Township's Land Preservation Advisory Committee.

- To coordinate with neighboring municipalities in planning for effective acquisition of open space, protection of the environmental resources, interconnection of open space, and operation of recreational facilities. This, also, is to be carried out by the Township's Land Preservation Advisory Committee.
- No properties adjacent to Montgomery Township were identified for acquisition (Figure 9 5). The property most relevant to Montgomery is the Hopkins tract on Upper State Road where the plan suggests preservation of the hilltop scenic view and the farm and pond on the lower lands.

WARRINGTON TOWNSHIP

Warrington adopted their open space plan in 1998. This plan does not specifically address either of its Montgomery County neighbors, except on the Open Space Plan map, which indicates a trail connection along the Little Neshaminy Creek (see Figure 9 - 6). A significant part of the plan proposes an important trail connection along the Little Neshaminy Creek, which would connect large open space areas and extend to several other Bucks County municipalities. This would benefit Montgomery Township residents but only if a small segment is also constructed through Horsham Township, which Horsham is proposing. Figure 9 - 6 also indicates the multi-use trail to be constructed along the Route 202 Parkway.

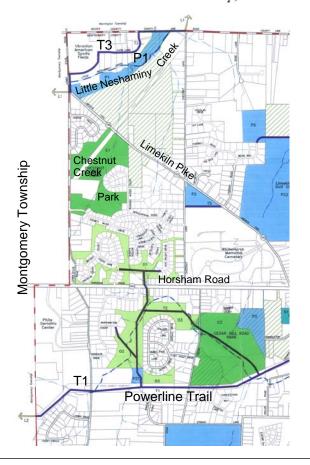


HORSHAM TOWNSHIP

Horsham Township adopted a new Open Space Plan in April 2005 and revised it in August 2005. Of most relevance to Montgomery are the following items:

- Power Line Trail and Greenway (#T1 on Figure 9 - 7). The Township would like to construct additional segments of the trail, coordinating with Montgomery Township, and to more actively manage the vegetation along the trail.
- Little Neshaminy Creek Trail (#T3, the dark line at upper left corner on Figure 9 7). The Township would like to coordinate with adjoining municipalities a trail linkage at this location.
- Little Neshaminy Creek Greenway (#P1, the blue area at upper left corner on Figure 9 - 7). The Township would like to preserve this natural area to coordinate with efforts from neighboring municipalities.

Figure 9 - 7 Excerpt from Horsham Township Open Space Plan Recommendations and Trails Map, 2005



LOWER GWYNEDD TOWNSHIP

Lower Gwynedd Township has been developing a new Open Space Plan Update. A 2005 draft of the plan indicates the following general items of most relevance to Montgomery:

- To provide connections to adjacent municipalities sa as to incorporate Lower Gwynedd into the fabric of Montgomery County;
- Expand upon existing resources or add new resources to connect to adjacent greenways, parks, and trails.

In addition to these general items, Lower Gwynedd has specific proposals for locations throughout their township. The most relevant location is:

• The farm next to Oxford Park. The township would like to acquire this property to expand the park and to preserve the historic farm building and the attractive natural features. This is a high priority project.

This property is directly across Welsh Road from the Arbor Green Triangle property. The potential linkages have been discussed in Chapter 5.

UPPER GWYNEDD TOWNSHIP

Upper Gwynedd Township is also working on a new Open Space Plan which recognizes three county trails are to cross the township, the Liberty Bell, Wissahickon (Green Ribbon), and Powerline Trails, and also plans for several local trails. Figure 9 - 9 shows the plan's proposed alignment of the Powerline Trail as a dashed blue line and where it crosses the preserved farmland (shown in light green) in Upper Gwynedd Township and into Montgomery Township. Subsequent to the creation of this map, however, the trail planners at the Montgomery County Planning Commission discovered that a trail is not allowed to cross preserved farmland. After discussing the various options with staff from both townships, the County Planning Commission recommends the Powerline Trail to traverse along Welsh and North Wales Roads in order to avoid the preserved farmland.





RELATION TO OTHER PLANS

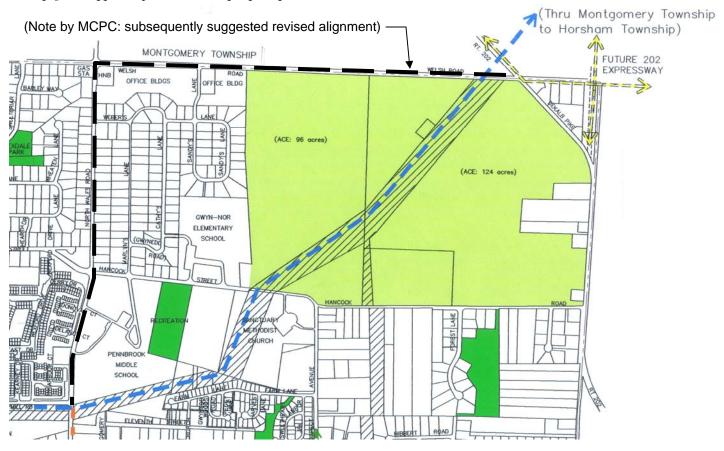
1999 MONTGOMERY TOWNSHIP COMPREHENSIVE PLAN

The open space goals and objectives of the 1999 Comprehensive Plan are similar to the ones expressed in the 1994 Open Space plan as well as the ones herein. Several of the open space acquisition and non-acquisition action items have been accomplished since adoption of the plan.

NESHAMINY CREEK WATERSHED CONSERVATION PLAN

Watershed Conservation Plans as funded by the Pennsylvania Department of Conservation and Natural Resources empower local conservation groups to identify "significant natural, recreational, and cultural resources." The plan for the Neshaminy Creek Watershed, completed in the 1990s, is applicable not only to the Neshaminy Creek watershed area in Montgomery Township, but also the Little Neshaminy Creek watershed, which is technically a subwatershed of the Neshaminy Creek watershed.

Figure 9 - 9 Excerpt from Upper Gwynedd Township Open Space Recommendations and Trail Plan, 2005



One of the most important principles in this plan highlights the importance of municipalities to be active in watershed and natural resource planning.

SUMMARY

Most of Montgomery's neighbors, the county and other local organizations would like to work with Montgomery to accomplish some of their own as well as regional open space goals. By working with them, Montgomery, too, may be able to accomplish some its own open space goals that might have otherwise been more difficult.



Wissahickon Park in Lansdale near Montgomery Township

Photo: MCPC

CHAPTER 10 MUNICIPAL TRAIL AND PATHWAY DEVELOPMENT

Building on the trail plan proposed in the 1995 Open Space Plan, the Township has developed this new trail plan.

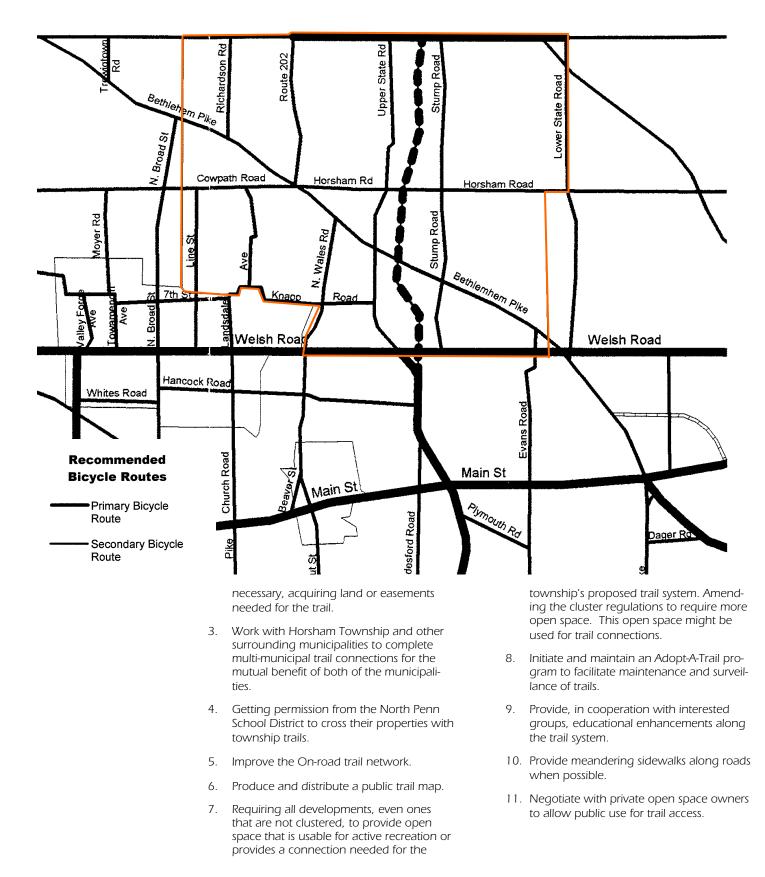
TRAIL PLAN GOAL AND OBJECTIVES

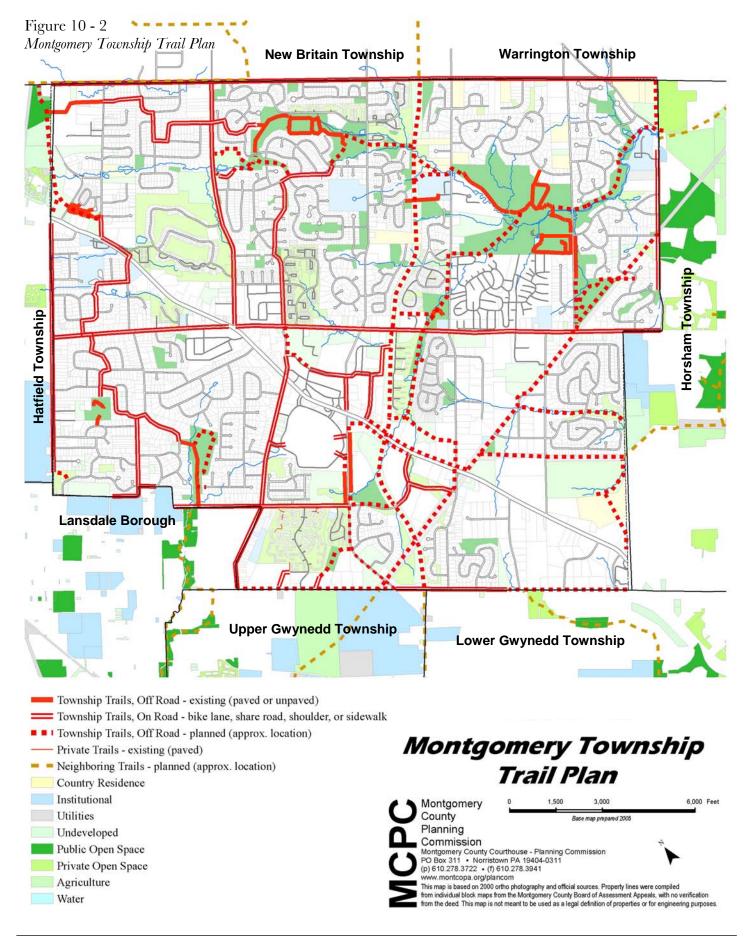
A trail system, combined with the township's sidewalks, will provide a safe place for people to get exercise by walking, jogging, or riding a bicycle; it will connect the township's parks; it will provide the only independent means of transportation for those not able to drive, such as children and some elderly; it will reduce the number of vehicle trips by allowing car owners to walk and children to walk or ride safely without getting a ride from their parents; and it will improve safety by moving pedestrians and bicycles out of existing roads. In addition, this trail network will connect with trails in abutting townships, thereby allowing Montgomery Township residents to travel longer distances on an off-road trail system.

Highest Priority Objectives:

- 1. Continue to work with PennDOT to ensure that a multi-use trail is included in plans along the Route 202 by-pass alignment.
- 2. Develop trail segments according to the Prioritized Trail Map, Figure 10 - 3. When

Figure 10 - 1 Excerpt from County's Recommended Bicycle Routes





POTENTIAL ROUTES

The routes proposed in the Trail Plan, Figure 10 - 2, have been conceptually reviewed with regard to desirable connections to destinations, completion of township-wide and regional networks, and some consideration of obvious obstacles. None of the proposed routes have been finalized. Before construction can begin on all segments detailed examination and design that consider physical as well as ownership constraints will need to be done.

PATHWAY LOCATION CONSIDERATIONS

When selecting the location of the various pathway types the following design considerations should be referenced:

- The path should be separated from traffic as much as possible and minimize at-grade road crossings.
- The path should be as continuous as possible and not require users to travel on local streets to get from one link to another.
- The path should extend to a destination point.
- Avoid extensive use of perimeter trails only.
- When part of a subdivision or land development, the paths should be constructed as part of the improvements and in place prior to the sale or construction of individual homes.
- The path should avoid crossing significant streams, whenever possible.
- The path should connect with as many housing developments as possible.



Trail in Spring Valley Park

Photo: Roy Rodriguez, Jr.

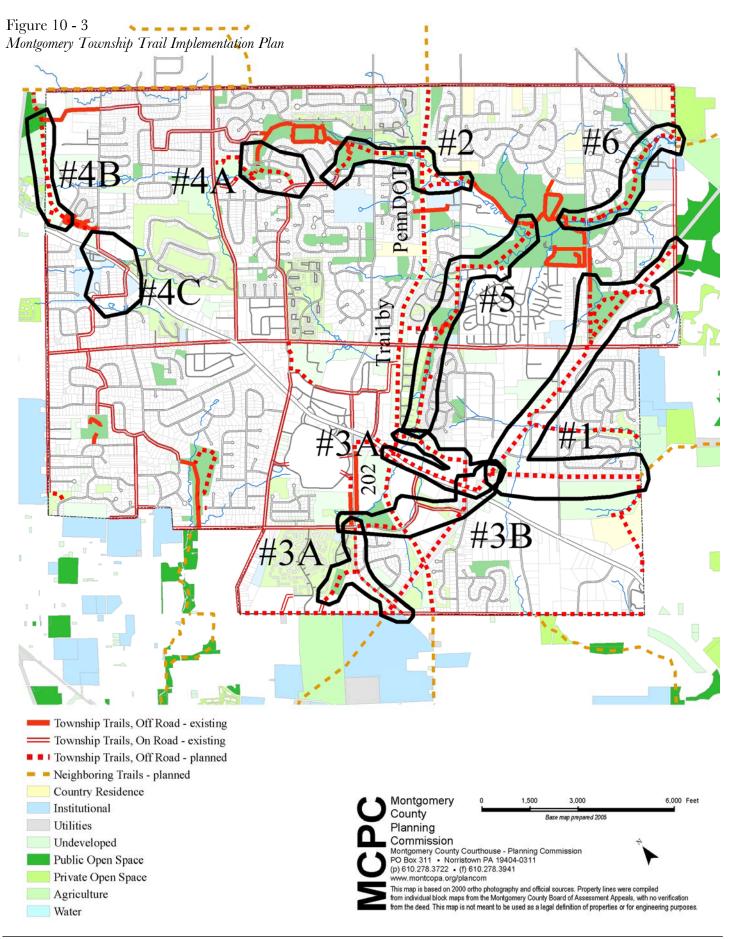


Trail at the Montgomery Township Building Photo: MCPC

- Road crossings should be done at signalized intersections, where possible, or at intersections controlled by a stop sign. Signage should be included indicating to turning traffic the presence of the path. Any road crossing in the middle of a block should be clearly marked with good sight distances and may need to be controlled by a warning light or stop sign.
- The path should avoid grades over 5%. Steeper grades may be acceptable for short distances and should not approach any roadway without adequate stopping distance.
- The path should not parallel existing roads for extended periods where the path will be crossed by numerous driveways and/or road crossings.
- For safety, the path should be visible from roads, homes, and businesses.
- The path should be set back from existing homes as far as reasonably possible in order to protect the privacy of the residents.

PATHWAY IMPLEMENTATION

The Township Trail Plan is an ambitious undertaking that, if accomplished, will provide a marked increase in the quality of life for the township's residents.



Montgomery Township 2006 Open Space Plan CHAPTER 10: MONTGOMERY TOWNSHIP TRAIL PLAN

Some portions, particularly in the parks, already exist. Many of the on-road segments will only need some signage and perhaps some road striping. Other segments of the system can be provided by developers as they improve their properties. A few very significant segments, however, appear to need short-term action by the Township and they cannot be all be done immediately. Figure 10 - 3 shows the preferred phasing of the segments of the network that require short-term action by the Township.

Segment #1: This segment connects to Horsham Township and could possibly be a multi-municipal project to extend the Powerline Trail from Limekiln Pike in Horsham to near the Stump Road and Bethlehem Pike intersection In Montgomery. This seqment also would follow another PECO powerline spur to the east, across Horsham Road and split in two directions, one continuing along the PECO powerline back to Chestnut Creek Park in Horsham. Meanwhile, the other portion of the trail that split away will connect to Windlestrae Park and its onemile trail system. The result of the completion of this 3-mile segment will be to extend Horsham's Powerline Trail into Montgomery, and connect perhaps thousands of Horsham and Montgomery residents to Windlestrae Park, Chestnut Creek Park, Horvath Park, the Zehr Tract, and Montgomery Elementary School.



Meandering walkway along Kenas Road



Pedestrian bridge at Montgomery Elemen-Photo: MCPC

Segment #2: This segment continues the township's connection to the Powerline Trail from the Zehr Tract portion of Windlestrae Park past the Montgomery Elementary School and connects to the future 202 Parkway Trail, across some private open space and then connects to Spring Valley Park. This segment would add about 3/4 of a mile of trail but once the two parks and Segment #1 are combined, there will be about 6 continuous miles of trails in Montgomery Township connecting thousands of residents to several parks and other destinations, not to mention the many miles of trails and thousands of residents and other destinations in Horsham Township.

Segment #3: Because of the location, shape, and combination of off-road and on-road trail types, this segment is depicted with three parts, two named #3A and one #3B. Each of the parts could be built separately, but they would be most effective if they are built either in pairs (the two 3A's) or, even better, all three at once. The two 3A parts would not only connect Segment #1 to the 202 Parkway Trail, but, if the Parkway Trail is in place at the time, these two parts would connect the Powerline Trail from Horsham to Upper Gwynedd. Part 3B completes the major connections in this section of the township.

Montgomery Township 2006 Open Space Plan Chapter 10: Montgomery Township Trail Plan

THE TOWNSHIP LOOP

The township trail system is designed with a huge loop that traverses the entire township, staying for the most part a short distance inside the township boundaries. This makes for a slightly shorter loop than around the periphery, but more importantly this works to serve more Montgomery residents because the trail is then essentially "double-loaded" with Montgomery residents within a short distance of both sides of the trail. The loop is also designed as a large connector trail to the Powerline and Parkway Trails.

Segment #4: This segment fills two crucial off-road gaps and one particularly difficult on-road gap in the township loop. For similar reasons as Segment 3, this segment is depicted with three parts. This makes implementation possible in one, two or three parts at one time. The on-road segment between 4A and 4B is foreseen to need very little physical improvements; primarily just signage and possibly some paint striping. This should be relatively easy to accomplish apart from parts 4A and 4B. At the time of writing this plan, a developer has agreed to provide at least half of part 4B.

Segment #5: This segment provides an important cross-loop connection following the Little Neshaminy Creek from Windlestrae Park to the Parkway bridge over Bethlehem Pike. The Township owns over half of the land for this trail already, so this segment might be somewhat easier to accomplish than some of the others.

<u>Segment #6:</u> The Township also owns most of the land for this segment and it is an obvious connection along the Little Neshaminy Creek to Horsham

and then into Bucks County. In fact, this project had been attempted several years ago and found stiff resistance from neighbors. A new proposal may need to consider a non-paved trail in order to be accepted. Due to the mutual benefits to Horsham and Warrington Townships, this segment could be combined with planned segments in those municipalities and implemented as a multi-municipal project.

The rest of the trail system should also be implemented wherever and as soon as possible. Those segments do not appear on this implementation map either because they are not as crucial to the overall system or because they are likely to not need short-term Township action.

SUMMARY

This trail and pathway plan builds on the ideas of the previous plan and new changes such as neighboring trails and new implementation opportunities to envision a comprehensive network of offroad and on-road trails and pathways. This network will take several years to implement but once complete (and even as segments are completed) it will serve the residents of the township with expanded recreation, transportation, and community-building opportunities that are only beginning to be developed. As such, construction of the trail network has become one of the Township's highest open space priorities.



Trail at the Zehr Tract in Windlestrae Park

Photo: MCPC

Montgomery Township 2006 Open Space Plan Chapter 10: Montgomery Township Trail Plan

CHAPTER 11 HERITAGE RESOURCE CONSERVATION

Although not directly related to open space preservation, saving historic and cultural resources is important to defining the township's sense of place, character, quality of life, and also some of its economic activity. The township has a high number of historic resources that, along with scenic resources and open spaces, are components of its unique character and economy. These heritage structures and sites comprise a valuable resource that provides cultural, aesthetic, and economic value to the residents of the township. The Township, in partnership with other agencies and organizations, will continue to act to preserve both its heritage and cultural history for the benefit of present and future citizens. This chapter intends to clearly articulate Montgomery Township's vision for preserving its heritage resources, building on the specific policies outlined in the Comprehensive Plan for historic resources.

VALUE OF HERITAGE RESOURCE CONSERVATION

The preservation of local heritage is important in maintaining the quality of life in Montgomery Township. Local heritage basically consists of the historic buildings, landmarks, and landscapes that provide a link to a community's past and thereby make a valuable contribution to its current educational, cultural, and social environment. While it can be difficult to define exactly what makes something historic, his-



John Roberts' House, which has been moved to the Joseph Ambler Inn, a hospitality complex of bed & breakfast Photo: Roy Rodriguez, Jr. lodging, restaurant, bar, and conference and wedding facilities all using authentic historic structures.

toric areas can generally be thought of as buildings and sites that are worth saving. Chapter 4 identified many of the heritage resources in the township (Figures 4 - 1 and 4 - 2), but this chapter will discuss how to preserve them.

But why bother with all these old buildings? What is the value of historic preservation? One writer, Steven Tiesdell in Revitalizing Historic Urban Quarters, answers this question by describing seven key benefits that historic preservation offers.

• Aesthetic value - "Old buildings and towns are valued because they are intrinsically beautiful...or because they...have a scarcity value....In a world of rapid change, visible and tangible evidence of the past may also be valued for the sense of place and continuity it conveys."

• Architectural diversity - "The aesthetic appeal of [a] historic place may result from the combination or juxtaposition of many buildings rather than the individual merits of any particular building."

• Environmental diversity - "...there is often a stimulating contrast between the human scale environment of a historic quarter [district] and the monumental scale of the more modern central business district...."

• Functional diversity - "...a diverse range of differ-

ent types of space in buildings of varying ages, enables a mix of uses...Historic areas may offer lower rents that allow economically marginal but socially important activities to have a place in the city."

• Resource value - "Whether beautiful, historic or just plain practical, buildings may be better used than replaced...the reuse of buildings constitutes the conservation of scarce resources, a reduction in the consumption of energy and materials in construction, and good resource management."

• Continuity of cultural memory / heritage value -"Visible evidence of the past can contribute... educationally to the cultural identity and memory of



Moving the John Roberts House

Photo: Roy Rodriguez, Jr.

a particular people or place,...giving meaning to the present by interpreting the past."

• Economic and commercial value - "Historic buildings usually possess scarcity, [which] can present opportunities for...tourism." Coupled with tax and other incentives the cost of utilizing them is often lower than for other alternatives.

In fact, a state of Florida Report, "Economic Impacts of Historic Preservation in Florida,"¹ summarizes those impacts as follows:

• Historic preservation creates jobs.

• Historic preservation makes a substantial contribution to tax collections for state and local governments.

• Visitors spend billions of dollars while visiting historic sites.

• Public funds invested in historic preservation grants are matched many times over with private funds in local rehabilitation projects.

• Historic preservation helps to maintain property values.

HERITAGE RESOURCE CONSERVATION GOAL AND OBJECTIVES

In Chapter 2 the goals and objectives for this Open Space Plan included the following for historic resources:

PRESERVE THE TOWNSHIP'S IMPORTANT HISTORIC RESOURCES

Objectives:

- 1. Preserve the church & cemetery at Richardson Rd. and Route 309.
- 2. Preserve the properties near Limekiln Pike and the sewer plant.
- 3. Preserve the historic stone bridge for Limekiln Pike over the Little Neshaminy Creek.
- 4. Adopt a historic overlay zoning district for historic non-residential properties.
- 5. Purchase development rights, façade easements, or other use other methods to preserve historic properties in the township.
- 6. Preserve trees that are historic due to extreme age.
- 7. Preserve the remaining spring houses in the township.



Buckman's Ski Shop, former historic schoolhouse Pho

Photo: MCPC

There are a number of methods to achieve these objectives. This plan has grouped them into two categories: acquisition and non-acquisition methods.

Whether using acquisition or non-acquisition methods, a number of factors need to be considered to prioritize resource conservation:

- historic value,
- vulnerability,
- relationship to open space,
- inclusion in a greenway or located along a trail,
- amount of expenditures needed vs funds available,
- potential or commitment for partnerships,
- additional preservation values such as farmland or natural resources,
- educational value,
- value as a viable economic entity, and
- alternative conservation methods.

HISTORIC RESOURCE ACQUISITION

One of the most straightforward ways for a township to save a historic resource is to buy it. However, protecting it from human destruction is one thing, protecting it from nature and time is another and, depending on the condition of the resource, can lead to major expenditures. For this reason, among others, the Township would prefer to use this method of conservation only when all other methods will not work. Acquisition can also be done by the Township, but ownership and/or maintenance can be taken over by others.



Windlestrae Farmhouse, Windlestrae Park

Photo: MCPC

Often historic resources, especially in public hands, should be shared with residents or tourists. This then entails even more expenditures to restore a resource to a good and valuable condition. Some municipalities do have the support of the citizens to embark on such efforts for the welfare of the whole community, some communities rely on non-profit or private efforts to conserve historic resources, and still others do both. Currently, Montgomery Township has relied on others, the County, the Historic Society, businesses, developers, and private citizens to retain and maintain most of the historic resources in the township although, as with the historic preservation cluster overlay zoning district, the Township has added some incentive to conserving some historic resources.

The list of historic resource preservation objectives provides a "wish list" of resources to be preserved using acquisition, if necessary. Objective 5 refers to historic properties in the township, which includes all the properties included in the inventory of historic resources in Chapter 4. There is not yet an inventory of historic trees or springhouses for the township, but one should be done in order to meet these objectives.

To determine which properties the Township should acquire, or be a partner in an acquisition, the Township would like to meet with the various historic conservation players in the township to discuss and determine the Township's part in the highest priority acquisitions. The following are the township's recommendations for historic resource acquisition:

The resources that have a high value for county, state or national preservation should be suggested for preservation by the County, State or Federal governments. In order to spread the Township resources as far as possible, county, state and federal money should be used to preserve these properties.

The township should focus it resources on lands that have a high value for township preservation that are not already of high value to other levels of government or other agencies.

In both cases the township should work with the state, county and/or historic preservation organizations to ensure the maximum effectiveness of historic conservation.

The various acquisition methods are similar to those for open space and have been added to the list of acquisition methods in Chapter 12.

NON-ACQUISTION METHODS

Some resources can be conserved without public acquisition. This is often the best option when dealing with a large amount of historic resources. Methods to do this are discussed later.

Montgomery Township has a mixed record of successfully preserving its rich history. There are two individual resources that are recognized and listed on the National Register of Historic Places, but only a few of the numerous other historic properties are protected by a historic preservation cluster overlay district in the zoning ordinance. Almost all of the remaining historic resources are not yet protected either by Township incentives or restrictions such as through the Township's zoning ordinance.

Many of the township's historic resources were listed in Chapter 4. Preservation of these resources can be achieved using a variety of methods. Some of these include:

- historic preservation ordinances,
- preservation as part of other preservation efforts,
- designated historic districts,
- historic review boards,

- tax incentives for rehabilitation,
- a façade improvement program,
- a historic plaque program, and
- non-profit programs.

The Township would like to work with the multiple heritage conservation agencies and organizations to prioritize Montgomery's resources and to strategize who will act and how and when. In this way the battle to save and conserve as much of Montgomery's most important historic resources will be an efficient, coordinated, multi-pronged attack.

HISTORIC PRESERVATION ORDINANCES

While not directly related to open space preservation, historic preservation ordinances help save historic properties that add to the character of an area. There are a number of techniques that communities can use for historic preservation.

DEMOLITION PERMIT

One possibility is that municipalities can amend their building codes to require a review before demolition permits are issued. This method delays demolition, allows for community input, and the municipality can require certain documentation such as architectural plans, drawings and/or photographs of the historic building be provided before demolition. Penalties for noncompliance should be significant enough to discourage non-compliance.



Indian Lake Farmstead - slated to be preserved using Historic Preservation Cluster

ZONING

One way of encouraging historic preservation is to provide provisions in the zoning ordinance that gives incentives for preserving buildings or restricts the uses within the district. Incompatible uses can be not permitted in these districts while allowing historic buildings to have more uses than normally permitted in a particular district. For example, apartments, bed and breakfast establishments, or offices might be permitted in historic homes located in a medium-density single-family residential district.

Another way to encourage, or require, historic preservation through the zoning ordinance is with Conservation Design. The current Historic Preservation Overlay District is one type of Conservation Design. Other types involve more careful preservation, more careful site design, and different incentives and reguirements. Conservation Design planning is one of the most effective ways to preserve the character and quality of life for the township. With this process historic resources are to be identified and preserved to the greatest extent possible in development proposals.

TOWNSHIP HERITAGE RESOURCES **CONSERVATION PLAN**

This Open Space Plan is a good step forward for historic resource conservation in the township. However, a more comprehensive and thorough approach to historic conservation in the township would be to draft a Township Heritage Resources Conservation Plan (THRCP) for consideration by the Board of Supervisors and adopted as an amendment to the Comprehensive Plan.

The purpose of a THRPP is to facilitate historic conservation by identifying priority historic and archeological resources so that they can be conserved expeditiously and effectively.

COMBINED AGRICULTURAL. NATURAL AND HISTORIC PRESERVATION

Figure 3 - 1 indicates the two farms and other farmland still left in the township (shown as 319 land). Figures 6 - 1 and 6 - 2 show the lands most valuable for natural and historic resource conservation. The lands identified as important farmland or for natural resource protection are also often important historic resource sites.



Jesse Ambler springhouse, circa 1803

Photo: Roy Rodriguez, Jr.

In these cases preserving one resource might preserve one or more other resources. Windlestrae Park, for example, was preserved as a park, but it also contains one of the township's historic resources, the Windlestrae House.

HISTORIC DISTRICTS

Another possibility is to create or join National Register Historic Districts, which is done with the approval of the Pennsylvania Historic and Museum Commission. While they usually are thought of as a group of historic buildings that are near each other (like a village or neighborhood of a town), they can be thematically similar resources, such as mills or covered bridges, and separated by miles. The themes that could be considered for historic districts are mills, churches, and springhouses.

However, a National Register Historic District is purely honorary; there are no formal protections,



Steever Mill

Photo: Montgomery Township Historic Society

restrictions or incentives directly involved as a consequence of Historic District status.

On the other hand, this honorary status is the most widely used measure of historic value and can be used as the basis for funding, tax and regulation programs.

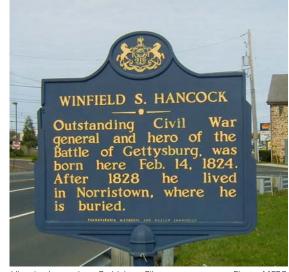
Tax incentives and funding are discussed later, but a common use of the Historic District is when a local municipality uses the clout of the District to ensure further protection of the resources with additional requirements and incentives. In Pennsylvania, acommon method to do this is by establishing special local regulations and a local Historic Architectural Review Board.

HISTORIC REVIEW BOARDS

Once a historic has been established, the Township could establish preservation regulations for that district that are administered by a Historic Architectural Review Board. The regulations can be lighthanded or strict and broad-reaching. This approach is more restrictive than the zoning approaches previously discussed.

FAÇADE IMPROVEMENT PROGRAM

A façade improvement program can encourage property owners to adopt architectural styles that will become consistent throughout the township. This will not homogenize architectural styles, rather it will raise the standard for new buildings, additions, and façade upgrades.



Historic plaque along Bethlehem Pike

Photo: MCPC



Commemorative Plaque in Windlestrae Park

Photo: MCPC

HISTORIC PLAQUE PROGRAM

Many of the historic buildings still existing in the township are not easily recognized. Montgomery would like to initiate a Historic Plaque Program to honor these buildings and the historic events they may represent. In addition to buildings there are other kinds of structures, such as bridges or stone walls, and certain sites, such as the locations of Revolutionary War encampments, that should also be recognized.

EDUCATION, TOURISM, ADAPTIVE REUSE

The richness of the history of the township demands that we do more than preserve it. We should embrace the township's history through education, tourism and adaptive reuse programs. Tours by school children, walking and driving tours, and the plaque program mentioned are all examples of ways that this opportunity can be achieved. Unfortunately, these efforts are beyond the scope of this Plan. A THRPP can recommend innovative policies that will identify historic resources and facilitate creative approaches not only for their preservation, but possibly also for their reuse and for historic education and tourism programs.

TAX INCENTIVES FOR REHABILITATION

One method to encourage private investment in historic resource conservation is with tax incentives.

Currently Township taxes are quite low which is generally a good situation, however that means that even if the Township cut all local taxes on a historic property, it would be very little incentive. On the other hand, federal and state governments have tax incentive programs that can be very attractive to owners of historic properties that would like to rehabilitate or restore the property.

FEDERAL TAX INCENTIVES PROGRAM

The Federal Rehabilitation Investment Tax Credit program is one of the nation's most successful and cost-effective historic revitalization programs. The program fosters private sector rehabilitation of historic buildings and promotes economic revitalization. It also provides a strong alternative to government ownership and management of historic properties. The historic preservation tax incentives are available for buildings that are National Historic Landmarks, that are listed in the National Register, that contribute to National Register Historic Districts and certain local historic districts. Properties must be income-producing and must be rehabilitated according the Secretary of the Interior's Standards for Rehabilitation. Jointly managed by the National Park Service and the Internal Revenue Service in partnership with the PHMC's Bureau for Historic Preservation, the historic preservation tax incentives program rewards private investment in rehabilitating historic buildings by providing a federal tax credit (not a deduction - it is like a rebate).

GRANTS AND LOANS

Existing or prospective owners of historic properties, including the Township, may qualify for any of several grant or loan programs that might make an otherwise impossible acquisition possible. There are state, federal and private sources for these funds.

STATE HISTORIC PRESERVATION PROGRAM

The Keystone Historic Preservation Grant Program is the one grant available for historic preservation in Pennsylvania. Funding under this program is available to nonprofit organizations and local governments for preserving or restoring historic resources listed in or eligible for listing in the National Register of Historic Places. It is competitive, a matching grant, has a maximum award of \$100,000 and funding is for preservation, restoration, and rehabilitation. Currently, the program is supported annually with realty transfer tax revenue. Keystone Historic Preservation Grants requiring a 50/50 cash match are available for the preservation, restoration and/or rehabilitation of historic resources listed in or eligible for listing in the National Register of Historic Places. The grants are administered on a competitive basis, and the awards are made annually based on a peer review process.

Grant awards are subject to the annual availability of funds from the Commonwealth of Pennsylvania. Funding is based on the state fiscal year, July through June.

Nonprofit organizations and public agencies that own or support a publicly accessible historic property listed, or eligible for listing, in the National Register of Historic Places, or that own or support a contributing historic property in a National Register Historic District may apply for grant assistance.

The following are examples of the types of organizations that are eligible to apply for grants. All eligible organizations must be incorporated and in existence for five years prior to submitting a grant application: conservancies, educational institutions, historic preservation organizations, historical societies, local governments, museums, and religious institutions.

FEDERAL PRESERVATION INCENTIVE PROGRAMS

The Transportation Equity Act for the 21st Century (TEA-21): TEA-21 is the successor to the ISTEA program established in 1993. Under this program, ten percent of the funds apportioned to Pennsylvania for the Surface Transportation Program are made available for special "enhancement" activities. Applications could include historic preservation research,



Historic bridge for Limekiln Pike over the Little Neshaminy Creek, 2006

Photo: Roy Rodriguez, Jr.



Joseph Ambler Inn Photo: Montgomery Township Historic Society

planning, acquisition and developmental projects that are along transportation corridors, are related to surface transport facilities, or improve the quality of a highway and its surrounding area. Eligible activities include preservation of historic buildings, access improvements to historic sites, archaeological planning and research, and transportation-related museum projects. The TEA-21 program is administered in cooperation between the Federal Highway Administration (FHWA) and the Pennsylvania Department of Transportation (PENNDOT).

Certified Local Government (CLG) Program: The National Historic Preservation Act of 1966, as amended (16 U.S.C. 470), established the Certified Local Government Program, the legal and administrative context within which State Historic Preservation Offices (SHPOs) relate to and participate in the national historic preservation program. The Act establishes a program of matching grants to the states through which the federal government assists the SHPOs in carrying out their historic preservation responsibilities. Presently, federal law provides that at least 10 percent of the annual Historic Preservation Fund grant allocation to Pennsylvania be set aside for distribution to Certified Local Governments. This amount currently ranges from \$90,000 to \$100,000.

Challenge Cost Share Grants: National Historic Landmark Stewards are invited to submit proposals for the Challenge Cost Share Program (CCSP), a 50% matching fund program. This program provides project funding to preserve or improve natural, cultural and recreational resources for authorized National Park Service (NPS) programs, including National Historic Landmarks (NHLs.) Funding awards range from \$3,000 to \$30,000. Most awards have been in the range of \$10,000 to \$15,000. Montgomery Township 2006 Open Space Plan Chapter 11 - Heritage Resources Conservation

Save America's Treasures: The Save America's Treasures program addresses the urgent preservation needs of the nation's most significant historic sites and collections. Grants are administered by the NPS in partnership with the NEA. The NPS awards and administers grants for historic structures and sites, including historic districts, sites, buildings, structures and objects. The NEA administers grants associated with collections, including intellectual and cultural artifacts, documents, and works of art.

NATIONAL TRUST FOR HISTORIC PRESERVATION

For more than 50 years, the National Trust for Historic Preservation has been helping people protect the irreplaceable. A private nonprofit organization with more than a quarter million members, the National Trust is the leader of the vigorous preservation movement that is saving the best of our past for the future. The National Trust for Historic Preservation provides leadership, education and advocacy to save America's diverse historic places and revitalize our communities. The National Trust for Historic Preservation owns and operates a collection of nationally significant house museums and provides a wide range of preservation services across the country, including grant programs.

The National Trust for Historic Preservation offers the following grants:

<u>Preservation Services Fund</u> provides nonprofit organizations and public agencies with matching grants from \$500 to \$5,000 (typically from \$1,000 to \$1,500) for preservation planning and education



Knapp Farmstead



Montgomery Baptist Church and Photo: Montgomery Township cemetery

efforts. Funds may be used to obtain professional expertise in areas such as architecture, archaeology, engineering, preservation planning, land-use planning, fund raising, organizational development and law as well as preservation education activities to educate the public.

Johanna Favrot Fund for Historic Preservation provides nonprofit organizations and public agencies grants ranging from \$2,500 to \$10,000 for projects that contribute to the preservation or the recapture of an authentic sense of place. Individuals and forprofit businesses may apply only if the project for which funding is requested involves a National Historic Landmark. Funds may be used for professional advice, conferences, workshops and education programs.

Cynthia Woods Mitchell Fund for Historic Interiors provides nonprofit organizations and public agencies grants ranging from \$2,500 to \$10,000 to assist in the preservation, restoration, and interpretation of historic interiors. Individuals and for-profit businesses may apply only if the project for which funding is requested involves a National Historic Landmark. Funds may be used for professional expertise, print and video communications materials, and education programs.

Local Initiative Grants support local nonprofit preservation organizations that are hiring their first full-

Photo: Bill McManus

time staff member. A Technical Assistance grant of up to \$2500 is available for strengthening organizational capacity and developing the resources necessary to hire and effectively use professional staff. Typically, this grant will require the use of the funding to obtain the services of an organizational development consultant.

<u>Collaborative Pilot</u> looks for creative partnership projects that advance the preservation mission and build the preservation movement at the local level. A Technical Assistance grant of up to \$2,500 is available for project planning in the following areas: architecture, landscape architecture, archaeology, engineering, preservation land-use, organizational development, public policy, and law.

The National Trust for Historic Preservation offers the following loans:

National Preservation Loan Fund provides loans to establish or expand local and statewide preservation revolving funds; to acquire and/or rehabilitate historic buildings, sites, structures and districts; to purchase easements; and to preserve National Historic Landmarks.

<u>Inner-City Ventures Fund</u> finances the rehabilitation of historic buildings that serve the economic and community development needs of low-, moderate-, or mixed-income neighborhoods.

RELIGIOUS PROPERTIES PARTNERS FOR SACRED PLACES

Founded in 1989, Partners for Sacred Places is the nation's only non-denominational, non-profit organization devoted to helping Americans embrace, care for and make good use of older and historic religious properties. Partners provides assistance to the people who care for sacred places while promoting a new understanding of how these places sustain communities.

SUMMARY

With good coordination between the various interested parties, good planning, and vigorous interest, Montgomery's historic resources and character can be retained, restored, preserved and conserved for today's and future generations as well as today's and future tourist-oriented businesses.

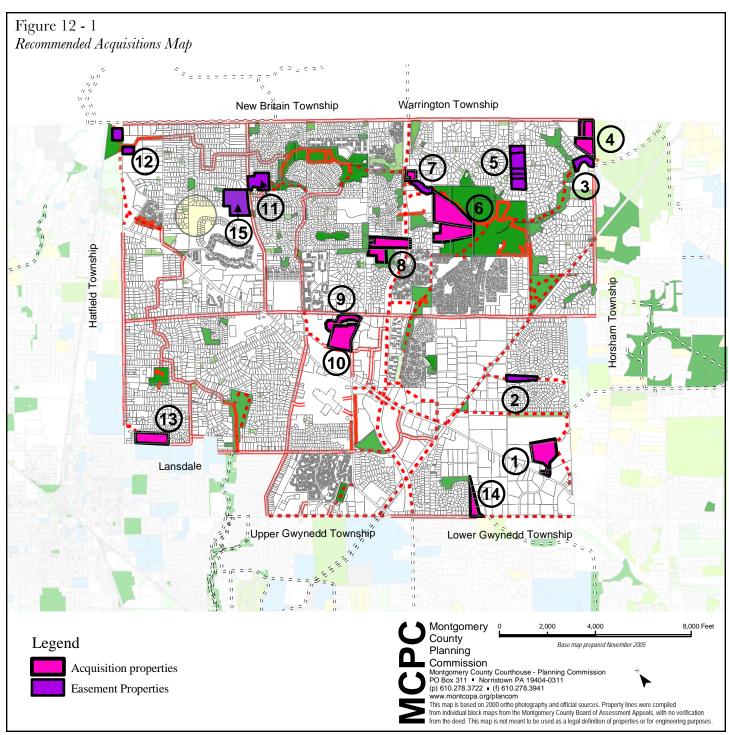
CHAPTER 12 **RECOMMENDATIONS:** ACOUISITIONS

This portion of the Plan details the Township's intentions for open space and resource protection through the acquisition of appropriate lands or easements on those lands. The recommendations of this chapter are based on the data gathered in the previous chapters and reflect Montgomery's intention to locate passive and active recreation areas close to its residents and to preserve lands of ecological importance and farmland. Based upon the analysis contained in the previous plan chapters, some important open space acquisition opportunities still remain within the township, but the increasing demand for housing and other development make it imperative in Montgomery Township to act sooner rather than later.

RECOMMENDATIONS

The following sections describe what acquisitions or easements Montgomery Township would like to pursue to achieve the goals of this plan. The locations of the recommended acquisitions or easements are shown on the map in Figure 12 - 1 and are listed in Figure 12 - 2. Figure 12 - 3 provides a brief overview of the acquisition and easement areas and the major types of uses intended for the area as well as the type of acquisition.

Following these sections there is a discussion of the various methods of acquiring properties and easements.



FEE-SIMPLE AND EASEMENT ACQUISITIONS

Based on the various factors set forth in the previous chapters, the following are the primary fee-simple and easement acquisition priorities, listed in geographic order starting in the southeastern corner of the township: 1. <u>The Gill Tract:</u> (see Figure 12 - 4) About 20 acres are desired to meet the needs of residents in this underserved portion of the township and to preserve some of the township's most valuable natural resources. This area was also identified in the 1995 Open Space Plan for acquisition. Currently, a development that is pending final approval includes proposing dedicating about 19 acres of

Figure 12 - 2 Recommended Acquisitions List

Map Number	Property name	Location	Block/Unit	Size desired
1	Gill Tract (20 acres)	Hartman Road	B18/U15	20 acres
2	Aschenbrand creekway	Hartman Road	B18 / U26	±4 acres
3	Municipal Authority, Steever Mill	Limekiln Pike and Little Neshaminy Creek	B17 / U13, 36	±8 acres
4	Pillegi, Murwin, and Luciano Tracts	Limekiln Pike, Lower State Rd, County Line Rd	B17 / U3, 4, 29	20 acres
5	Kenas Road Properties	Kenas Road	B16 / U10, 11, 25, 33, 43	±25 acres
6	Zehr Tracts	Stump Road	B16 / U21, 48	50 acres
7	Stump Road Properties	Stump Road	B15 / U28, 29	±5 acres
8	Marra and Connelly Tracts	Upper State Road	B15 / U2, 20	27 acres
9	Goldenberg Tract (20 acres)	Horsham Road, North Wales Road	B12/U13	±20 acres
10	Glasgow Quarry	Upper State Road	B12/U12	25 acres
11	Hurd Farm (development rights)	Doylestown Road (Route 202)	B14 / U53	15 acres
12	AEL/Kema Fields	County Line Road, Richardson Road	B1 / U30	±4 acres
13	Lansdale Catholic	Lansdale Avenue	B5G / U65	15 acres
14	Arbor Green Triangle	Welsh Road	B19/U15	6.5 acres
15	Cooper Farm	Doylestown Road (Route 202)	B2 / U9	24 acres

Fee Simple	Acquire Easement		
Active Parks	Passive/Natural Parks	Trails, Development Rights, Natural Conservation	
1 Gill Tract	(14) Arbor Green Triangle	2 Aschenbrand	
6 Zehr Tracts		3 Sewer Authority/ Steever Mil	
8 Marra/Connelly		11 Hurd Farm	
Pillegi, Murwin, and Luciano (5) Kenas		s Rd Properties	
9 Goldenberg Tract (about 25 acres)		7 Stump Rd Properties	
(13) Lansdale Catholic		15) Cooper Farm	
0 Glasgow Quarry			
(12) AEL/Kema Fields			

land to the township for a park. The park is to include active recreation areas, passive recreation improvements such as internal trails, trail connections to the Powerline Trail, and is to preserve some woodlands, wetlands, and a riparian corridor.

2. Aschenbrand creekway: (see Figure 12 - 5) This area was also identified in the 1995 Open Space Plan for acquisition. The Township would like to negotiate with the property owners to purchase either a fee-simple purchase or an access and





conservation easement along the creekway. A trail could then be constructed along this creekway that would connect Hartman Road, the industrial park, and the township's PECO trail to the open space and sidewalks in the Montgomery Oaks and Montgomery Crossing developments and also to the Powerline Trail across the Horsham Township line. The riparian corridor would be preserved and could possibly be restored to provide better water quality (see Figure 4 - 11) in the township.

- 3. Municipal Authority and Steever Mill creekside: The Township would like to negotiate with the property owners to purchase either a fee-simple portion of the properties or an access and conservation easement along the creekway. A trail could then be constructed along this creekway that would connect Windlestrae Park to the proposed trail in Horsham Township and beyond. The riparian corridor would also be preserved and could possibly be restored to provide better water quality (see Figure 4 - 11) in the township.
- <u>4. Pillegi, Murwin, and Luciano Tracts:</u> The Township would like to negotiate with the property owners to purchase the properties for use as active recreation parkland. This is a good location





for this considering the proximity of these properties to the adjacent soccer club and a multitude of access points. Since the land is currently being used for agriculture, the only natural resource value seems to be the small amount of riparian area near County Line Road. The Township could also embark on a meadow restoration or plant succession project. But primarily the value of these properties to the Township would be as recreation land. If acquisition is not feasible in the near term, the township may want to pursue any one of several longer-term acquisition methods discussed later in this chapter, such as installment, life estate, purchase and leaseback, or life insurance methods or the Township may want to buy the development rights and thereby have the option later to buy the land.

5. Kenas Road Properties: These large properties contain one of the largest stands of woods left in the township. The township would like to negotiate with the property owners to purchase a conservation easement to protect the woods from destruction and to agree on a management plan for their maintenance and health. These easements could allow the current owners to continue to live on and use the property yet equitably compensates them for not developing the land.





- <u>6. Zehr Tracts:</u> These two parcels are surrounded by lands of Montgomery Township's flagship park, Windlestrae Park and are comprised of flat, open land as well as creekway and woods. The Township would like to negotiate with the owners to purchase the land fee-simple and then conserve the natural areas and develop the open areas into active recreation areas.
- 7. Stump Road Properties: These several parcels are located along a crucial segment of the township trail system. This segment connects Windlestrae Park to the 202 Parkway Trail and the entire western part of the township. These properties also include two branches of a stream and their riparian habitats. There are a number of scenarios as to how the trail can be achieved and the stream habitat preserved. The Township would like to negotiate with the owners to determine an acceptable solution.
- 8. Marra and Connelly Tracts: These properties contain a large wooded area and a medium-sized open area in a neighborhood of the township that is deficient in parkland. The woods should be preserved and the open space used as a neighborhood park. The Township would like to negotiate with the owners to purchase either the





land or conservation rights or use any of the various other acquisition methods to make acquisition over a period of years.

- <u>9. Goldenberg Tract (20 acres):</u> This area is located in the middle of the township, which makes it a good location for public facilities of communitywide value, such as a town center park, central library, cultural arts center or any of a large number of possibilities. The Township would like to negotiate with the owners to discuss the various opportunities and township involvement.
- 10. Glasgow Quarry: This area was also identified in the 1995 Open Space Plan for acquisition. Currently, the quarry is being filled with clean fill and there is still a lot of volume in the quarry to fill, but some day it will finally be full. At that point the Township would like to negotiate with the owners to purchase either the land or conservation rights or use any of the various other acquisition methods to make acquisition over a period of years.
- <u>11. Hurd Farm (development rights)</u>: The Hurd Farm is located along the township trail system and also abuts a part of Spring Valley Park. If the trail were able to extend around the Hurd's farmland, not only could the trail avoid using side-



Montgomery Township 2006 Open Space Plan Chapter 12: Recommendations: Acquisitions



walks through a residential neighborhood, but also the Hurds could continue to farm the land. The Township would like to negotiate with the owners to purchase a trail easement and an easement to preserve the farm. The Township may want to use any of the various other payment methods to make this possible over a period of years.

- <u>12. AEL/Kema Fields:</u> These fields are located adjacent to Whistlestop Park. The Township would like to discuss with AEL and Kema Realty the possibilities for public use of the ball fields, such as the donation or purchase of an access easement or title to the land.
- 13. Lansdale Catholic: This property is actually split over the boundary with the borough of Lansdale. The portion of the property in Montgomery Township is already being used for active recreation. Acquisition by the Township could ensure that it continues to do so. If his property ever becomes available on the open market, the Township would like to negotiate with the owners to purchase the property.
- <u>14. Arbor Green Triangle:</u> This property is a wooded area between a residential development and a light industrial development. One end is





adjacent to Township open space land, while the other is immediately across Welsh Road from where Lower Gwynedd would like to extend their network. Currently the land is valuable as a natural buffer between the residential and light industrial areas and would probably remain that way for the foreseeable future. This natural area will occasionally need some maintenance or perhaps some help surviving and remaining healthy in the face of human impacts. The Township would like to negotiate with the owners to purchase a conservation easement on the property that would ensure the quality of natural environment will continue or improve. At some point, and with coordination with the residents of the neighborhood, the Township would like to consider purchasing a trail easement along the length of the property.





15. Cooper Farm: At 24 acres, the Cooper Farm is the largest remaining farm in the township. It contains a locally significant historic and scenic farmstead as well as a tributary to the West Branch of Neshaminy Creek. It is adjacent to the Pine Crest golf course, a small piece of Township land along the tributary, and two subdivisions, making it susceptible to development as golf course expansion or as a residential subdivision. The township would like to negotiate with the owner to purchase conservation easements for the riparian corridors and woods, the development rights to preserve the entire farm, or a historic easement to preserve the farmstead.

TRAIL CONNECTIONS AND DEVELOPMENT

The Trail Plan in Chapter 10 describes the townshipwide trail network the Township would like to accomplish. Many of the trails cross through existing Township parkland and will be relatively easy to accomplish. Other segments will not be so easy, but most should not be impossible. Most of the acquisition lands mentioned previously are expected to add some trails, as can be seen in Figure 12-1 where the trail system connects to the acquisition or easement properties. Once the land or the easement is acquired, trails and other improvements can be made. Chapter 10 includes a map that illustrates the implementation priorities for the various trail segments. Other segments will be developed as parts of new subdivisions and land developments and the rest will be implemented by the Township through grants, bonds, the general fund, or other financing methods.

Trails have become important for township residents since:

 parcels of land are becoming more difficult to acquire,

- residents are more interested in various kinds of recreation including the various types of recreation available with trails, and
- trails can increase the economic value of the commercial businesses and residential properties in the township.

As a result, the Township would like to ensure as much of the township trail system is provided as possible.

NATURAL RESOURCE PROTECTION

Preserving ecologically important lands protects waterways and stream quality, conserves plant and animal habitat, and provides areas for groundwater recharge. It also helps preserve the township's character. It is Montgomery Township's intention, first of all, to protect all of these lands via land use controls, such as riparian corridor protection ordinances (see Chapter 13). In addition, larger blocks of natural resource-rich lands should be preserved for public access and greater control over land management wherever possible. The previous section of this chapter discusses the various properties where the Township would like to acquire the land or purchase easements. Some of these properties are valuable to the township for their natural resources particularly:

- portions of the Gill Tract (see Figure 12 4),
- the Aschenbrand creekway (see Figure 12 5),
- Municipal Authority and Steever Mill creekside (see Figure 12 6),
- portions of the Pillegi/Murwin/Luciano properties (see Figure 12 - 7),
- Kenas Road Properties (see Figure 12 8),
- portions of the Zehr Tracts (see Figure 12 9),
- the Stump Road Properties (see Figure 12 10),
- portions of the Manna/Connelly Tracts (see Figure 12 11),
- portions of the Goldenberg Tract (25 acres) (see Figure 12 12),
- portions of the Hurd Farm (development rights) property (see Figure 12 13), and
- the Arbor Green Triangle property (see Figure 12 15).

Also, as more site-specific natural resources information becomes available, such as during the land development review and approvals process, additional lands that are found to be valuable for natural or cultural resource protection may be requested to be dedicated to the Township or a land conservancy.

These areas are intended to be preserved as much as possible using a combination of methods, including but not limited to acquisition of these key resource areas. Other non-acquisition methods the township intends to investigate and/or use are outlined in the following chapter.

AGRICULTURAL PRESERVATION

It its earliest days, Montgomery was a community dominated by farming. Modern development along Route 309 and spreading out from Lansdale and Philadelphia has taken its toll on Montgomery's farms. Only two farms remain and several vacant properties are still on the rolls as farmland. The Township would like for these lands to remain in agricultural use and is willing to buy development rights from at least one of them, the Hurd Farm. The other farm is foreseen as potential golf course expansion or other low-density, low-impact use.

Land currently used for agricultural purposes should continue to be farmed and ideally will remain in private ownership. However, should the farmers offer their land for sale, the Township would like to offer to purchase either the land or the development rights of the land.

HISTORIC PRESERVATION

Map 4 - 1 indicates just some of the many properties valuable for historic preservation. It is important to note that many of the properties identified as containing important historic resources also include important natural resources. As discussed in Chapter 11, there are a variety of methods to preserve a historic resource, and the method of preservation will vary based on ownership goals and resources available. Preservation for historic value can often best be done via land use controls or acquisition if the parcel serves multiple purposes.

Considering overall value and immediate threat, and remembering that acquisition can include easements or other methods, the most immediate acquisition actions by the Township or others should be the following:

- Historic, agricultural, or natural resource properties adjacent to existing historic properties, especially those which would expand or buffer those historic properties.
- Any of the resources shown on the map of historic resources, Figure 4 1, that are threatened by demolition or collapse.
- Any resource listed on or eligible for the National Register.
- Any of the resources shown on the map of historic resources, Figure 4 1, that cannot be preserved by a non-acquisition method.
- Any historic resources, especially any of the resources shown on the map of historic resources, Figure 4 - 1, that are located on a property being considered for preservation for other purposes (i.e. a farm, a natural preserve).
- As more specific information becomes available about certain properties and their potential historic value, the Township may decide that preservation is desired for a resource that is not already mentioned here.

These resources are intended to be preserved as much as possible using a combination of methods. Non-acquisition methods the Township intends to investigate and/or use are outlined in the following chapter.

SCENIC RESOURCES

Figure 4 - 3 highlights some of the most scenic resources in the township. The Township would like to make the following acquisitions to meet this goal:

- Scenic easements on properties along scenic roads in the township.
- Acquire land or development rights to preserve scenic resources.

ACOUISITION METHODS

There are a number of ways a municipality can obtain open space land or resources. An overview of these alternatives is provided here to serve as a guide for Montgomery Township's future open space acquisition efforts. In the long term, all of these could conceivably be used by the Township, although at any given time one or more may be more appropriate than others for acquiring a specific site or preserving a particular resource. More generally, however, they indicate that the Township has some flexibility in its approach to implementing the plan's goals.

FEE SIMPLE ACQUISITION

This option is the most direct way to acquire open space because it involves simply negotiating with a private landowner to arrive at a mutually acceptable purchase price and then completing the deal. The municipality then has free and clear title to the property, or fee simple ownership. Because it is usually a straightforward transaction, municipalities often prefer this approach, particularly for establishing a community park.

Compared to some of the other options, however, this approach can be expensive. It also requires a willing seller, presumes an agreement as to purchase price, and requires a plan to maintain and/or improve the parcel for appropriate use.

INSTALLMENT PURCHASE

This is a variation of fee-simple acquisition in which the municipality agrees to purchase a certain number of acres annually until the full parcel is acquired. In return, the full site is removed from the tax rolls when the initial agreement is signed. The parties may agree to allow the owner to remain on the land until the sale is completed. The advantage of this method is that benefits accrue to both the municipality and the landowner. For a municipality with limited funds, installment buying spreads the cost over a period of time. The landowner in the meantime may be relieved of responsibility for the property when the agreement is signed.

LONG-TERM LEASE WITH OPTION TO BUY

This involves the negotiation of a lease price with a property owner and includes conditions allowing the Township to use and possibly purchase the property. This method provides the municipality with some flexibility. If the property is not needed in the future for open space, it returns to the owner at the end of the lease period.

PURCHASE AND LEASE-BACK

In a purchase and lease-back transaction, the Township buys the land and leases it back to the owner in accordance with agreed-upon policies for the use and protection of the land. The primary advantage is that this permits purchase of property before prices rise or before the property is lost to development. The township also receives some income



Scenic View from Pinecrest Golf Course

Photo: MCPC

from the lease while retaining control of the ultimate use of the land.

PURCHASE AND RESALE

This method is similar to a purchase and lease-back, except that the land is purchased with the sole intent of reselling it with conditions or restrictive covenants in place that will benefit the Township. If the land is acquired at a low cost, the resulting profits help repay initial purchase costs and can be used to acquire additional land. Another advantage is that after resale, the municipality is relieved of ownership and maintenance responsibilities and the land is taxable.



View along PECO powerline where a trail could be located

LEASING

This is a popular, relatively inexpensive way to acquire open space, especially if the land is unlikely to be developed (for example, reservoirs and utility land). The term of the lease usually ranges from 20 to 50 years; long enough to finance anticipated capital improvements. The owner of the leased land prescribes conditions and terms under which the land can be used and the lessee is required to carry liability insurance covering personal injury and property damage.

EASEMENTS

Easements are a useful way to stretch public funds to achieve open space benefits. An easement is a limited right over land owned by another person. The costs of easements vary with the type acquired. Easements can be affirmative or negative. Affirmative easements grant limited rights to the public to use the land for public purposes, such as hiking, fishing, or riding. Such easements can be used selectively to obtain public access to certain portions of private lands for trails and access to water-based recreational facilities. In contrast, negative easements restrict the owner's use of the property. They may or may not allow public access. For example, an agricultural easement requires that the land be kept in some sort of agricultural production. A scenic or historic easement could require a property owner to maintain the scenic or historic quality of the land or structures. This type of easement can also be effective in maintaining a municipality's visually attractive roads.

Conservation easements which require a landowner to preserve important natural resources on the property, can be beneficial to both the landowner and the Township. Agricultural preservation easements are an important tool in preserving farmland — and farming as a way of life — in Montgomery Township.

Use of easements is generally more limited and complicated than land acquisition, but they can limit or prevent destruction and premature development of important township resources. They should be selectively used and tailored to fit the requirements of each particular situation.

EMINENT DOMAIN

Eminent domain is the condemnation of land for a public use by due process of law. It requires a clear declaration of the public purposes for which the land is being condemned and the determination of a fair market value for the property. Before exercising the right of eminent domain, a municipality should study the necessity of obtaining the particular site and the feasibility of acquiring it by other methods. Only if all other methods fail and the property is essential to an open space system should eminent domain be considered.

LAND TRUSTS AND CONSERVANCIES

Land trusts and conservancies are private non-profit organizations that work to further their conservation mission by soliciting donations of land and grants to fund acquisition projects. Administration and management of the land are usually the responsibility of the organization. Private non-profits have an advantage in that they can often move faster to acquire property than can a government agency. Frequently a public-private partnership is formed whereby the private agency acquires land and then resells it to a government agency at a later date.

As noted previously, there are a number of existing conservation groups that work with private landowners to conserve their land. However, such situations may or may not include provisions for public access. Because of this, a municipality should work closely with these organizations and landowners where public access is a goal. In this way, conservancies can function as an additional method of acquiring open space to benefit the township.

LAND EXCHANGES

This method involves the trading of land between a landowner and the township, county or a land trust to obtain mutual advantages.

VOLUNTARY AGREEMENTS

Voluntary agreements can be established between government agencies and owners of agricultural lands, industrial holdings, and utility lands for various public purposes. For example, a utility company might permit the use of a power line right-ofway for a trail. As of the this writing, the Township has successfully received a license from PECO to construct trails on any powerline properties in the township.

PURCHASE OF DEVELOPMENT RIGHTS

If the municipality is interested only in protecting the land or some designated features of a property, then this method of acquisition of partial interests rather than full fee title in land is very effective. In essence, a municipality can preserve significant natural, scenic, historic, or cultural resources by purchasing a landowner's right to develop the property or otherwise alter the character of the features that are deemed worthy of protection. If public access is also desired, the agreement can provide for the purchase, lease or donation of the necessary right-of-way. The purchase of development rights is often coupled with a conservation easement to ensure that the resources will be adequately protected.

RIGHT OF FIRST REFUSAL AND PURCHASE OPTION

These methods involve an agreement specifying that the land may be acquired by the municipality at a future date. A right of first refusal provides the municipality with the option to match an offered purchase price within a specified time period if a landowner receives another offer. A purchase option establishes the municipality's right to purchase the land by a specified date at a specified price. Both a right of first refusal and a purchase option can be either donated or sold to the municipality.

LIFE OR TERM ESTATES

This technique involves the acquisition of land with certain restrictions attached to the deed. A municipality may be better able to negotiate the purchase of property if certain interests in the land are reserved for the benefit of the landowner. For example, a municipality can purchase land with all rights of ownership conveyed except the right to occupy a house or a portion of the full property for a specified term (usually 25 years) or until the death of the landowner. This allows the landowner to remain on the land and secures the property for the municipality, usually at a reduced price because of the delay in obtaining possession. Property can also be donated to the municipality with the reservation of a life estate for the owner.

DONATIONS AND BARGAIN SALES

These methods of acquisition involve obtaining land at less than its full market value. Receiving donations of land or easements is the least expensive way for a municipality to obtain or protect land and can, in some instances, be a wise approach for a landowner to take to directly benefit from tax incentives and the shelter effects of charitable donations. If a full donation of land is not possible, or if the landowner has an immediate need for cash, then a partial donation and bargain sale might be an alternative. By selling land at a price that is less than its market value, a landowner can still receive tax benefits based on the difference between the fair market value of the land and its actual sale price. The primary benefit to these techniques is that a municipality acquires land at a lower cost while the seller obtains tax advantages.

LIFE INSURANCE

In an agreement with a landowner, the Township could buy a life insurance policy on the land owner. The Township pays the premiums on the policy. Upon the death of the landowner, the Township receives the land and the heirs receive the life insurance benefits. This amounts to a sort of life estate on an installment payment plan but the term is indefinite. The Township could end up with land at little expense while the heirs still receive the full, prearranged value (the value of the policy) for the property. It is the insurance company that is taking the risk that the landowner will live long enough for the premiums to pay for the value of the policy's benefits.

SUMMARY

Using the various acquisition methods outlined in this chapter, the Township would like to acquire lands and resources that are designated on the respective maps as high priority for the preservation of natural, agricultural, historic, scenic, and cultural resources in the township.

CHAPTER 13 recommendations:

RECOMMENDATIONS: NON-ACOUISITION PROTECTION METHODS

Acquisition provides the most control over land use, but can also come at a high financial cost. An important part of open space planning involves understanding and using preservation techniques that are not dependent upon land acquisition. The use of these non-acquisition methods of open space preservation may add to the public open space system, but are more commonly used to preserve or protect vulnerable lands that will remain privately held. These tools typically involve land use controls, but also include voluntary agreements with private landowners.

ZONING METHODS PERFORMANCE ZONING

With performance zoning, the residential lot sizes are directly related to the extent of a site's natural features. The lot size corresponds to such features as: high water table soils, floodplains, and steep slopes. When many of these features exist on a site, the minimum lot size must be increased in order to allow for development while minimizing disturbance of the vulnerable resources.

Sites with less environmental constraints or vulnerable resources can accommodate development on reduced lots, typically no smaller than one or two acres. These provisions are placed in the zoning ordinance.

Basically, performance zoning necessitates that the required minimum lot area be free of vulnerable resources. For example, a lot having 1.5 acres of vulner-

able resources (floodplains, wetlands, etc.) in a district having a minimum lot size of 1 acre would have to be 2.5 acres (1.5 + 1 = 2.5) in size. This reserves a portion of the lot to be used for residential purposes while being large enough to adequately absorb the vulnerable resources.

Within a zoning ordinance, performance zoning generally applies protection ratios to a wide range of vulnerable resources such as floodplains, wetlands, steep slopes, soils, geology, woodlands, etc. The protection ratios are multiplied by the area of each vulnerable resource on the lot. This area then subtracted from the lot area to yield the net lot area. And the net lot area must be equal to or greater than the required minimum lot size. For example a proposed 3-acre lot containing 1-acre of floodplains, having a 100 percent protection ratio, and 1.5-acres of steep slopes, having a 50 percent protection ratio, would have a net lot area of 1.25 acres as calculated below:

1.50 (acres of steep slopes) \times 0.50 = .75 acre

- 1.00 (acre of floodplain) x 1 = 1.00 acre
- 1.00 (floodplain) + 0.75 (steep slopes) = 1.75

3.00 - 1.75 = 1.25 net acres

Therefore, this lot would be permitted if the required minimum lot size was 1 acre, but would have to increase the size of the lot if the required minimum lot size was 2 acres.

MONTGOMERY'S PROPOSED ACTION

Performance Zoning will be considered in each of



A tributary of the Neshaminy Creek near Richardson Road

the Township's zoning districts in order to protect the township's vulnerable resources. While Performance Zoning is applicable across the entire township, it may be especially useful within the Little Neshaminy and Neshaminy Creek watersheds. At a minimum, the consideration of environmental constraints will be used in all zoning districts to determine developable land for subdivisions and land developments.

CONSERVATION SUBDIVISIONS

One method to preserve open space is to cluster homes within one portion of a development and reserve the rest for permanent open space. The overall density of the site is about the same, while the homes are on smaller lots. The open space area might preserve the views, historic landscapes, farmland, or natural features. The open space may then be dedicated to the Township as parkland.

Through clustering, up to 50 or 60 percent of the site can be preserved. The open space may be in the developed portion of the site so that the homes have neighborhood open space. While this type of development preserves natural resources, it also benefits the developer by lowering infrastructure costs (reducing road length, stormwater facilities, and utility lines).

MONTGOMERY'S PROPOSED ACTION

The Township currently permits cluster subdivisions within certain residential zoning districts or in certain circumstances, such as for historic preservation. As land is becoming more scarce, the conservation subdivision option may be expanded and even required within certain districts.

VIEWSHED AND SCENIC RESOURCES PROTECTION

Communities can reduce the visual impact of new development by encouraging or requiring homes to be located in a way that preserves existing views. For example, the zoning could allow a smaller lot size if homes are located in wooded areas or behind ridgelines. In other ways, the community could require homes that will be located along existing roads to have a larger lot size, including larger setbacks from the road, or screening vegetation between the road and the home.

Photo: MCPC

MONTGOMERY'S PROPOSED ACTION

In addition to the views and scenic resources identified in this plan, Montgomery will conduct a future viewshed and scenic resources study to identify additional sites. These sites will serve as the basis for protection. Protection of the viewsheds will involve either increased lot and building setbacks from tract boundaries or protection of the identified viewsheds as part of preserved open space in conservation subdivisions.

NATURAL RESOURCE PROTECTION ORDINANCES

The ordinances discussed below protect natural features such as floodplains, stream corridors, wetlands, groundwater, steep slopes, and woodlands.

STEEP SLOPES

Development on steep slopes, which are typically slopes of 15 percent or more, can be restricted or prohibited through steep slope ordinances. Development often is permitted on slopes of 15 percent to 25 percent if the minimum lot size is increased and/or the percent of the lot disturbed is limited. Some steep slope ordinances prohibit all development, although typically development is prohibited on extremely steep slopes such as 25 percent or more.

FLOODPLAINS

Floodplain ordinances (which exist in Montgomery County municipalities) restrict or prohibit development within floodplains, especially development within the 100-year floodplain. There are typically three types of floodplain restrictions in the county. One type allows development within the floodplain provided that buildings are flood-proofed. Many ordinances do not allow building within the floodplain. This type of ordinance protects properties from flood damage, protects the environment within the floodplain, and also reduces the possibility of raising the flood level. A third type of ordinance not only restricts development within the floodplain but also requires a minimum setback from the edge of the floodplain. This type of ordinance protects the unique wooded habitat, or riparian woodlands, of the floodplain.

STREAM CORRIDORS AND WETLANDS

Stream corridor protection ordinances go beyond floodplain ordinances to protect the water quality of the stream in addition to plant and animal habitats. These ordinances have a minimum setback requirement from the stream bank where no development can occur. A minimum setback of 75 feet from the stream bank, for example, will help stabilize the stream bank, control sediment, remove nutrients that would pollute the stream, moderate stream temperature, and preserve wildlife habitat. The area within the setback should be left in its natural state.

In addition to federal and state governments, municipalities can regulate development that occurs on wetlands. Municipalities can prohibit development on wetlands and require wetlands to be shown on development plans. While developers can locate homes right next to wetlands (after receiving all the federal and state permits needed), such location might lead to future problems. Homeowners might decide to fill in the wet areas behind their home to have a more usable back yard. To prevent this, local municipalities can require a minimum building setback from wetlands. While federal and state regulations address only the filling of wetland and not the destruction of vegetation within the wetlands, municipalities can take the extra step and require the replacement of destroyed wetlands vegetation.

GROUNDWATER PROTECTION

There are multiple ways to protect groundwater quality. The first involves stormwater ordinances which include provisions for groundwater recharge



Wissahickon Creek in Natural Park

Photo: MCPC

and the removal of pollutants from stormwater runoff. Comprehensive stormwater ordinances also require the identification of "hotspots." These "hotspots" are land uses that involve the use of certain hazardous materials. The stormwater ordinance imposes more stringent runoff containment measures that help prevent the release of hazardous material into waterways or groundwater via stormwater .

A second method of groundwater protection involves the identification of wellhead protection areas. Wellhead protection areas consist of the surface area around a well that directly contributes to recharging the well. Wellhead protection ordinances regulate the contribution area by restricting the uses permitted, limiting the intensity of development, and by regulating land management techniques. A municipality can also impose design standards that



A pathway through the woods in Natural Park

would not allow, for example, hazardous materials containment structures or large impervious areas such as parking to limit potential groundwater pollution.

WOODLANDS

Protection of existing trees and woodlands can be accomplished with woodland preservation ordinances. Some ordinances provide minimum standards that must be followed during construction for trees that will remain. Other ordinances, when existing trees are preserved, allow developers to put up fewer street trees, buffers, or individual lot trees. Tree replacement is another requirement of some ordinances.

MONTGOMERY'S PROPOSED ACTION

The Township has floodplain regulations consistent with the minimum standards required by the Federal Emergency Management Agency (FEMA). In addition the Township's subdivision and land development ordinance has landscape standards that include significant woodland protections.

In addition, the Township has adopted stormwater controls that required the integration of infiltration and water quality measures in all new development. The concept of "hotspots" is still an idea to be considered.

The applicability of a community-wide wellhead protection ordinance for Montgomery needs to be investigated given the amount of public water supply wells within the township. Should new any developments propose a community water system using groundwater, the Township will consider developing standards for a wellhead protection ordinance.

TRANSFER OF DEVELOPMENT RIGHTS

This method of preserving rural land transfers development from rural areas to growth areas. With a transfer of development rights program, some landowners can sell their development rights to developers in the township's growth areas instead of developing their own land.

For example, a landowner who has 20 acres might normally be allowed to subdivide them into twenty 1-acre lots. Instead, with a TDR program, the landowner sells the right to build these 20 lots to a developer in a growth area. The developer adds those 20 units, or more as appropriate, to the number of units normally allowed to be built. The rural landowner, who has been paid for these develop-

Photo: MCPC

ment rights, is then required to deed restrict the land against any future development.

MONTGOMERY'S PROPOSED ACTION

The Future Land Use Plan within the Comprehensive Plan does not designate any portion of Montgomery Township as a growth area. Since there is minimal applicability of Transfer of Development Rights without an identifiable growth area, Montgomery will not immediately be considering the use of this option. However, the use of Transfer of Development Rights across township borders may be something that will be further investigated in the future. Perhaps a version of this might be used to convert residential development rights to increased commercial rights. This may be especially applicable for the transfer of residential development rights to the township's industrial district. This will help to preserve open space and protect township charac-



Whistlestop Park was donated to Montgomery Township

ter, without adding more residential units (perhaps even reduce the number) to the school district than would otherwise have been developed, as a TDR program is likely to do. Plus, it has the added benefit of encouraging economic development in areas well suited for this type of land use.

DONATIONS OF PROPERTIES FOR OPEN SPACE

Landowners can preserve their land by donating the full title of their property or by donating their development rights to the Township or a nonprofit land conservation group.

Landowners who donate development rights receive tax benefits and their land must be permanently restricted from future development. Land conservation groups that operate in this region of Montgomery County and who receive donations include: Montgomery County Lands Trust, Natural Lands Trust, and Heritage Conservancy.

Some land conservation groups can also help local landowners to develop some of their land while keeping the majority of the land open and deedrestricted. This approach ensures that land is developed in a sensitive manner yielding the landowner some monetary compensation, while also preserving the most important environmental amenities on the site.

MONTGOMERY'S PROPOSED ACTION

The Township intends to cooperate with multiple conservation organizations to disseminate information regarding the programs these conservation organizations can offer to its citizens. Through mailings and workshops, the Township can fully educate the public about the preservation options, and tax advantages, available to them as landowners.

REQUIRING OPEN SPACE IN DEVELOPMENTS OR A FEE IN LIEU OF OPEN SPACE

Municipalities can require developers to provide open space through their zoning and/or the subdivision ordinance.

An open space requirement when placed in the zoning ordinance must be located in specific zoning districts (for example the high-density residential district). The zoning ordinance can specify the percentage of required open space, for example between 35 and 50 percent, and other criteria relevant to the maintenance of common open space.

Photo: MCPC



Autumn Woods Park was acquired as part of the development

Photo: Montgomery Township

The municipality can not require the open space to be dedicated or open to the public or to include specific recreational facilities. However, the community can require that the land meet specific standards such as being flat, open land suitable for playing fields.

The subdivision ordinance can also require developers to provide open space but it also allows further provisions. The ordinance can require the land to be dedicated to the Township. If a developer does not want to provide the land, the ordinance can require fees in lieu of land. An adopted recreation plan must be in existence in order to have this re-



Whispering Pines Park was acquired as part of the development

Photo: Montgomery Township

quirement and must follow the provisions within the Pennsylvania Municipalities Planning Code. A community needs to make a decision of whether fees in lieu of land should be accepted so as to create larger central parks for a number of neighborhoods or if there should be smaller scale open space within developments. Requiring developments to provide open space allows municipalities to meet the needs of new residents without building additional municipal parks. The provision of requiring open space or a fee in lieu of land allows for a community to have flexibility in establishing their open space priorities.

MONTGOMERY'S PROPOSED ACTION

The Township intends to enact some form of open space dedication requirement throughout the township and will encourage the fee-in-lieu option as a way to develop an extensive and inclusive park system.

HISTORIC PRESERVATION ORDINANCES

While not directly related to open space preservation, historic preservation ordinances help save historic properties that add to the character of an area. There are a number of techniques that communities can use for historic preservation.

One possibility is that communities can amend their building codes to require a review before demolition permits are issued. This method delays demolition and allows for community input. Communities can also amend their zoning ordinance to encourage historic preservation. One way of encouraging historic preservation is the creation of a village ordinance that gives development bonuses for preserving buildings or restricts the uses within the district. Incompatible uses with historic areas, such as gas stations, are not permitted in these districts. The zoning ordinance can also encourage historic preservation by allowing historic buildings to have more uses than normally permitted in a particular district. For example, apartments, bed and breakfast establishments, or offices might be permitted in historic homes located in a single-family detached residential district.

A third possibility is that communities can create historic districts with approval of the Pennsylvania Museum Commission. This approach is more restrictive than the previous approaches discussed. Once a historic district is created, townships or boroughs have stringent control over design and preservation



Open space at Doylestown Road and at County Line Road

Photo: MCPC

of facades. A township or borough architectural review board is required to be created to review all proposed changes to historic buildings.

Yet another method to preserve historic structures is to use incentive zoning techniques, such as clustering new homes on a large property so that the historic home is preserved and retains much of its historic landscape.

MONTGOMERY'S PROPOSED ACTION

Montgomery was one of the most progressive communities in the county with regard to adopting a historic preservation cluster zoning district. It has successfully preserved several historic properties. The Township would like to consider expanding this ideas and perhaps investigate other methods to preserve more of its ever-disappearing historic buildings. Perhaps as new construction begins to wane, redevelopment may become more prominent and the Township would like to consider providing bonuses for the reuse of existing buildings, permit mixed uses, and include design standards for the preservation of historic character.

In addition, the Township would like to investigate the establishment of historic districts in the township.

Thirdly, the Township would like to investigate proposing a new demolition permit process that would help protect or document buildings proposed to be demolished.

AGRICULTURAL SECURITY AREA

State law allows groups of farmers, with municipal approval, to create agricultural security districts. These districts must comprise at least 500 acres, although the farms do not have to be contiguous. If a municipality has farms but cannot meet the acreage requirement, it can join another municipality's district. Landowners who join one of these districts have absolutely no obligations whatsoever, but they do receive three distinct benefits.

First, farms in agricultural security areas are protected from new ordinances that would restrict normal farming operations or define farms as nuisances. However, the farm operation must use acceptable farming practices that do not threaten the public health, safety, and welfare.

Second, condemning land in agricultural security areas is more difficult. Land condemnations by the Commonwealth or local municipal authorities, school boards, and governing bodies must be reviewed and approved by a state agricultural board before any action can be taken.

Third, farms in an agricultural security area can apply to sell their development rights to the county and state. When development rights are sold, farmers receive the difference between the development value of their property and the farm value of their property. In return, a conservation easement is



Pathway to Fellowship Park

Photo: MCPC

placed on the property, permanently restricting any non-farm development on the property. This program permanently preserves farms.

MONTGOMERY'S PROPOSED ACTION

The Township will continue to educate farmers about the benefits of the ASA program and encourage them to join a nearby ASA.

TRAIL AND PATHWAY DEVELOPMENT

Municipalities can require developers to provide onroad or off-road trails and pathways through the zoning and/or the subdivision ordinance.

A trail or pathway development requirement when placed in the zoning ordinance can be located in specific zoning districts or as a general requirement for all districts. The zoning ordinance can specify the situations in which trails and pathways are to be provided and other criteria relevant to the ownership and maintenance of trails and sidewalks. The municipality can require the trails or pathways to be dedicated and open to the public and to include specific facilities such as bridges and street crossings as well as meet specific standards such as being handicapped accessible and a certain paved width.

The subdivision ordinance can also require developers to provide trails and pathways but it also allows further provisions. This ordinance also can require the trail or pathway to be dedicated to the Township and require a certain width of land be provided as a public right-of-way, just like a road. If a developer does not want to provide the land, the ordinance can require fees in lieu of a trail or pathway or funds can be escrowed to build a trail or pathway at a future date. Requiring developments to provide trails and pathways allows municipalities to meet the needs of new residents without building additional municipal parks and it connects these and surrounding residents to the parks that do exist.

MONTGOMERY'S PROPOSED ACTION

In addition to the acquisition methods mentioned in Chapter 12, the Township will investigate adding appropriate language to the Zoning and/or the Subdivision ordinances to require or create incentives for developers to provide segments of the trail and pathway system. Also, discussions for the Township's annual budget will include considerations for trail construction, improvement, striping, signage, and maintenance.

CHAPTER 14 implementation

BACKGROUND

Implementation is perhaps the most important part of the plan. Having identified and examined the open space issues important to the Township, a timeframe for implementation is established here to guide the Township toward achieving its goals. In the near term (Phase One), implementation principally involves acquiring open space using the remainder of the Township's funding allocation under the County open space program; basically, this means doing so over the next three years (2005 through 2007). It also means taking other, non-acquisition actions for open space preservation and recreation facility planning and development. In the longer term (Phase Two), implementation will build upon these earlier efforts.

IMPLEMENTATION MATRIX

Figure 14 - 1 lists each recommendation, method of implementation, responsible party, potential fund-ing source, and priority. These recommendations

are described in further detail in Chapters 12 and 13. The matrix is followed by an implementation timeline and a list of funding sources.

RESPONSIBILITY

While the Open Space Committee will continue to meet to ensure implementation of the plan, for each proposed action, primary responsibility is proposed among the following Township groups:

- Township Supervisors
- Environmental Advisory Committee
- Historic Society
- Open Space Committee
- Ordinance Committee
- Park and Recreation Board
- Planning Commission

PRIORITY CATEGORIES

Different priority levels have been assigned to each recommendation based on many factors.

They are as follows:

- Short-term (Urgent) Priority actions should begin immediately (2006-2007) and be accomplished as quickly as possible.
- Medium-term (High) Priority actions should begin within the next three years (2006-2009).
- Long-term Priority Projects, which are generally long-term, should begin within the next ten years (2006-2016).

Priorities may shift over the years, and a priority assignment of Medium- or Long-term Priority does not prevent a project from being implemented immediately if the situation warrants.

SPECIFIC PROJECTS

Acquisition properties were identified in Chapter 12 and shown in Figure 12 - 1. The Township's trail plan is discussed in Chapter 10 and shown in Figure 10 - 2 and the trail implementation plan is shown in Figure 10 - 3.

FUNDING SOURCES

In addition to the funds allocated through the County Open Space Program, Montgomery Township is eligible for funds from a variety of sources including grants, general revenue funds, bond issues, and donations (of cash, materials, or labor).

Montgomery Township will pursue other grants available from Montgomery County, the Depart-

ment of Conservation and Natural Resources (DCNR), and others. These grants can be used in conjunction with the County's Open Space grants to help defray the cost of the Township's match. A sampling of possible grant sources is described below.

MONTGOMERY COUNTY OPEN SPACE GRANTS (MCOS)

In 2003, a referendum to fund open space and green infrastructure projects was passed in Montgomery County. Know as the Green Fields/Green Towns Program, this funding was allocated to municipalities, private non-profit conservation organizations, and the county to preserve more open space and enhance the livability of existing communities throughout the county.

Montgomery Township is eligible to receive a total of almost \$1,500,000 for open space acquisition and enhancement. This grant requires matching funds equal to 20% of project costs from the municipality. The county grants come with several conditions. The most important condition is that any land purchased with grant money must be permanently preserved as open space or for active recreation. Another condition is that Montgomery Township must complete and adopt its Open Space Plan. This plan must be approved by the County's Open Space Board before grant money can be disbursed.

PENNSYLVANIA DEPARTMENT OF CONSERVATION AND NATURAL RESOURCES (DCNR)

DCNR manages a variety of grant and technical assistance programs concerned with a variety of issues . DCNR annually awards about \$30 million in planning, acquisition, and development grants for parks, recreation, rivers conservation, trails, greenways, and protection of open space and critical natural areas. Most DCNR grants require a 50/50 match. DCNR also provides pre-application workshops to assist applicants in the preparation of their application forms.

A priority goal of the these programs is to develop and sustain partnerships with communities, nonprofits, and other organizations for recreation and conservation projects and purposes. With this in mind, the Community Conservation Partnerships Program (C2P2) was established. It is a combination of several funding sources and grant programs,

Figure 14 - 1 Implementation Matrix

Category	Action	Responsible Party	Potential Funding Sources (see text for abbreviations)
	SHORT TERM (URGENT) PRIORITY	,	
Community, Neighbor- hood and Natural Parks	Acquire land and develop a park with community and neighbor- hood facilities and natural conservation at the Gill tract (see Fig- ure 12 - 1).	Park Board, Supervisors	Zoning require- ment, MCOS, DCNR, KEY
Trail Development	Develop Trail Segment #1 (see Figure 10 - 3).	Park Board, Supervisors	Zoning require- ment, MCOS, DCNR
Community, Neighbor- hood and Natural Parks	Acquire land and develop a park with community and neighbor- hood facilities and natural conservation at the Zehr tract (see Figure 12 - 1).	Park Board, Supervisors	Zoning require- ment, MCOS, DCNR, KEY
Natural Resources	Cooperate with multiple conservation organizations to dissemi- nate information regarding the programs these conservation organizations can offer to its citizens.	EAC, Supervisors	N/A
Trail Development	Revise Zoning and/or Subdivision and Land Development Ordi- nance to require the installation of pathways and pathway con- nections.	Ordinance Committee, Planning Commission, Supervisors	N/A
Community, Neighbor- hood and Natural Parks	Acquire land and/or easements to preserve the woods and develop a neighborhood park at the Marra and Connelly properties (see Figure 12 - 1).	Park Board, Supervisors	Zoning require- ment, MCOS, DCNR, KEY
Historic Preservation	Revise Zoning and/or Subdivision and Land Development Ordi- nance to provide bonuses for the reuse of existing historic build- ings, permit mixed uses, and include design standards for the preservation of historic character.	Ordinance Committee, Planning Commission, Supervisors	N/A
Historic Preservation	Develop a new demolition permit process that would help pro- tect or document buildings proposed to be demolished.	Ordinance Committee, Supervisors	N/A
Trail Development	Develop Trail Segments #2 and #3 (see Figure 10 - 3).	Park Board, Supervisors	Zoning require- ment, MCOS, DCNR
Community and Neighborhood Parks	Acquire land to develop a community and neighborhood park at the Pillegi, Murwin, and Luciano properties (see Figure 12 - 1).	Park Board, Supervisors	Zoning require- ment, MCOS, DCNR, KEY
Community, Neighbor- hood and Natural Parks	Enact some form of open space dedication requirement through- out the township and will encourage the fee-in-lieu option.	Ordinance Committee, Planning Commission, Supervisors	N/A
Historic Preservation	Establish thematic historic districts or nominate Montgomery his- toric resources for existing districts.	Historic Society	РНМС
Natural Resources	Consider revising Zoning and/or Subdivision and Land Develop- ment Ordinance to include riparian corridor, wetlands, and steep slopes protection provisions.	Ordinance Committee, Planning Commission, Supervisors	N/A
Farmland Preservation, Trail Development, Natural Resources, Historic Preservation	Pursue acquiring development rights and historic easements for the Hurd and Cooper Farms, a trail easement on the Hurd Farm, and a conservation easement on the Cooper Farm.	Open Space Commit- tee, Historic Society, Supervisors	MCOS, DCNR, TWP REV & BONDS, DONA- TIONS

Figure 14 - 1 (continued) Implementation Matrix

Category	Action	Responsible Party	Potential Funding Sources (see text for abbreviations)	
MEDIUM TERM (HIGH) PRIORITY				
Community, Neighborhood and Natural Parks	Consider the use of Transfer of Development Rights across township borders and perhaps a version of this might be used to convert resi- dential development rights to increased commercial rights.	Ordinance Committee, Planning Commission, Supervisors	N/A	
Natural Resources	Consider restrictions on "hotspot" uses and the applicability of a community-wide wellhead protection ordinance (see page 129).	Ordinance Committee, Planning Commission, Supervisors	N/A	
Natural Resources	Conduct a viewshed and scenic resources study and implement the recommendations.	EAC, Planning Com- mission, Supervisors	N/A	
Natural Resources	Discuss easements with the Municipal Authority and Steever Mill owners, the Hurds, the Stump Road and Kenas Road property own- ers, the Aschenbrands	EAC, Park Board, Su- pervisors	MCOS, DCNR, KEY	
Community, Neighborhood and Natural Parks	Discuss future acquisition options with Lansdale Catholic, the Goldenburgs, the Nappens (Arbor Green Triangle)	Park Board, Supervi- sors	MCOS, DCNR, KEY	
Trail Development	Develop Trail Segments #4, #5 and #6 (see Figure 10 - 3)	Park Board, Supervi- sors	Zoning require- ment, MCOS, DCNR	
LONG TERM PRIORITY				
Community, Neighborhood and Natural Parks	Discuss future acquisition options with the Glasgow Quarry	Park Board, Supervi- sors	MCOS, DCNR, KEY	
Trail Development	Develop all remaining trail segments (see Figure 10 - 3)	Park Board, Supervi- sors	Zoning require- ment, MCOS, DCNR	

including the Commonwealth's Keystone Recreation, Park and Conservation Fund (KEY 93, described below), the Environmental Stewardship and Watershed Protection Act (Growing Greener, also described below), Act 68 Snowmobile and ATV Trails Fund, the Land and Water Conservation Fund (LWCF), and the Recreational Trails component of the Transportation Equity Act for the Twenty-First Century (TEA-21).

PENNSYLVANIA DEPARTMENT OF EN-VIRONMENTAL PROTECTION (DEP)

The Growing Greener program has funded efforts to clean up Pennsylvania's rivers and streams, reclaimed abandoned mines and toxic waste sites, invested in new alternative energy sources, preserved farmland and open space, and developed watershed restoration programs. Thus far, Growing Greener has generated nearly \$1.50 in matching funds for the environment for every \$1.00 in state money. As the Growing Greener program evolves, it will focus on brownfield redevelopment, farmland and open space preservation, water quality improvements, enhanced state and community parks, and an upgraded fish and wildlife infrastructure. Growing Greener II will accomplish these goals while making critical investments in community revitalization and the promotion of the use of clean energy.



A Cooper's Hawk in a Montgomery Photo: Roy Rodriguez, Jr. Township yard

KEYSTONE RECREATION, PARK, AND CONSERVATION FUND (KEY)

The Keystone Recreation, Park and Conservation Fund Act was signed into law in 1993. It directs a portion of the state's Real Estate Transfer Tax to the Keystone Fund, establishing a dedicated and permanent funding sources for recreation, parks, conservation, and other programming. Grants from this program require a minimum 50% match from the recipient municipality or nonprofit organization. As of 2002, \$144 million had been granted to more than 2,100 projects. The demand on the Keystone Fund already outstrips resources by a 4 to 1 margin.

PENNSYLVANIA DEPARTMENT OF COMMUNITY & ECONOMIC DEVELOPMENT (DCED)

The mission of DCED is "To foster opportunities for businesses and communities to succeed and thrive in a global economy, thereby enabling Pennsylvanians to achieve a superior quality of life." Therefore there are several assistance and grant programs available to Pennsylvania municipalities. Often, local economic and community revitalization efforts are supported by the implementation of green infrastructure and open space plans. Below is a list of programs offered by DCED through which revitalization funds may flow to implement the recommendations described in this open space plan.

- Community Development Block Grant Program (CDBG) - Provides grant assistance and technical assistance to aid communities in their community and economic development efforts.
- Community Revitalization Program (CR) Provides grant funds to support local initiatives that promote the stability of communities.
- Main Street Program This program provides assistance for revitalization planning and projects.
- Elm Street Program Grant funds for planning, technical assistance and physical improvements to residential and mixed use areas in proximity to central business districts.
- Industrial Sites Reuse Program Grant and lowinterest loan financing to perform environmental site assessment and remediation work at former industrial sites.

PENNSYLVANIA HISTORICAL & MUSEUM COMMISSION (PHMC)

Many communities value their historic resources and work to preserve them for future generations. These resources can then be integrated into the open space network and cultural amenities of that community to enhance local image and aesthetics. The PHMC offers several programs that aid municipalities in these efforts.

- Certified Local Government Grant Program Provides funding for cultural resource surveys, national register nominations, technical and planning assistance, educational and interpretive programs, staffing and training, and pooling CLG grants and third party administration.
- Keystone Historic Preservation Grant Program - Funding for preservation, restoration, and rehabilitation.
- Pennsylvania History and Museum Grant Program - Funding under this program is designated to support a wide variety of museum, history, archives and historic preservation projects, as well as nonprofit organizations and local governments. There are 10 types of grants.

PENNSYLVANIA DEPARTMENT OF TRANSPORTATION (PENNDOT)

SAFE ROUTES TO SCHOOL

This category includes projects for bicyclists and pedestrians that permit safe passage for children to walk or bike to school. This includes activities that enhance the transportation system through the construction of new facilities or the improvement of existing facilities to make them more usable for pedestrians and bicyclists. Some examples of eligible activities include: sidewalk improvements, pedestrian/bicycle crossing improvements, bike lanes, traffic diversion improvements, off-street bicycle and pedestrian facilities. In addition, this program may fund traffic calming measures to slow the speed of cars such as the following: curb extensions, bulbouts, traffic circles, raised median islands, speed humps, textured or raised crosswalks. Funds cannot be used for bicycle and pedestrian facilities that are solely for recreational use.

HOME TOWN STREETS

This category includes a variety of streetscape improvements that are vital to reestablishing our downtown and commercial centers. These will include activities undertaken within a defined "downtown" area that collectively enhance that environment and promote positive interactions with people in the area. Projects may include sidewalk improvements, planters, benches, street lighting, pedestrian crossings, transit bus shelters, traffic calming, bicycle amenities, kiosks, community "gateway" plantings, signage and other visual elements.

DELAWARE VALLEY REGIONAL PLANNING COMMISSION (DVRPC) TRANSPORTATION AND COMMUNITY DEVEL-OPMENT INITIATIVE

The TCDI program is intended to assist in reversing the trends of disinvestment and decline in many of the region's core cities and first generation suburbs by:

- Supporting local planning projects that will lead to more residential, employment or retail opportunities;
- Improving the overall character and quality of life within these communities to retain and attract business and residents, which will help to reduce the pressure for further sprawl and expansion into the growing suburbs;
- Enhancing and utilizing the existing transportation infrastructure capacity in these areas to reduce the demands on the region's transportation network; and
- Reducing congestion and improving the transportation system's efficiency.

CONGESTION MITIGATION AND AIR QUALITY IMPROVEMENT PROGRAM (CMAQ)

This program seeks transportation-related projects that can help the region reduce emissions from highway sources and meet National Clean Air Act standards. The program covers the DVRPC region of Bucks, Chester, Delaware, Montgomery, and Philadelphia counties in Pennsylvania; and, Burlington, Camden, Gloucester and Mercer counties in New Jersey.

TRANSPORTATION ENHANCEMENT PROGRAM (TE)

Transportation Enhancements is a set-aside of Federal highway and transit funds, mandated by Congress in the Transportation Equity Act for the 21st Century (TEA-21) for the funding of "nontraditional" projects designed to enhance the transportation experience, to mitigate the impacts of transportation facilities on communities and the environment, and to enhance community character through transportation-related improvements.

NATIONAL PARK SERVICE RIVERS, TRAILS, AND CONSERVATION ASSISTANCE PROGRAM (NPS)

The program offers technical assistance only to nonprofit organizations, community groups, and local or state government agencies. Rivers and Trails technical staff offers the following types of assistance for recreation and conservation projects:

- Building partnerships to achieve community-set goals
- Assessing resources
- Developing concept plans
- Engaging public participation
- Identifying potential sources of funding
- Creating public outreach
- Organizational development
- Providing conservation and recreation information

PECO ENERGY GREEN REGION OPEN SPACE GRANT PROGRAM (PECO)

PECO Energy, a subsidiary of Exelon, is currently involved in several environmental partnerships including "TreeVitalize," with DCNR, clean water preservation with The Nature Conservancy, and environmental education initiatives with the Schuylkill Center for Environmental Education and Green Valleys Association. Green Region grants are available to municipalities in amounts up to \$10,000. The grants can be used with other funding sources to cover a wide variety of planning and direct expenses associated with development and implementing open space programs, including consulting fees, surveys, environmental assessments, habitat improvement, and capital improvements for passive recreation.

GENERAL REVENUE FUNDS AND BOND ISSUE (TWP REV & BONDS)

Montgomery Township has the option of using general revenue funds for open space and recreation purposes. It also has the option of issuing a bond to pay for the capital costs of parkland acquisition and development. The decision to pursue these options rests with Borough Council after being advised by the administration.

DONATIONS

Montgomery Township should encourage donations from individuals, businesses, and groups to help pay for parkland acquisition, development, and tree planting. The donations may be cash, materials, or labor. Montgomery Township could organize special days during which local citizens and groups could gather to participate in implementing open space projects.



Montgomery Township Municipal Building

Photo: Roy Rodriguez, Jr.

SOUTHEAST PENNSYLVANIA LAND CONSERVATION ORGANIZATIONS

BRANDYWINE CONSERVANCY PALTA MEMBER

PO Box 141 Chadds Ford, PA 19317 Counties where acquisitions completed: Bucks, Chester, Delaware, Lancaster, Montgomery, Phila-

Mission: The mission of the Brandywine Conservancy's Environmental Management Center is to conserve the natural and cultural resources of the Brandywine River watershed and other selected areas with a primary emphasis on conservation of water quantity and quality.

Founded: 1967 Phone: (610) 388-2700 Email: emc@brandywine.org www.brandywineconservancy.org

CONSERVANCY OF MONTGOMERY COUNTY

PALTA MEMBER

delphia

PO Box 28 Ambler, PA 19002-0028 Counties where acquisitions completed: Montgomery

Mission: The business and purpose of this organization shall be to advocate the preservation of historic and natural resources in Montgomery County to ensure their protection for future generations. The main functions of the organization shall be to identify and protect historic structures, open space and natural resources; sponsor educational preservation programs; conduct survey and planning studies; promote, assist with and accept conservation easements; and provide an information network and clearinghouse for preservation information for county residents, businesses, schools, municipalities and organizations.

Founded: 1990 Phone: (215) 283-0383 Email: cmcpreserve@hotmail.com

HERITAGE CONSERVANCY PALTA MEMBER

85 Old Dublin Pike Doylestown, PA 18901 Counties where acquisitions completed: Bucks, Montgomery, Susquehanna, York Counties where acquisitions anticipated: Northampton

Mission: Heritage Conservancy is a nonprofit organization dedicated to preserving our natural and historic heritage. Founded in 1958, it was concern for the rapid loss of open space in Bucks County which led to the formation of the Bucks County Park Foundation, known today as Heritage Conservancy.

Founded: 1958 Phone: (215) 345-7020 Email: hconserv@heritageconservancy.org www.heritageconservancy.org

LOWER MERION CONSERVANCY PALTA MEMBER

1301 Rose Glen Rd. Gladwyne, PA 19035 Counties where acquisitions completed: Delaware, Montgomery

Mission: The Lower Merion Conservancy acts to protect our area's natural and historic resources, open space, and watersheds for area residents and future generations. Through education, advocacy, and research, the Conservancy promotes collective responsibility for these resources.

Founded: 1991 Phone: (610) 645-9030 Email: admin@dragonfly.org www. Imconservancy.org

MONTGOMERY COUNTY LANDS TRUST PALTA MEMBER

PO Box 300 Lederach, PA 19450 Counties where acquisitions completed: Montgomery

Mission: It is the mission of Montgomery County Lands Trust to permanently preserve land and to foster the wise stewardship of open space of our county by: Acquiring easements and encouraging donation of land to appropriate stewards. Helping to facilitate the creation of open space and natural amenities in existing communities. Promoting environmentally sensitive, sustainable development which preserves open space, significant natural resources and our unique sense of place. Providing Montgomery Township 2006 Open Space Plan CHAPTER 14: IMPLEMENTATION

educational programs that strategically advance its mission.

Founded: 1993 Phone: (215) 513-0100 Email: dflaharty@mclt.org www.mclt.org

NATURAL LANDS TRUST PALTA MEMBER

1031 Palmers Mill Rd. Media, PA 19063 Counties where acquisitions completed: Bucks, Chester, Delaware, Montgomery, Philadelphia

Mission: Natural Lands Trust is a non-profit, regional land conservation organization working to protect the most critical remaining open lands in the greater Philadelphia region.

Founded: 1961 Phone: (610) 353-5587 Email: apitz@natlands.org

www.natlands.org

NORTH AMERICAN LAND TRUST PALTA MEMBER

PO Box 1578 Chadds Ford, PA 19317 Counties where acquisitions completed: Chester, Delaware, Lancaster, Montgomery

Founded: 1992 Phone: (610) 388-3670 Email: info@nalt.org info@nalt.org www.nalt.org

PENNYPACK ECOLOGICAL RESTORA-TION TRUST

PALTA MEMBER

2955 Edge Hill Rd. Huntington Valley, PA 19006 Counties where acquisitions completed: Montgomerv

Mission: The mission of the Trust and its membership is to protect, restore and preserve the lands of the central Pennypack Creek valley so that they * remain an enhancement to the quality of visitors' lives, * remain a vibrant and diverse natural landscape supporting native plant and animal life, and * become the standard of excellence for innovative restoration and stewardship practices to be shared with other individuals and organizations joined in common commitment to the environment.

Founded: 1970 Phone: (215) 657-0830 Email: djrpennypack@cs.com www.libertynet.org/ pert

PERKIOMEN WATERSHED CONSERVANCY

PALTA MEMBER

1 Skippack Pike Schwenksville, PA 19473 Counties where acquisitions completed: Montgomery

Mission: The Perkiomen Watershed Conservancy is a nonprofit organization founded in 1964 by local citizens to combat pollution in the Perkiomen Creek and its tributaries. The Conservancy provides an integrated approach to environmental issues of the Perkiomen Watershed area through environmental education, Watershed stewardship and conservation programs.

Founded: 1964 Phone: (610) 287-9383 Email: pwc@perkiomenwatershed.org www.perkiomenwatershed.org

WISSAHICKON VALLEY WATERSHED ASSOCIATION

PALTA MEMBER

12 Morris Rd. Ambler, PA 19002 Counties where acquisitions completed: Montgomery

Mission: Since 1957, the Wissahickon Valley Watershed Association has been the leader in protecting the open space of the Wissahickon Valley, in enhancing its water quality, and in educating people of all ages about environmental concerns.

Founded: 1957 Phone: (215) 646-8866 Email: wvwa@aol.com: www.wvwa.org

SUMMARY

Montgomery Township has undergone significant change over the past 15 years. Therefore, its remaining unique historic resources, natural features, and parkland and open space opportunities are in danger of being lost if the Township does not take swift and dramatic action to protect the resources or seize upon the opportunities. This plan establishes ambitious but achievable goals by which the Township intends to protect, preserve, and enhance the quality of life for its residents. The implementation strategies outlined in this chapter are the framework by which these goals will be realized. As the Township moves forward, on its own and in partnership with others, to implement these actions they will benefit all the residents of Montgomery Township, now and in the future.



A spring flower in Montgomery Township

Photo: Roy Rodriguez, Jr.