

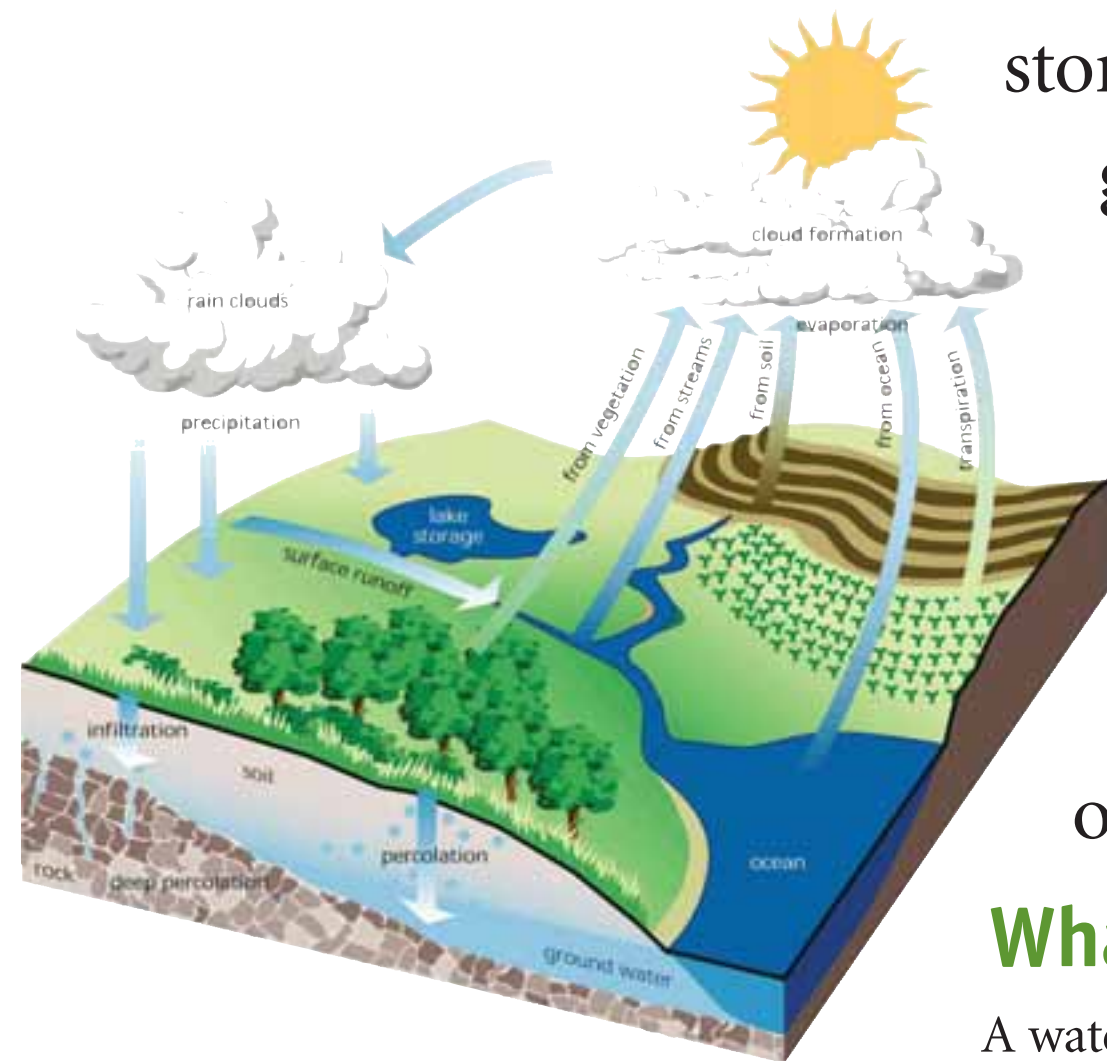


Mid-Atlantic Ecological Landscapes

RAIN GARDEN

One Path to Watershed Conservation

A rain garden is a unique garden strategically located to intercept storm water and allow it to soak into the soil. These attractive gardens add beauty to your home while reducing storm water runoff, which is one of our nation's main sources of water pollution. As our watersheds become developed with parking lots, driveways and rooftops, these impervious surfaces increase the amount of rainwater that runs into our storm drains. This sediment and pollutant filled runoff threatens our streams and water supply.



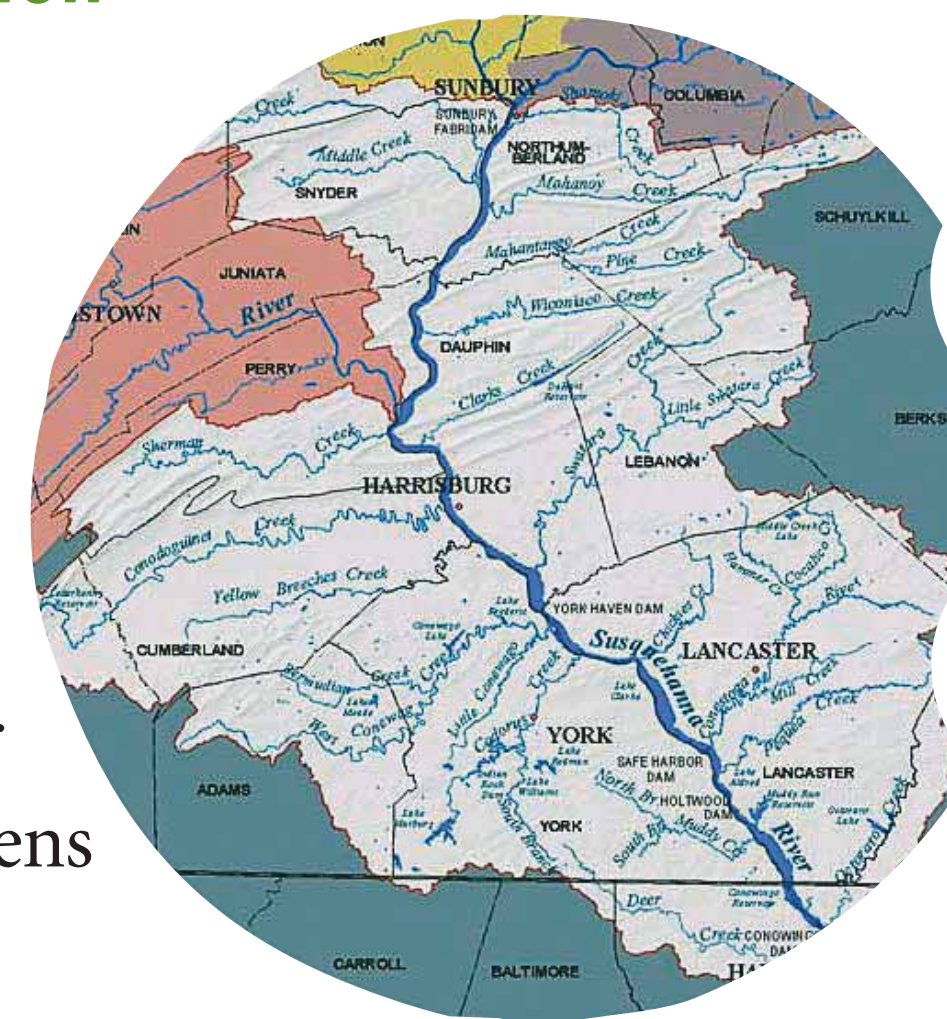
The Water Cycle (also known as the hydrologic cycle) is the journey water takes as it circulates from the land to the sky and back again.

What is a Watershed?

A watershed is an area of land from which all above ground and under ground water drains to the same location. Watersheds are nature's way of dividing up the landscape. Defined by the highest points of land surrounding a river, stream or lake, all the water "caught" in this basin flows downhill to one specific point; a river, lake, estuary, wetland, stream or even an ocean!

Watersheds come in all shapes and sizes. Some are millions of square miles, while others are just a few acres. Just as creeks drain into rivers, watersheds are nearly always part of a larger watershed.

The actions of people who live within a watershed affect the water quality for all plant, animal and human communities living downstream.



The map above shows the Lower Susquehanna Sub-Basin of the Chesapeake Bay Watershed. 99% of York County is within the sub-basin.

Benefits



The native plants chosen for this rain garden can withstand varying conditions. They perform the natural job of trapping pollutants and protecting local streams, lakes, ponds and our water supply.



Rain gardens require less maintenance than a mowed lawn, which translates into a savings of time and money.



A rain garden is a natural way to reduce our storm water pollution problems, help recharge groundwater and protect our valuable water resources.



Rain gardens reduce the impact of development by creating habitat for animals that need moist surroundings for protection and reproduction.

Establishment and Maintenance

Locate your garden below downspouts, next to driveways, sidewalks, roads or in a low spot in the yard. All rain gardens should be at least 10-15 feet from a house or other structure. Take advantage of places where water naturally pools after a storm.

Select a variety of plants suitable for each zone: consider their sun and shade tolerance. Plants that do well in rain gardens can tolerate wet "feet" and very dry conditions. Many York County natives fit this description. Group the same species to produce a nice visual impact and create a stable and healthy habitat.

New gardens will require care until the plants are established. After the first year, garden maintenance can be reduced to seasonal cleanup and occasional weeding or plant management. Remove dead material in early spring by breaking stalks into four inch sections and scattering back into the garden. Use shredded leaves for mulch as needed.

Site Conditions

The soil has been severely disturbed and is rocky. It drains very quickly, which is important for a rain garden. The East and West Rain Gardens collect water from the roof downspouts. As the water seeps back into the ground, it is filtered and cleaned by plants, soil and bacteria. This re-establishes a vital missing link of the hydrologic cycle.

The Three Zones of a Rain Garden

- **The Wet Zone**, about six inches deep, will hold water the longest. Complete drainage is preferred within twenty four hours to ensure mosquitoes will not breed.
- **The Middle Zone** will collect a few inches of water, but will drain more quickly.
- **The Transition Zone** is the area between the rain garden and the adjoining garden or non-garden area. This area will receive additional water only during heavy rains. It will drain and dry out first.

