



CATCH THE RAIN WITH A RAIN BARREL

Rain barrels provide an innovative way to capture rainwater from your roof, and store it for later use.

The Problem

Structures like rooftops, driveways, roads, and parking lots alter the "water cycle" on homes and business properties. These hard surfaces reduce the amount of rain or snow melt that soaks into the ground. Instead, that water is immediately converted to stormwater runoff. The runoff can pick up pollutants such as eroded soil, lawn fertilizer, oils and gas from leaky vehicles, pet waste, etc., as it flows downhill to a nearby river or lake. Also the quantity increases and the volume of runoff is much larger and it flows more quickly than on a vegetated surface, which can cause more erosion and damage aquatic habitats.

The Solution

Water collected from rain barrels can be used to water lawns, gardens, and indoor plants. This water would otherwise run off your roof or through downspouts and become stormwater, picking up pollutants on its way to a storm drain, stream, or lake. You can lower your water bill, conserve well water in the dry season, and reduce polluted stormwater runoff.

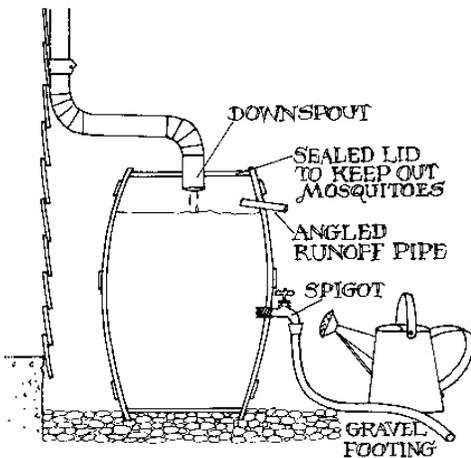
Did you know?

For every inch of rain that falls on a roof of 1,000 square feet, you can collect 600 gallons of rainwater.

Installation

A rain barrel must be placed on a level surface. If you have gutters, place the rain barrel beneath the downspout so the water flows onto the screen on top of the barrel. You may need to have your downspout cut to an appropriate height above your rain barrel.

If you do not have gutters, find a location where water concentrates from your roof and place the rain barrel where it will capture this steady stream of water during rain storms. Elevate your rain barrel by placing it on cinder blocks or a sturdy wooden frame. Raising the barrel allows the barrel to drain properly, and you to easily fit a watering can underneath the spout, or attach a hose so you can recover the rainwater you have collected. Soaker hoses can also be attached to the rain barrel to slowly release water into gardens and recharge groundwater.



Materials

Rain barrels are available in many sizes and styles, and range in price from \$80 to over \$200. Contact your local hardware store, garden center, or nursery. You can also order rain barrels online from SkyJuice New England <http://www.skyjuice.us> located in York, Maine.

Building your own rain barrel is the least expensive option. For information visit:

http://www.cwp.org/Resource_Library/Center_Docs/Residential/rainbarrelgarden.pdf.

Finally, you can simply use an open barrel to collect rainwater. Keep in mind that you should use the water within two weeks because the development of a mosquito from egg to adult takes 10 to 14 days.

Maintenance

Gutters and downspouts should be clean of debris. Leaves and pine needles can clog gutters and prevent water from reaching the rain barrel. Check the screen on the rain barrel after each storm event and remove leaves or pollen. Rain barrels should be drained and stored before freezing weather sets in to

prevent ice and freeze damage. They can be stored outside if they are turned upside down and the faucet is covered. Be sure to put something heavy on your rain barrel so it doesn't roll away. You can store them inside a garage or other protected area.

Customize your barrel.

Rain barrels may be painted any way you wish... a wine barrel.. a fish tank.. an elephant? A good base paint might be Krylon's new "Fusion" spray paint, which has been specially formulated to bond well with plastic. Spray a clear coat on the barrel first, then paint your decoration with any waterproof paint, and finish with a final clear coat to protect.

Increase your capacity of rainwater storage.

Connect more than one barrel together at each downspout. Remember to raise your barrels off the ground by placing them on cement or wooden blocks to ease access to the faucet.

Manage heavy rains.

It is essential to consider impact of heavy winter rains on your drainage system. An overfull rain barrel has the potential to erode your home's foundation. In all cases your rain barrel should have an overflow spigot near the top on the side. Management ideas include:

- Connect a hose to the overflow spigot and direct this away from your foundation, a minimum of 2 feet for a crawlspace, and 6 feet for basements.
- Disconnect the rain barrel from the downspout.
- Leave the outlet faucet open and set a splash block under it. Now the rain barrel is an extension of the downspout drainage system. Remember to close the faucet when you desire to fill the rain barrel.

Whatever your solution, design the overflow system to encourage infiltration of the water into the ground.

Free clean water.

Rainwater is free "soft water"! It contains no chlorine, lime or calcium. Because it tends to have fewer sediments and dissolved salts than municipal water, rain water is ideal for watering plants. The water in the barrels is at ambient temperature and will not shock the plants like cold well water or municipal water. It is excellent for washing the windows, car, and other household cleaning.

Did you know?

The chemicals and hard water from many of our municipal water systems can produce an imbalance in the soil of your garden.

Other Roof Runoff Solutions

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

- Managing roof runoff on homes without gutters by using dripline trenches: http://www.pwd.org/pdf/water_resources/conservation%20fact%20sheets/dripline_trench.pdf
- 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



Spruce Creek Watershed Improvement Project

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