

## 11. Smart Growth

### *Strategies for Creating Viable, Environmentally Sustainable Communities*

by Susan Beecher, District Manager, Pike County Conservation District

*“Smart growth helps communities shape the future. With appropriate planning, local governments can make land use control and development decisions that will improve their communities’ overall quality of life by protecting the best of their unique economic, political, social and environmental characteristics.”*

- Javier Gonzales, President, National Association of Counties

Pike County owes its economic and social well being to the scenic beauty and natural resources that attract people and businesses and provide quality of life to residents and visitors: clean and abundant water resources, clean air, intact forests, abundant wildlife, scenic vistas, readily accessible public recreational lands and natural areas. In the next decade and beyond, Pike and other counties in the Northeast region will absorb thousands of new residents. Efforts to accommodate this growth, while protecting the County’s natural resources, could be greatly enhanced by proactively planning and implementing sustainable, community-oriented patterns of growth and development.

#### **Sprawl Hurts**

Growth may be inevitable, but sprawl doesn’t have to be. Sprawl can be defined as scattered, poorly planned development, such as large-lot subdivisions, spreading across rural areas and commercial strips along roadways. Sprawl is generally associated with rapid consumption of open space, prime farmland, forests, historic sites, and scenic landscapes accompanied by a loss of distinctive community character and quality of life.

#### **We All Pay for Sprawl**

**A 2000 study on The Costs of Sprawl in Pennsylvania by Clarion Associates, Inc. for the 10,000 Friends of Pennsylvania found that sprawl:**

- **Consumes natural areas, agricultural lands and open spaces**
- **Increases air & water pollution**
- **Increases the costs of roads, housing, school and utilities**
- **Increases the costs of transportation**
- **Concentrates poverty and accelerates socio-economic decline in cities, towns and older suburbs**

### **Environmental Impacts of Sprawl**

The increasing number of environmental challenges Pike County residents are faced with – water pollution, loss of streamside forests, wetlands and floodplain encroachment, stormwater and flood damage, habitat fragmentation, and wildlife conflicts – is in part due to the way in which land has been developed over the last decade. Sprawling land development patterns and the resulting loss of open space impact the environment in multiple ways. Not only do we lose the natural landscape features we value – stream corridors, forests, wetlands, etc. – we also lose the essential functions and values that these features provide: stormwater runoff control, pollutant filtration, groundwater recharge, flood mitigation and storage, wildlife habitat, recreational and scenic values, to name just a few.

### **Can We Grow Smarter?**

Smart growth strategies are helping communities throughout the country to plan for and accommodate growth in ways that meet both economic and environmental needs. Smart growth strategies help many communities face concerns about the impacts of sprawling development patterns including environmental degradation, dwindling open space, long commutes, spotty or stagnant economic development and the loss of community character.

Smart growth strategies provide local governments, community groups, lenders, developers, transportation officials and state governments, faced with the pressing challenges of growth, with alternative approaches to land development that provide for the long-term preservation and enhancement of communities. While there is no “one size fits all” solution, there are

### **Smart Growth Principles**

- **Mix land uses**
- **Take advantage of compact building design**
- **Create a range of housing opportunities and choices**
- **Create walkable neighborhoods**
- **Foster distinctive, attractive communities with a strong sense of place**
- **Preserve open space, farmland, natural beauty and critical environmental areas**
- **Strengthen and direct development towards existing communities**
- **Provide a variety of transportation choices**
- **Make development decisions predictable, fair and cost-effective**
- **Encourage community and stakeholder collaboration in development decisions**

a number of planning practices, techniques and options available to local government officials that have been used successfully in a variety of urban, suburban and rural settings in Pennsylvania and across the country.

### **Tools for Smart Growth Comprehensive Planning**

A **comprehensive plan**, also known as a “master plan,” is the basic foundation for local planning, providing a blueprint of a community’s vision and priorities and establishing reasonable goals for conservation and development. Comprehensive plans may be developed on the county, township or borough level. The most effective comprehensive plans are developed with broad-based citizen participation and updated regularly to reflect the values and goals of the general public. Comprehensive plans include an inventory of what currently exists in a community and what growth in population and changes in land use can be expected to occur over the next 5 to 10 year period.

- Some Elements of  
Comprehensive Plans**
- **Statement of community development objectives**
  - **Plan for land use**
  - **Plan to meet housing needs**
  - **Transportation Plan**
  - **Plan for community facilities and utilities**
  - **Plan for protection of natural and historic resources**
  - **Plan for the reliable supply of water**
  - **Short and long-range implementation strategies**

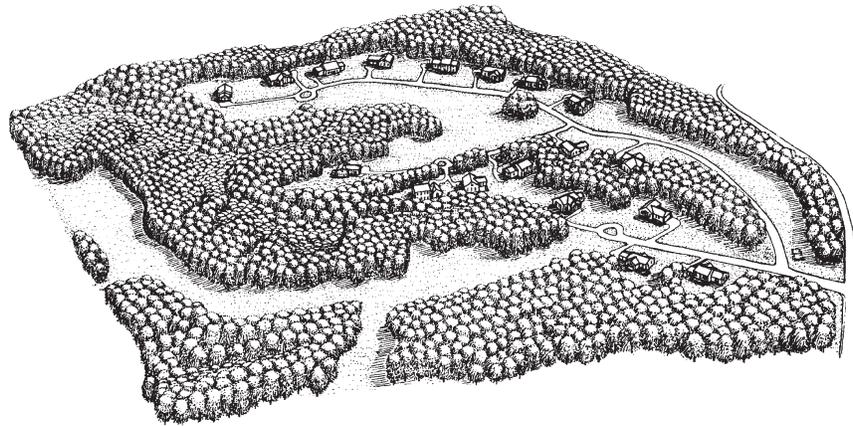
### **Land Use Regulations**

In the process of enacting land use regulations to guide growth and development in their communities, well-meaning local officials may inadvertently encourage the sprawling land use patterns they are seeking to avoid. To address this problem and turn the tables on sprawl, zoning regulations may need to be modified to mandate or at least encourage and allow **Conservation Design** principles to be incorporated into land development projects.

In addition, overlay districts can be created to protect important resource areas such as stream corridors, floodplains, wetlands and steep slopes. Subdivision/land development ordinances can also be used to ensure incorporation of conservation design strategies early in the planning process. A detailed site analysis and identification of natural features to be protected is most useful if created before the location of lots, roads, buildings, etc. are established.

### **Stormwater Management Planning**

Natural landscapes, such as forests, fields and wetlands, absorb rain



*Conservation Design subdivisions conserve open space and community natural resources for the benefit of residents. Reprinted with permission of the Natural Lands Trust, Inc.*

water and snowmelt, allowing them to slowly filter into the ground. As more and more land becomes covered with **impervious surfaces**, such as roads, parking lots and buildings, precipitation does not percolate into the ground, but instead runs off the surface quickly and in large quantities. Such accelerated runoff, resulting from development throughout a watershed, increases flooding and streambank erosion, carries pollutants to surface and groundwater and reduces groundwater recharge, essential to drinking water supplies and stream flows. Studies have shown a direct relationship between impervious cover and water quality; as impervious surfaces increase, water quality declines.

County and municipal governments can develop and carry out **Stormwater Management Plans**, which focus on reducing stormwater impacts in a particular watershed. Successful stormwater management strategies include those that maintain natural vegetation and drainage patterns, minimize impervious cover, promote infiltration and groundwater recharge and protect water quality.

### **Regional Cooperation**

In Pennsylvania, in the absence of joint planning, every municipality must provide for every type of land use within municipal boundaries. This mandate is widely acknowledged as contributing to duplicative development and land consumption. Local governments wrestle with a variety of issues - including water resources planning and protection - that extend beyond their municipal boundaries.

In addition, the water resources of a watershed do not recognize the

political boundaries that people create. For instance, a stream's watershed area often encompasses a number of municipalities or even counties and underground aquifers

don't stop at township lines. Cooperative, multi-municipal planning efforts provide a logical means of addressing these issues and protecting community water resources.

**Cooperative, multi-municipal planning efforts provide a logical and highly effective means of protecting community water resources.**

### **Citizen Participation**

Opinion polls and community visioning consistently indicate strong public support for protecting the environment, saving open space, preserving historic and cultural buildings and landscapes, and keeping water and air clean. Successful planning and growth management however, must have the active support of local elected officials and citizens alike.

Often the threat of a proposed development provides the catalyst that arouses people to action; unfortunately, once a development proposal reaches a municipality for review, it is often too late to require substantive changes in the project's design. Citizens for whom such issues are important need to be involved early on in shaping long-term planning and land use strategies and in the election of leaders committed to the same. Rather than attempting to protect the environment by challenging each land development project individually, citizens and officials must work together to identify resources that are important to the community, then prepare a plan and land use regulations that preserve those resources and promote sustainable development.

Elected officials need to hear constructive input from a broad range of individuals and groups in order to make tough

decisions about their community's future. They also need the support and added level of expertise and person-hours afforded by volunteer planning commission members, Environmental Advisory Councils, municipal authorities and the like. Effective planning cannot happen in a vacuum; it must be a reflection of community values.

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### **Land Acquisition and Conservation Easements**

In Pennsylvania, it is estimated that we are annually losing three acres of open land for every one conserved, and the rate of loss is accelerating. In fast-growing areas like Pike County, the demand for land, rising

## Conservation Design Principles

Conservation Design strategies can play a vital role in accommodating growth while protecting land and water resources. These strategies can also assist land developers in meeting regulatory requirements relating to erosion control, water quality protection and stormwater management. These include but are not limited to the following general concepts:

### Minimize Disturbed Areas

- Plan construction to limit the area of earth disturbance
- Keep building and parking areas as compact as possible
- Retain and utilize natural site conditions
- Maintain buffers along streams and other water resources
- Work with existing topography. Fit the project to the site vs. making the site fit the project

### Maintain Natural Hydrologic Cycles

- Maintain the pre-development water budget to the greatest extent possible
- Maintain natural drainage patterns
- Control net increases in post-development stormwater runoff volume
- Minimize impervious areas
- Provide opportunities for groundwater recharge

### Protect Water Quality

- Fully evaluate non-discharge alternatives
- Utilize low maintenance non-structural stormwater controls
- Maintain native vegetation including riparian buffers
- Avoid excessive earthmoving
- Limit high-maintenance water- and chemical-dependent landscape areas

land values and rising taxes all combine to increase pressures on landowners to sell or develop land.

There are a variety of options available to private landowners who wish to preserve land; many of these strategies also offer tax incentives. Some of the most commonly used techniques include fee simple donation, conservation easement, bargain sale and conservation-based development. For more information on land conservation options,

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see Resources for More Information at the end of this chapter.

In addition to options available to private landowners, there are opportunities for local governments to purchase land for parks, recreation and open space protection purposes. An example of this is the Pike County Scenic Rural Character Preservation Bond. Passed in November 2005 by a majority of Pike County residents this initiative will provide \$10 million to conserve drinking water, wildlife habitat, scenic ridges, and critical open space. A portion of the funds could be utilized to support acquisition and management of conservation easements, parks and forestland.

### **Summary**

Development pressures will continue to present significant challenges to maintaining the quality of life, including the abundant natural resources that make Pike County a desirable place to live and a sought after destination for visitors. Unplanned or poorly planned communities that encourage sprawling development patterns could experience considerable long-term consequences including environmental degradation, dwindling open space, fragmented or stagnant economic development and a loss of community character.

Smart growth strategies provide an antidote to the negative impacts of sprawl. Comprehensive planning, land use regulations that link development with sustainable use of natural resources, protection of open space, innovative stormwater management strategies, enlisting the participation of residents in community planning, and multi-municipal cooperative efforts are all part of the tool kit of options that smart growth strategies provide.

### **Action Steps for Implementing Smart Growth Strategies**

- ☞ Support community association and municipal efforts to conserve open space through land acquisition and conservation easements.
- ☞ Support municipal initiatives to manage stormwater on a regional or watershed basis through cooperative efforts between neighboring municipalities.
- ☞ Get involved in the community planning process. Attend monthly public municipal meetings or volunteer to serve on a municipal planning board.
- ☞ Voice support for municipal efforts to adopt land use regulations that support conservation design and low impact development strategies.

☞ Let local officials know you support the creation and implementation of comprehensive plans that provide a blueprint for community development.

**Resources for More Information**

Delaware Highlands Conservancy. A local, non-profit land trust:  
[www.delawarehighlands.org](http://www.delawarehighlands.org)

Low Impact Development Center: [www.lowimpactdevelopment.org](http://www.lowimpactdevelopment.org)

Natural Resources Defense Council:  
[www.nrdc.org/water/pollution/storm/chap12.asp](http://www.nrdc.org/water/pollution/storm/chap12.asp)

PA DCNR, Pennsylvania's Wildlife and Wild Places; Our Outdoor Heritage in Peril: [www.dcnr.state.pa.us/pawildlifebook/pawildlife.pdf](http://www.dcnr.state.pa.us/pawildlifebook/pawildlife.pdf)

Scenic America: <http://www.scenic.org/>

Sierra Club report: [www.sierraclub.org/sprawl/factsheet.asp](http://www.sierraclub.org/sprawl/factsheet.asp)

Smart Growth America: [smartgrowthamerica.org/index.html](http://smartgrowthamerica.org/index.html)

Smart Growth Network: [www.smartgrowth.org](http://www.smartgrowth.org)

Sprawl Watch Clearinghouse: [www.sprawlwatch.org](http://www.sprawlwatch.org)

Using Conservation Easements to Preserve Open Space: A Guide for Pennsylvania's Municipalities and Land Conservation Strategies, A Guide for Landowners. Publications available at [www.heritageconservancy.org/](http://www.heritageconservancy.org/).