

## Construction of regulation pits

This can be accomplished in about 2 hours with basic constructions skills

### Materials:

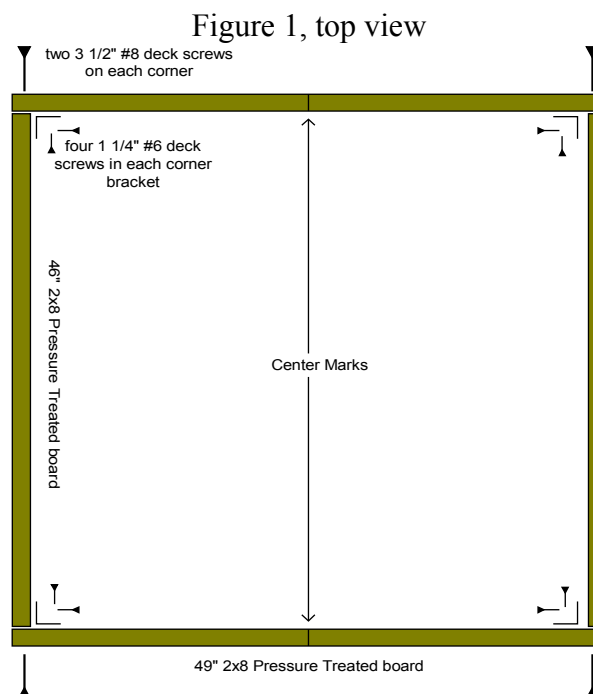
- 2 Steel posts,  $\frac{3}{4}$ -1" in diameter, 30-36" long
- 4 2x8 8' long pressure treated boards
- 16 3  $\frac{1}{2}$ " #8 deck screws
- 8 galvanized corner braces 2  $\frac{1}{2}$ " long (optional)
- 32 1  $\frac{1}{4}$ " #6 deck screws (optional)
- 6 60lb bags of playground sand
- 4 wooden stakes
- String

### Tools:

- Power Drill/Driver with bits
- Saw, circular or hand
- Tape Measure, 25' minimum
- 4' level
- shovel, straight blade
- sledge hammer or heavy hand hammer

### Building your pit box (Figure 1):

1. Cut each 2x8 into two pieces, 49" and 46" long respectively.
2. On a level surface, lay out the four pieces for each pit box as shown in Figure 1.
3. Butt the end of the 46" piece against the side of the 49" piece.
4. Nail the two pieces together using the 3  $\frac{1}{2}$ " deck screws as shown.
5. Repeat for the other edges.
6. Use the corner support to add rigidity to minimize the flex in each corner. These are screwed into the inside edge of each corner using 4 #6 deck screws. Make sure they are in the middle of the corner, not towards either the top or bottom. This step is optional.
7. On the front and back board, mark the center position by measuring 24  $\frac{1}{2}$ " from each edge. This mark is needed for aligning the pit box into the layout.



Installing the pit boxes (Figure 2):

1. Put two stakes in the ground along the desired axis of your pits, approximately 35' apart (does not need to be exact, but needs to be extend beyond the back edge of both pit boxes).
2. Run a taught line of string between these two stakes.
3. On this line, put one stake in the ground where you want the front center of one pit to be located.
4. Put the second stake in the ground so that the outer edge is 23' 10" away from the opposite edge of the first stake, these define where you want the front-center of the pits to be located .
5. Place your pit box on the ground so that the center marks are directly underneath the string and the front edge butts up against the front-edge stake.
6. Check that your pit box is square by measuring the diagonals. They should be within 1/2" of each other. If they are not, adjust the box until it is square.
7. Repeat for other pit.
8. Stand back and eyeball the pits to make sure they look right and aligned. If not, check your measurements and realign.
9. With a flat edge shovel, mark in the ground the outside edge of the pit. Remove the pit box.
10. Dig out an area for the pits at least 3" deep, but no more than 5" deep. This does not need to be the entire inside of the area, but enough so that the pit box can sit down in this square recess.
11. Fit the pit box into this recess, and use your level to make sure the sides are level. If needed, remove pit box to add/remove material to make it level. About 4" of box should extend above the ground.
12. For final fitting, make sure the front edge of the pit box is against the front-edge stake, and both the front and back are centered on the string line. Again, check the pit box for square.
13. If needed, fill in dirt against the outsides of the pit box, to get the dirt back to ground level. This will make sure the pit box does not move later.
14. Using string to connect the opposite corners of the pit box, find the center of the pit and hammer in the pole. You should only hammer it in a few inches, as you still need to establish your pit level with sand. Check the post distance (it should be 28 feet, on center), and make minor adjustments if necessary.
15. Fill each pit box with three bags of sand, and level with a rake.
16. Finish hammering your post in, until the top is between 8 and 10" above the level of the sand.
17. Post your rules, and start pitching.

Figure 2

