FOYER BENCH

PLEASE CUT HERE

Popular Mechanics

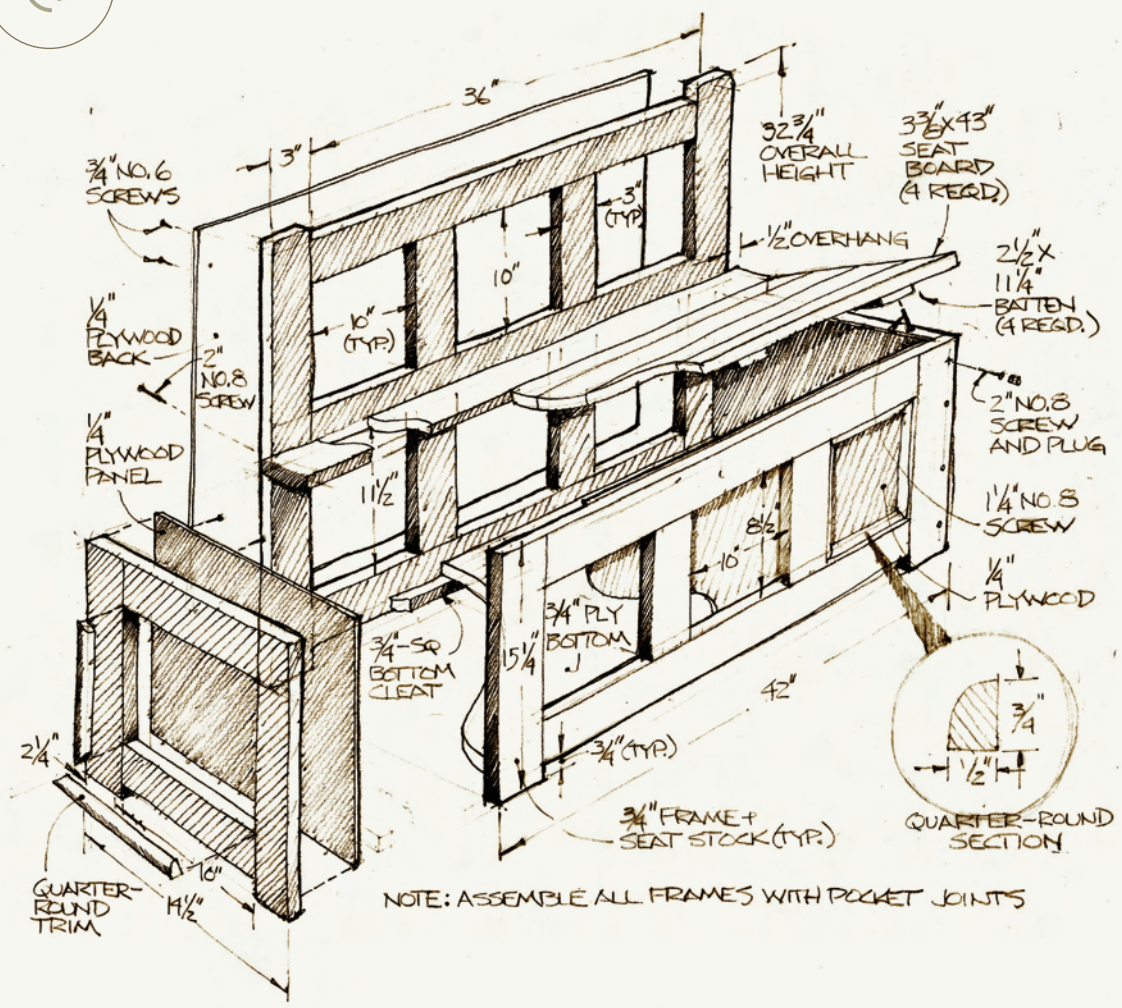
POCKET-HOLE GEAR: There are several pocket-hole jigs available—we used the Kreg Rocket Jig Kit (about $55, kregtool.com). It includes a drill-bit guide, a special stepped drill bit that bores an 11/64-in. hole followed by a 3/8-in. hole so the screwhead can be driven below the surface, and a long driver bit that reaches into the pocket hole. You'll also get a locking-pliers-type clamp that holds the jig on your workpiece.

Tools & Hardware

OTHER ESSENTIALS:
Circular saw (table saw or power miter saw is better)
Drill/driver
Combination bit
Orbital sander
Tape measure
Trysquare
Clamps

HARDWARE AND SUPPLIES:
1¼-in. pocket-hole screws
¾-in. No. 6 fh screws
1¼-in. No. 8 fh screws
2-in. No. 8 fh screws
1¼-in. finishing nails
Wooden plugs
Wood glue
120- and 220-grit sandpaper
4-in. T-hinge (Stanley No. 15-6450)

1



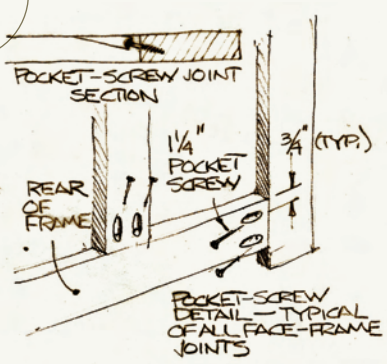
The bench is composed of four panel assemblies, a ¾-in.-thick plywood bottom and a lid made of oak boards tied together with cross cleats. The bottom is held in place by support cleats screwed to the inside of the panels. Keep in mind that plywood and solid wood thicknesses can vary. For example, nominal 1-in.-thick solid hardwood is often 13/16 in. thick instead of ¾ in. And plywood is usually a bit thinner than indicated. Check your stock thickness and adjust the project dimensions where necessary.

When your bench is done, you can stain the oak if you want a darker color. Then, apply a protective finish such as polyurethane varnish.

Quick Tip

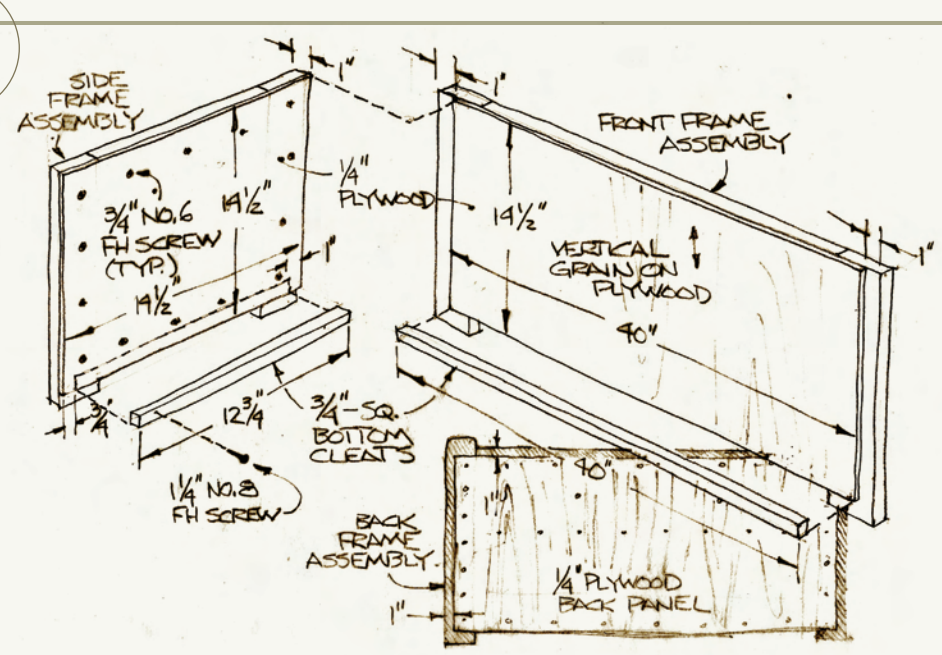
For square cuts on a miter saw or table saw, use straight stock and hold the same edge against the fence for each end cut. Masking tape on the back side of the cut will help prevent tearout.

2



We considered assembling the frames with plate joints—a fine choice if you have a joiner and several bar or pipe clamps. But pocket joints require a minimum of clamps and no glue, and they go together quickly. You'll need a jig that guides a special drill bit to create angled screwholes (see Tools & Hardware at left). Bore the holes at the ends of frame pieces so the screw tips enter the side grain of adjoining parts. When all pocket holes have been bored, clamp each joint and drive the screws.

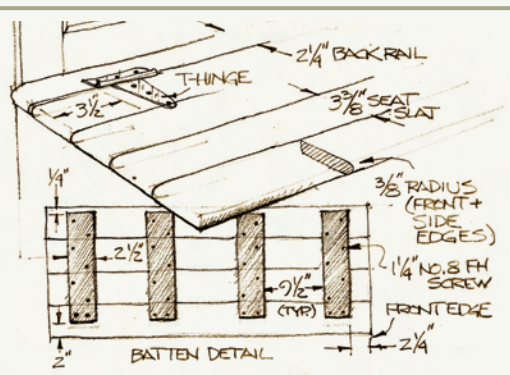
3



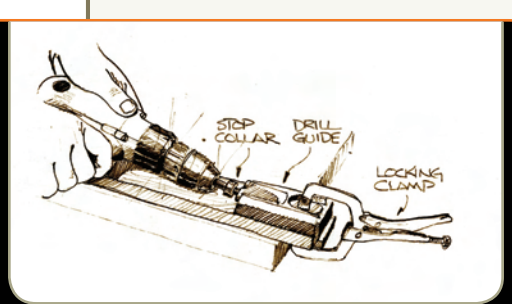
Cut the ¼-in. plywood panels to size, making sure that the grain will run vertically in the assembled bench. Note that the front panel is recessed 1 in. at the ends to create rabbet joints that the side panels fit into. Recess the back panel around the top and sides of the back frame so it's not visible when the bench is against a wall. After gluing and screwing the plywood to the frames, screw the bottom-support cleats to the panels. Join the sides to the front with screws set below the surface in 3/8-in. counterbores, glue wooden plugs over the screwheads and trim the plugs flush. The screws for the back panel need only be countersunk flush. Then fit the bottom panel. We added oak shoe molding in the frame openings. You also can make this trim yourself with a quarter-round bit in a router table.

4

To make the seat, first cut the back seat rail to size, and round the ends with a block plane and sandpaper. Secure the rail to the back of the bench with 2-in. No. 8 screws. Then, cut the seat cleats and slats to size, assemble the seat with 1¼-in. screws, and round the ends and front edge. Position the seat and attach the two T-hinges.



BORING POCKET HOLES



Screws driven at a shallow angle through the backs of face-frame members require angled screwholes, or pocket holes, that are impossible to bore without a jig to guide the bit. To ensure accurate pocket-hole depths, use a stop collar on the stepped drill bit and clamp the drill guide to the workpiece. When driving the screws, set your driver's clutch to just bring the joints snug.