



Patio Ponds Filter Systems

The Pond Filtration **EXPERTS!**

**MADE IN THE
U.S.A**

To Last a lifetime



4" Bottom Drain Installation Instruction Sheet

Thank you for purchasing a **Patio Ponds 4" Bottom Drain**. This sheet will provide you with detailed instructions for the installation of your drain.

Overview

The **Patio Ponds 4" Bottom Drain** is a bottom drained designed for use with concrete or liner ponds. The design of this drain allows the use of standard 4" PVC pipe without any modifications.

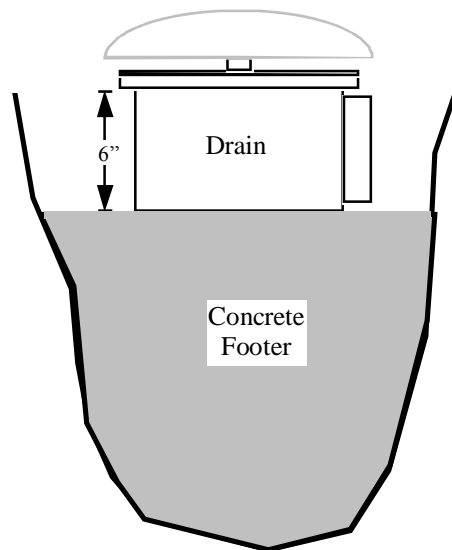
Preparation for installation

The pond should already be excavated, with the areas for the drain and the drain line clearly marked. Dig a hole roughly 18" wide by 18" or more deep where the drain will be installed. Be sure that you are digging into virgin soil, not fill, or you will have to continue digging until you reach virgin soil. Measure 6" from the top of the hole (for concrete ponds, measure from the top of where the actual pond bottom will be) and mark. Fill the hole with concrete to mark, at level concrete. Cover and allow concrete to set for 24 hours.

While the concrete is setting, dig a channel roughly 8-10" wide for your 4" pipe. Place the 4" plumbing in this channel and back-fill with sand.

Using PVC cement, glue a 4" PVC SLIP x SLIP coupling to the bottom drain. Install the 4" drain into the hole and attach the 4" PVC line to the 4" coupling using PVC cement.. Allow cement to set and test fittings for leaks.

After the fittings have been tested and found to be leak-free, fill around the drain with cement. This will prevent the drain from shifting during or after installation. Allow concrete to set for 24 hours before proceeding to the next step.



Liner Pond Installation

After the drain is in place and attached to its plumbing, remove the dome lid and top flange. Install the liner in the pond. Locate the drain and with an awl, punch through the liner where the screw holes are located. (**Hint:** After you find two opposite screw holes, place the flange over the drain and line it up with the holes you have found. You can then use the flange as a guide for the other holes.)

Tighten the screws evenly along the flange and cut out the liner material from the center of the drain. Install dome lid and fill pond.

Concrete Pond Installation

After you have the drain in place and attached to its plumbing, remove the dome lid and top flange. Cover the top of the drain completely. Construct the rest of the pond and allow to cure. Remove cover and use concrete to fill any gaps between the drain and the pond wall. Finish pond and install dome lid. Discard the screws and flange.