Bee Hotel

Bee hotels are a type of insect hotel for solitary pollinator bees, or wasps, providing them rest and shelter. Typically, these bees would nest in hollow plant stems, holes in dead wood, or other natural cavities; a bee hotel attempts to mimic this structure by using a bunch of hollow reeds or holes drilled in wood, among other methods. Use of glues and finish is avoided as these can be toxic to bees.

Made from one 5/4 x 6” x 10’ cedar deck plank (actual dimensions are 1” x 5 ½” x 10‘).

From one end cut three sections 22” each.

On one edge of each of the 22” sections cut a ½” notch along the long dimension. These notches will be used to make half-lap joints. On two of the 22” sections make a second notch on the other long edge.

Two of the double notched 22” sections will be joined and trimmed to make the back. Square the ends. Cut each board to 4 ¼” the long dimension and save one of the trimmed edges. Join the boards with a half lap at the center, mark up at 10” from one end, and draw a 45 degree line to the center point from each outside edge. Cut both ends to make the roof peak.

The single notched 22” section will make the sides, joined with one of the trim edges from the back. Square both ends. Cut two 10” lengths. Using the trim saved in the previous step cut two 10” pieces. These will be joined to make the sides a little wider to accommodate standard sized nesting tubes.

From the remaining board cut three 6” pieces for the top, middle, and bottom of the bee hotel. When installed these will be flush with the front edges of the sides, with a small gap at the back. Alternately you can notch these sections and use the remaining notch section from the back to make them the same length as the sides.

From the remaining board cut four 9” sections. In each of these four sections cut a ½” notch along the long dimension. These notches will be used to make half-lap joints for the roof. The peak will be a square butt joint.

Cut an 8 ½” x 10 ½” section of large mesh screening for a predator screen. Notch the corners and bend so it can be screwed to the face, standing a half inch proud.

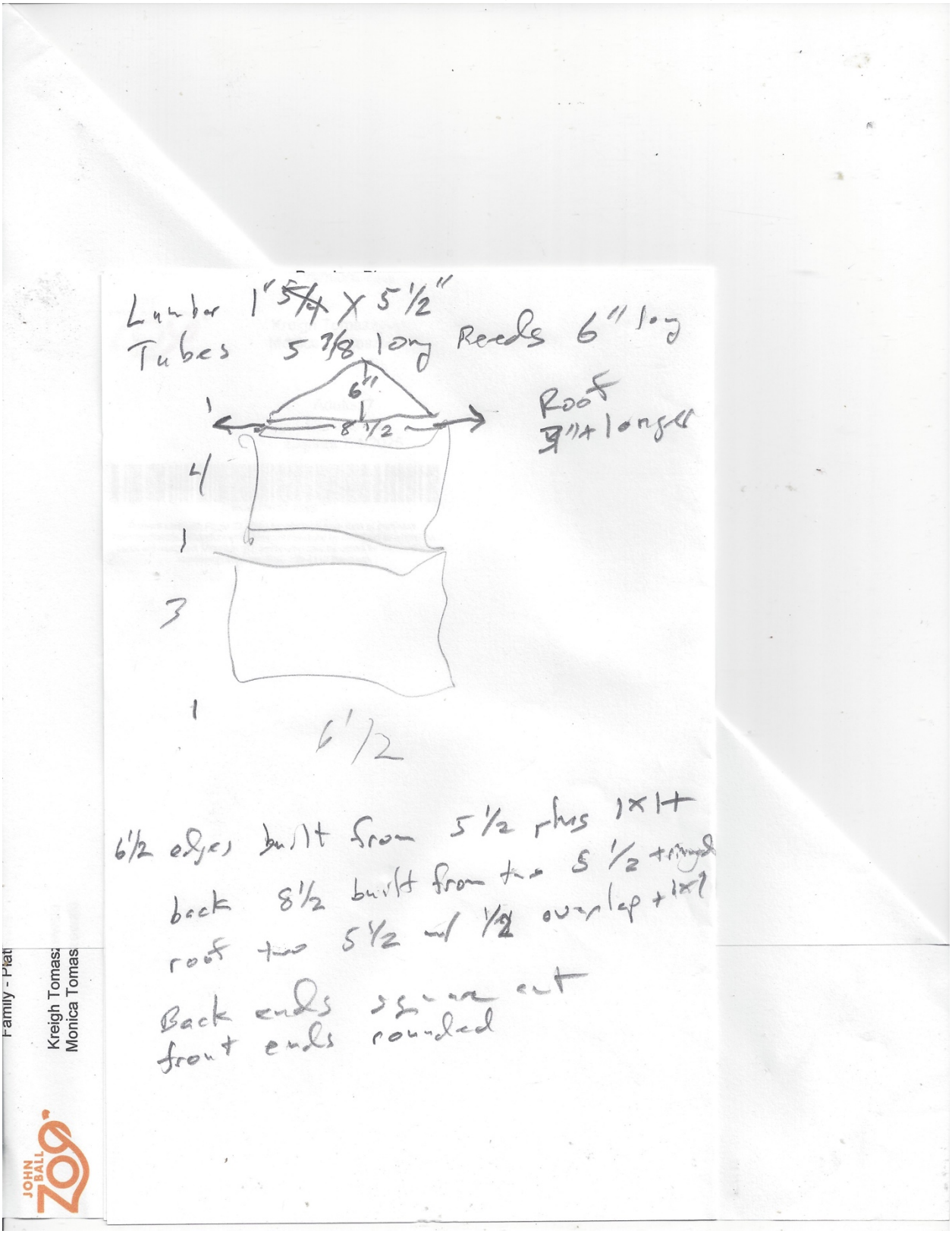
Assembly is done without glue. Half lap joints can be connected with 1” nails. Butt joints can be assembled with 2” nails. Drill a couple of 1/8” holes in the peak of the back so it can be screwed to a mounting post.

Attach the screen to the front with screws and washers after filling bays with nesting tubes. Each bay takes about three boxes of mixed size tubes.


ALASKA
WARNING


DEWALT
CRAFTSMAN

And just for fun, here are my first draft design plans



And the falling apart Bee Hotel that prompted this project.