MINIMIZE RUNOFF

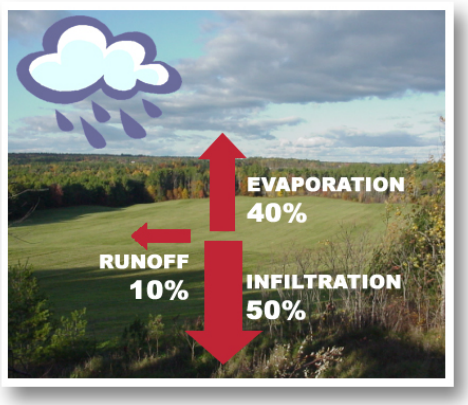
Many activities we conduct near the waterfront, in our lawns and gardens and around our home, impact water quality. This is even more critical to riparian homeowners because runoff doesn't have far to travel before reaching the water. We can prevent water pollution by being aware that our actions DO impact water quality. We can all make a difference by practicing Healthy Habits for Clean Water.

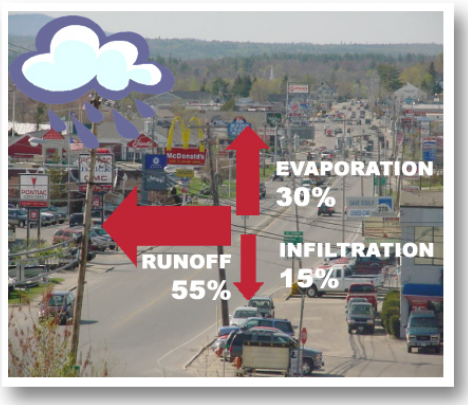
The Problem

Excessive aquatic plant growth and algal blooms, decreased water clarity, low stream flows and flashy flows, degraded habitat and shoreline erosion – all these are a result of increased and more polluted runoff from all of our homes.

We've removed the natural "sponge" function of the land around us by creating surfaces that water can't penetrate (driveways, sidewalks, rooftops and even yards). Since the water can longer infiltrate into the ground, it is forced to move along – often times carrying with it harmful chemicals and soil.

Natural Cover **75-100% Impervious Surface**





The Solution

Address runoff before it leaves your property. Better yet, keep water on your property for use in areas such as your garden.

Direct downspouts toward plant beds and grass and away from hard surfaces.

Redirect downspouts away from hard, paved surfaces into vegetated areas, such as a rain garden, or into a rain barrel for later use in the garden. Simply angling the water away from your driveway and into the garden prevents all that water from rushing away – and gives you a great source of water for your gardens.

Did you know?

The average house has at least 5,000 square feet of impervious surface (rooftops, driveways, walkways, and decks.

Use a rain barrel to collect rooftop rain and provide free water for your lawns and gardens.

Rain barrels provide an innovative way to capture rainwater from your roof, and store it for later use. Water collected from rain barrels can be used to water lawns, gardens, and indoor plants. You can lower your water bill, conserve well water in the dry season, and reduce erosion and polluted runoff.

By using the rainwater on your gardens you are helping to replenish your groundwater and benefit our water supply. A one-inch rainfall on a 1,000

square foot roof yields 562 gallons of water. Five rainy days can provide 275 gallons of free water. Collected rainfall is especially valuable during droughts or dry conditions. It contains more nutrients and fewer salts than tap water, so it's great for plants. For more information and to order your recycled food-grade rain barrel, visit www.skyjuice.us.

Create rain gardens to capture and slow down runoff.
Rain gardens are growing in popularity because they look great and filter pollutants out of runoff allowing clean water to infiltrate and replenish groundwater supplies.

A rain garden resembles a regular perennial garden in many ways. It is designed with deep-rooted plants that come back year after year; it is pretty to look at; it often has lovely flowers, grasses, trees and shrubs. Rain Gardens have a ponding area, but they are not ponds. They often are planted with wetland plants, but they are not wetlands (although you can design a rain garden that mimics a wetland).

There is a bowl-shaped dip in the garden, which holds the rain while it soaks into the soil. The garden bed is prepared or sometimes replaced to a depth of two feet in order to de-compact the soils and make the garden able to absorb water.

Did you know?
Rain gardens can potentially absorb hundreds of gallons of rain that would otherwise wash pollution down the street and into the nearest waterway.

For more information on adding a raingarden to your landscape, see http://www.umext.maine.edu/onlinepubs/pdfpubs/2702.pdf.

Where possible, reduce paved surfaces by using gravel, bricks, or interlocking blocks around my home.
Alternative pavers are surfaces that can replace asphalt and concrete and can be used for driveways, parking lots, and walkways and create less storm-water runoff. Consider replacing a portion of your driveway or some of your walkways with surfaces that allow some of the rain water to soak in.

FYI: Asphalt tends to cost between 50¢ and $1 per square foot of installed pavement. Grass and gravel pavers can range from $1.50 up to about $5.75 per square foot of installed pavement. Porous concrete can cost from $2.00 up to about $6.50, per square foot of installed pavement. Interlocking Concrete Paver Blocks: interlocking concrete pavers range in price from $5.00 to about $10.00 per square foot of installed pavement. For more information on various driveway and walkway surface options, visit http://www.paversearch.com/permeable-pavers-costs.htm.

Other Runoff Solutions

Consider these other methods of dealing with excess water runoff and erosion issues:

- Managing roof runoff on homes without gutters dripline trenches: http://www.pwd.org/pdf/water_resources/conservation%20fact%20sheets/dripline_trench.pdf
- Using drywells: http://www.pwd.org/pdf/water_resources/conservation%20fact%20sheets/dry_wells.pdf
- Managing runoff from rooftops and paved areas with infiltration trenches: http://www.pwd.org/pdf/water_resources/conservation%20fact%20sheets/infiltration_trench.pdf
- Controlling erosion on steep paths with infiltration steps: http://www.pwd.org/pdf/water_resources/conservation%20fact%20sheets/infiltration_steps.pdf
- Diverting water off paths and trails with waterbars: http://www.pwd.org/pdf/water_resources/conservation%20fact%20sheets/waterbar.pdf

PROTECT KITTERY WATERS

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