

What is Storm Water Runoff?

In open fields, forests and wetlands, most rain is absorbed by the soil or taken up by plants and trees. In developed areas, rain or snow that falls on impermeable roofs, parking lots, streets and lawns is not absorbed. This precipitation (called storm water or storm water runoff) enters local water bodies through storm sewer systems.

What is Storm Water Pollution?

According to U.S. EPA's National Water Quality Inventory, polluted storm water runoff is a leading cause of impairment to U.S. water bodies that do not meet water quality standards nearly 40 percent of those surveyed. This discharge can destroy fish, wildlife and aquatic life habitats; lessen aesthetic value; and threaten public health with contaminated food, drinking water supplies and recreational waterways. Unlike pollution from sewage treatment plants, storm water pollution comes from many different sources. Storm water runoff can dissolve, pick up and transport many types of household products that cause this pollution. Automotive waste, lawn chemicals, paints and eroded soil are all pollutants. Many types of litter can create storm water pollution as well.

Storm Water Pollution Prevention Tips — What Can You Do?

General Information:

- Never allow any chemicals, yard wastes or any other materials to be washed down or put into storm drains. These drains may bypass the wastewater treatment plant and go directly to lakes or rivers.

- If you must buy an item that is potentially hazardous, be sure to buy only as much as you need, and follow the instructions on the label for proper use, storage and disposal. Save unused materials for a local household hazardous waste collection event. For more information, contact your local solid waste management district. For district contact information, visit Ohio EPA's Division of Materials and Waste Management at www.epa.ohio.gov/dsiwm/pages/recycpro.aspx or call (614) 644-2621.

- Use a garbage can for trash and recycle reusable materials. Improperly discarded trash may be carried by runoff into the storm sewer.

- Never allow roof gutters to drain directly to the street or storm sewer. Allow drainage from the roof to flow over your lawn instead.

Auto maintenance:

- Automobile fluids from leaks or maintenance changes are another source of water pollution. Each year Americans dump enough used oil in landfills to equal approximately 13 spills the size of the Exxon Valdez spill! Even more oil is disposed of illegally. Much of this oil eventually finds its way into our water. Never put used oil or other chemicals down storm drains or in drainage ditches. One quart of oil can contaminate up to two million gallons of drinking water!
 - Clean up spilled brake fluid, oil, grease and antifreeze with kitty litter or other absorbant material. Do not hose them into the street where they can eventually reach local streams and lakes.
 - If you change your own oil or antifreeze, be sure to carefully collect all of the used oil or antifreeze in a proper container with a tight-fitting cap, and deliver it to a service or recycling center with the oil filter Most auto parts stores will recycle oil for you at no charge. Contact your local solid waste management district, call

the Ohio Environment Hotline at **(800)-CLEANUP** or visit **www.earth911.com** to find the nearest collection center for your used automotive fluids.

- Wash your car only when necessary; use a bucket to save water. Wash your car on a grassy area so the ground can filter the water. Or, go to a commercial car wash that uses water efficiently and disposes of runoff properly.

Landscaping & Gardening:

- Minimize the need for pesticides by choosing plant species that are resistant to insects and disease.

Landscaping with native plant species works best. Provide habitats for birds, bats, toads, etc. that prey on insect pests. Introduce praying mantises, lacewings, ladybugs and other pest-eaters to your garden.

- Do not over apply pesticides and fertilizers. Follow directions and use judiciously. Pull weeds by hand when possible.

- Try xeriscaping your home with low-water-consumption plants. Save yourself time, money and water! Find more information on xeriscaping and native planting at:

- Colorado Springs Utilities, Xeriscape information - www.csu.org/residential/water/Pages/xeriscape.aspx
- *PlantNative* is dedicated to moving native plants and naturescaping into mainstream landscaping practices - www.plantnative.org

- Try using a rain barrel or rain garden to catch and reduce storm water runoff. Rain barrels also save money by not using drinking water for watering vegetables, flowers and trees. Contact your local soil and water conservation district for more information.

- *Rain Gardens for Homeowners* -

<http://water.unl.edu/web/landscapes/rain-gardens>

- Do not over water the lawn or garden. Over watering may increase leaching of fertilizers to ground and surface water. When your lawn or garden needs watering, use slowwatering techniques such as trickle irrigation or soaker hoses. Such devices reduce runoff and are more effective than sprinklers.

- When you mow, set the blades to cut the grass two or three inches high. Most grasses are healthiest at this height and this also helps control weeds. Mow often and leave the clippings on the ground. They will help keep moisture in and provide nutrients to the soil as they decompose.

- Compost your leaves, grass clippings and garden waste. Composting is easy and can be very inexpensive – no sophisticated equipment is needed• Control soil erosion on your property by planting ground cover and stabilizing erosion-prone areas.

Painting:

- Do not allow liquid paint products and wastes to drain into the gutter, street or storm drains.
- Choose water-based paints (such as latex) instead of oilbased.
- Save unused paint materials for a local household hazardous waste collection event, or reuse leftover paints when possible. Also, many local theater/performance groups and school art departments will take unused and leftover paint.

For more information:

Ohio EPA's Division of Surface Water Storm Water Program implements the federal storm water program for both industry and municipalities. Contact them at **(614) 644-2001** or

www.epa.ohio.gov/dsw/storm/index.aspx. Ohio EPA's Office of Compliance Assistance and Pollution Prevention. **(800) 329-7518** or www.epa.ohio.gov/ocapp.