

# Building a Rain Barrel— Easy as 1-2-3!



## Barrel Basics

First, you will need a strong plastic barrel in which to store water. Check with local restaurants or food manufacturers to find re-usable, food-grade barrels, look for barrels at your local garden supply or hardware store. Additionally there are dozens of varieties available online. A typical set-up is a diversion line which runs from your rain gutter downspout, a length of tubing, and one or more barrels with a cover. The barrel will be mounted with a spigot or hose hitting at the bottom for water withdrawal. You can also buy free standing systems designed to collect rainwater on their own. The barrel itself must be sturdy. A 50 gallon unit will weigh over 400 pounds when full, more than enough to burst a plastic garbage can. You can buy them up to about 80 gallons in a variety of shapes, and it's possible to daisy chain several together. Look for a unit with a screen for excluding debris and insects (crucial in mosquito prone areas) and a secure lid to keep out animals and curious children. Plastic barrels should feature opaque coloring to discourage algae growth and UV-resistant plastic.

## Required Tools and Supplies

### Tools:

1. Power drill with hole bit (1/16" smaller than faucet insert) and pilot drill bit (A 3/4" faucet measures 1" on the outside so you need a 15/16" hole bit).
2. Pliers to tighten washers
3. Paper towels (for excess caulk)
4. Utility knife or small saber saw to cut lid.
5. Scissors to cut screening
6. Hacksaw to shorten downspout
7. Screwdriver for hose clamp

### Supplies:

1. 3/4" faucet (measures 1" on outside)
2. Washers and lock nut for the faucet
3. Caulk (clear plumber's)
4. Screening (Buy a roll that is used to repair screen windows. Nylon fabric-like netting is better than the metal type).
5. Hose adapter for your overflow. (Many options here depending on where you want your overflow to go).
6. Washer and lock nut needed for the adapter.
7. Hosing (short piece) to connect one barrel to another, if you want to have multiple barrels. Hose clamps as needed.
8. Bricks or cinder blocks to raise your barrel above the ground (this will improve water pressure).

## Now Put Together Your Barrel!

1. Drill a hole near the bottom of the barrel where your faucet will be.
2. Caulk around the outside of the hole.
3. Screw faucet in, using a washer.
4. Caulk inside, then put on lock nut with washer and tighten with pliers.
5. Drill a hole near the top for overflow, where water will flow out when your barrel is full.
6. Put in a hose adapter for overflow with washers and tighten with pliers.
7. Pull out center of lid.
8. Cut screen larger than lid (the screen will be placed on the top of the lid, and will help keep out debris and mosquitoes).
9. Level the dirt under the rain barrel, then add some sand.
10. Rain barrels need to be higher than ground level—use bricks or cinder blocks to give your barrels some height.
11. Measure and cut off part of the downspout, making sure it is a few inches above the barrel.
12. Put the barrel in place, securing the screen over it with the lid, and placing it under the downspout.
13. Connect the overflow from one barrel to the next, or have overflow hose divert excess rain to a garden or distant area of your choice, away from your home's foundation.