

Build Your Own Block Planter

We've received many compliments on the cedar planters that accent the entrance to the Georgeson Botanical Garden. These planters are easy to construct using the following plans. The planters can be made of either cedar or redwood depending on your preference. This instruction sheet includes directions for two block planters. Instructions for construction for a tub or stave planter are also available.

Plans are included for a 20" inside diameter planter made of 2" x 4" blocks and a 12" i.d. planter made of 1" x 2" blocks. If you wish to make a planter of a different diameter the length of each block can be calculated by the following formula:

$$\text{length} = \frac{p \cdot d}{8}$$

where $p = 3.1416$

d = inside diameter

8 = number of blocks/layer

Remember that inside diameter should be smaller than the diameter of the base enough so that the outside center of the block overlaps the base by less than half its width.

Both the large and small planters we built were 15 layers high. The top layer of both planters was mitered to 22° to provide a continuous top layer. The large planter had a layer of 1" x 4" cedar on top of the 15 layers of 2" x 4" cedar. The height of either planter can be adjusted to individual preference by adding or subtracting layers.

1. Build a base by fastening two pieces of 1" x 12" or 1" x 8" cedar to 2" x 2" cedar supports set at



Figure 1. Block planters adorn the main entrance to the Georgeson Botanical Garden.

right angles to the one inch planks. You can use exterior plywood for the bottom (Figure 2). Leave enough space between the boards to allow for drainage and to obtain the proper diameter. Cut the base to the proper diameter using a coping saw or a power saber saw. Drill several 1/2" drainage holes and tack rustproof screening over the drainage holes and the gap between the boards (Figure 3).

2. If you have a table saw, set a stop block at the proper length and cut the number of blocks required for the number of layers (8/layer) you desire. If you don't have a table saw use a miter box with a piece of wood clamped in it for a stop.

3. Glue and nail blocks to the base (Figure 3). Inside corners should touch adjoining blocks and all blocks should have an even overhang beyond the base. Nail and glue second layer so ends meet in the middle of blocks in the first layer. Continue until you have finished the desired number of layers.

4. Finish the planter with penetrating stain or wood preservative but be careful not to stain parts of the planter which might have contact with the soil. Line the planter with plastic or place plastic or fiber pots inside the planter.

Table 1. Materials list

Large Planter:

Sides: 120 pieces (15 layers) 2" x 4" x 7 7/8"

Top: eight pieces 2" x 4" x 7 7/8" mitered 22 1/2°

Bottom: two pieces 1" x 12" x 24" plus two pieces 2" x 2" x 20"
or one piece 1/2" exterior plywood 24" dia.

Hardware: about 250 16d galvanized box nails
or 250 2 1/2" screws

Small Planter:

Sides: 112 pieces (14 layers) 1" x 2" x 5"

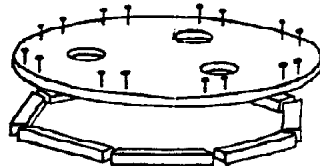
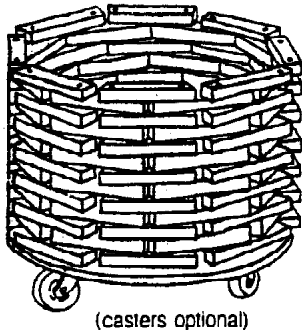
Top: eight pieces 1" x 2" x 5" mitered 22 1/2°

Bottom: two pieces 1" x 8" x 15" plus two pieces 2" x 2" x 12"
or one piece 1/2" exterior plywood 15" dia.

Hardware: about 250 6d galvanized box nails
or 250 1 1/2" screws

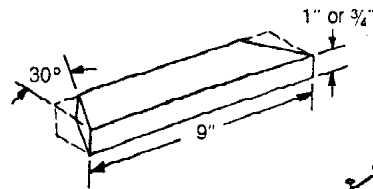
Scrap or Stick Planters
Straight-cut Octagon

Cut a circle for bottom and drill drain holes.



Arrange eight of the 5" pieces in a regular octagon. Lay the bottom on top of them and nail it to them.
 Turn the bottom, with its tier of 5" pieces attached, right side up and nail on the second tier. Add the third and successive tiers in the same manner.
 If you wish to miter the corners as shown for the hexagon planter, angle the cut at 22.5°.

Mitered Hexagon



The 30° mitered ends let the pieces fit snugly, for a more tailored appearance.

As with the octagon, start by laying the first tier on the floor and nailing on the bottom. Turn it over and nail on each successive tier.

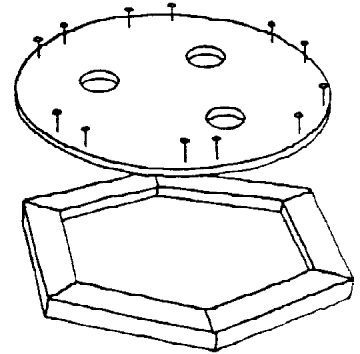
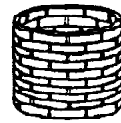
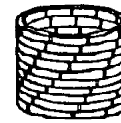


Figure 2. Diagrams show starting the base of the planter using exterior plywood. Directions supplied explain how to build a base using boards. The planter can be made with several designs depending on how you arrange the blocks.

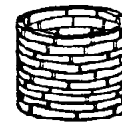
Create different looks by varying the relationship of the tiers.



Basket



Spiral



Random

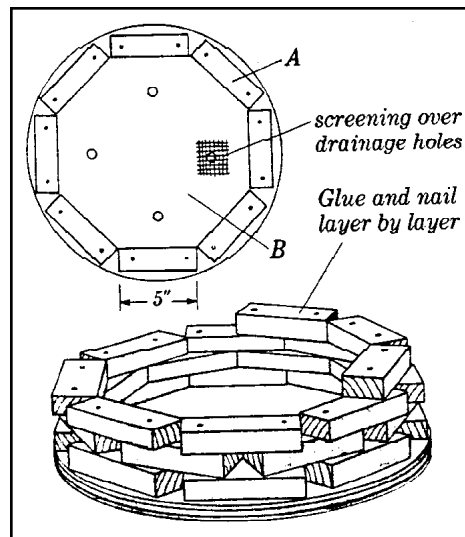


Figure 3. This diagram shows where to put drain holes and how to build up the sides of the planter.

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