

Overview

In the natural environment, rain falls onto the ground and soaks into the soil, or finds its way downhill to a stream, river, lake, wetland or the ocean.

When rain hits man-made structures such as pavement, or other hard surfaces like sidewalks, driveways, roofs and parking lots, it gathers pollutants such as oil, grease, and other chemicals and carries them away into storm pipes and drains. When these pollutants enter waterways, they can have adverse effects on water quality, wildlife, and human health.

Storm pipes and drains help prevent flooding of structures and property, but they do not filter pollutants. The forced high volume and high speed of stormwater shooting into streams can cause the banks to erode. Eroded dirt and other materials (sediment) also are carried into the water along with the other pollutants.

Best Management Practices

Best management practices (BMPs) for stormwater control help to prevent pollutants and sedimentation from entering our waterways. In highly urbanized areas, acquiring large areas of land for stream or wetland repair and improvement is difficult, so installing BMPs can be the most efficient and cost-effective method of achieving improvement in water quality.

An example of a stormwater BMP is a sediment-retention basin. Many newer apartment complexes and subdivisions have constructed ponds or small lakes that collect stormwater from the hard surfaces before it reaches streams or waterways. As the water sits in the pond, the pollutants and sediment settle to the bottom. In time, the polluted sediment is collected and disposed of properly.

Stormwater BMPs for the Homeowner

Homeowners can help to protect streams and wetlands by using these techniques:

- Avoid clear-cutting all of the trees and other yard plants. Planting native plants and grasses on bare spots, or any vegetation which will help rainwater absorb slowly into the ground, will aid in preventing runoff and erosion.
- Use only the amount of fertilizer and pesticides that is absolutely necessary, or none, if possible. Fertilizers and pesticides carried by runoff to our streams and wetlands are very harmful to the plants, animals, and fish that keep our streams and wetlands healthy.
- Install rain barrels to capture runoff from rooftops and use the water on yard plants.
- Don't leave pet waste on the ground. Proper disposal will help prevent bacterial contamination in surface waters.
- Don't pour fluids from vehicles, or grease, paint, cleaners, and other chemicals on the ground or into storm drains. These liquids may eventually find their way into a stream or wetland.

For more Information

Visit <http://www.ncstormwater.org> for more information on stormwater management. For more information on EEP, visit our Web site at www.nceep.net or call (919) 715-0476.

