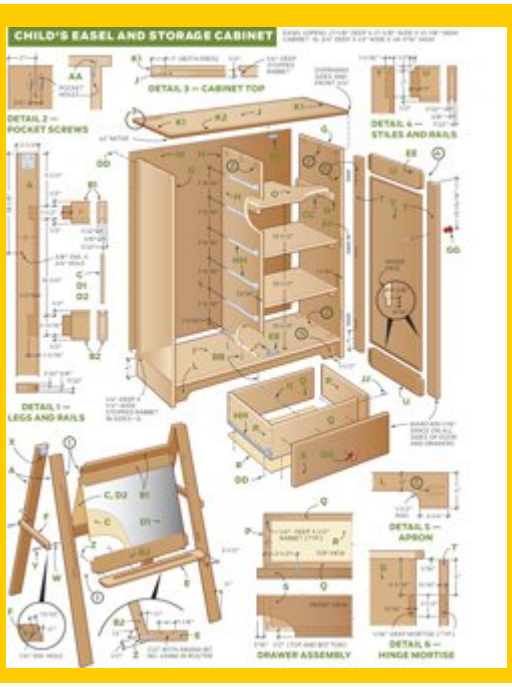
# Build A Child's Maple Storage Cabinet And Easel

We all want the best for our children--even when their creative endeavors seem to overtake every surface in the house. How do you know when it's gone too far? Well, when you start writing checks with a Day-Glo pen or get the cold shoulder for accidentally sitting on your finger-painted portrait, it's time to bring some of your own skills into the act.

To help out, we've designed an easel and a storage cabinet to help focus your kids' expressive energy and provide a place for arts-and-crafts supplies. The folding easel features dry marker board on one side and corkboard on the other. The storage cabinet has six drawers and spacious shelves for supplies and games.

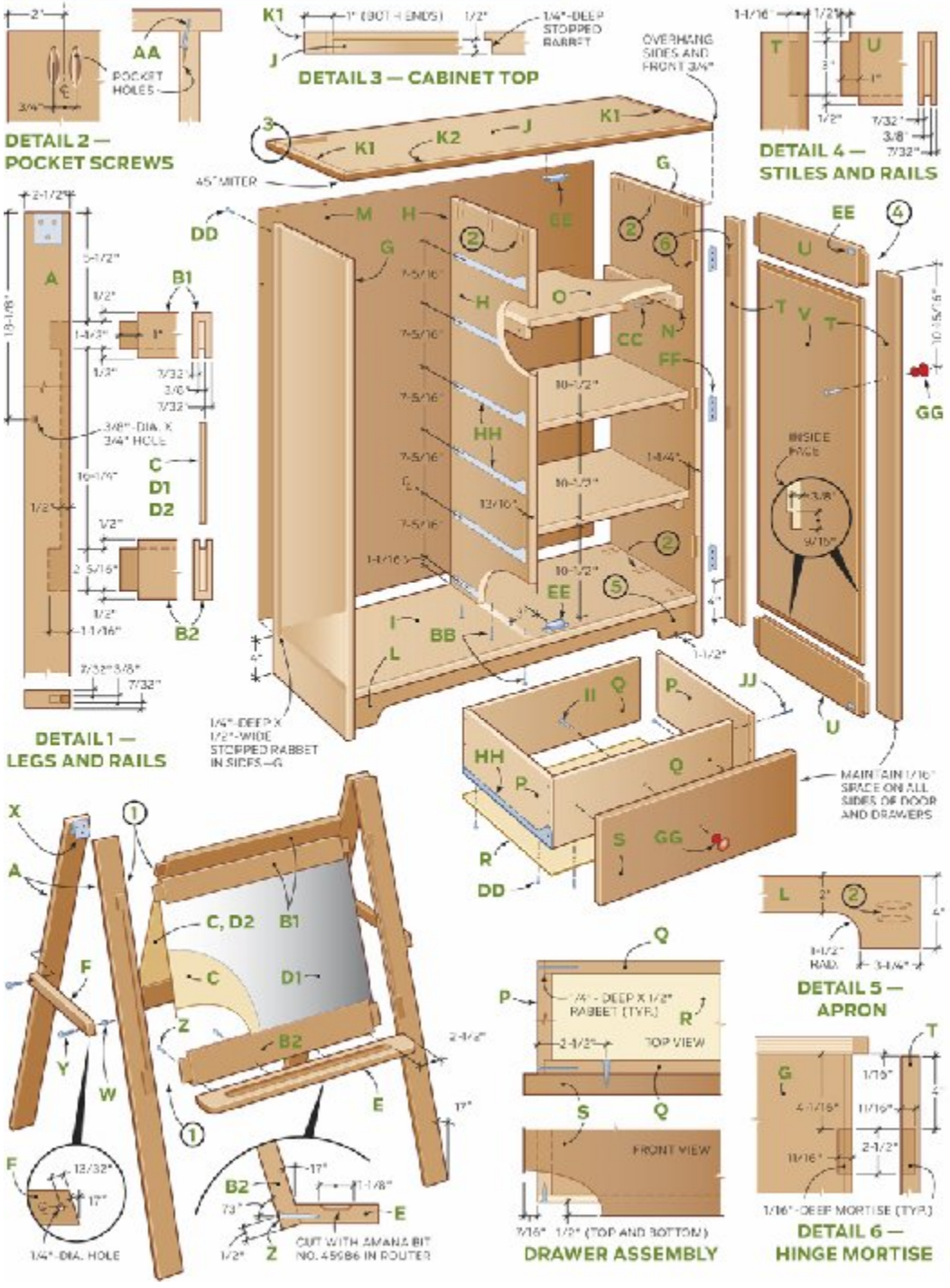



| MATERIALS LIST | | | |
|---|---|---|---|
| **KEY** | **QTY.** | **SIZE** | **DESCRIPTION** |
| A | 4 | 13/16 x 2-1/2 x 43-1/2" | maple (leg) |
| B1 | 2 | 13/16 x 2-1/2 x 23" | maple (rail) |
| B2 | 2 | 13/16 x 3-5/16 x 23" | maple (rail) |
| C | 2 | 1/4 x 16-1/4 x 22" | plywood (panel) |
| D1 | 1 | 1/8 x 16-1/4 x 22" | marker board |
| D2 | 1 | 1/8 x 16-1/4 x 22" | cork[2] |
| E | 2 | 13/16 x 2-3/4 x 24" | maple (tray) |
| F | 2 | 13/16 x 1-1/4 x 12-7/8" | maple (bracket) |
| G | 2 | 3/4 x 16 x 48-11/16" | plywood (side)1 |
| H | 1 | 3/4 x 15-3/4 x 43-15/16" | plywood (divider)[1] |

| | | | |
|---|---|---|---|
| J | 1 | 3/4 x 16 x 41-1/2" | plywood (top) |
| K1 | 2 | 3/4 x 3/4 x 16-3/4" | maple (edging) |
| K2 | 1 | 3/4 x 3/4 x 43" | maple (edging) |
| L | 1 | 13/16 x 4 x 40" | maple (apron) |
| M | 1 | 1/4 x 41 x 45-3/16" | plywood (back) |
| N | 6 | 13/16 x 1-1/2 x 13-1/2" | maple (cleat) |
| O | 3 | 3/4 x 14-1/2 x 19-5/8" | plywood (shelf) |
| P | 12 | 1/2 x 6 x 14" | maple (side) |
| Q | 12 | 1/2 x 6 x 18-1/8" | maple (end) |
| R | 6 | 1/4 x 14 x 18-5/8" | plywood (bottom) |
| S | 6 | 13/16 x 7-1/4 x 19-1/2" | maple (face) |
| T | 2 | 13/16 x 2-1/2 x 43-13/16" | maple (stile) |
| U | 2 | 13/16 x 4 x 16-1/2" | maple (rail) |
| V | 1 | 1/2 x 15-1/2 x 36-13/16" | plywood (panel) |
| W | 4 | 1/4"-20 | threaded insert[3] |
| X | 2 | backflap hinge[6] | |
| Y | 4 | 1/4"-20 | threaded knob[4] |
| Z | 8 | 1-1/2" No. 8 | fh screw |
| AA | 30 | 1-1/4" | pocket screw |
| BB | 3 | 2" No. 8 | fh screw |
| CC | 12 | 1-1/4" No. 8 | fh screw |
| DD | as reqd. | 3/4" No. 6 | fh screw |
| EE | 2 | magnetic catch[5] | |
| FF | 3 | 2-1/2" | utility hinge[7] |
| GG | 7 | 33mm | red knob[8] |
| HH | 6 | 350mm | drawer slides[9] |
| II | 7 | 1-3/4" No. 8 | rh screw |
| JJ | as reqd. | 4d | finishing nail |

# CHILD'S EASEL AND STORAGE CABINET

EASEL (OPEN): 27-1/8" DEEP X 27-5/8" WIDE X 41-7/8" HIGH
CABINET: 16-3/4" DEEP X 43" WIDE X 49-7/16" HIGH



# CHILD'S EASEL

**1** Use a router and edge guide to cut the mortises in the easel legs. Then, readjust the bit depth and rout the panel grooves. Use a table saw to cut the tenons on the rails.

**2** Cut 1/4-in. maple plywood to size for the easel panels. Cut the 1/8-in.-thick cork a few inches oversize, and apply spray adhesive to secure it to one panel.

**3** Press the cork in place and trim excess with a utility knife. For the white marker board, we bought a framed board from a home center and removed the frame.

**4** Bore pilot holes for the 1/4-in. threaded inserts in the outer edge of each leg. Use a 6mm Allen wrench to drive the inserts into the holes until they're flush.


**5** Bore screwholes for attaching the trays. We used an angled block as a guide for accurate hole position and angle. Rout recesses in the trays and secure them to the frames.

**6** Support the easel frames so they lie flat, and install the hinges at the frame tops. Then, cut the brackets to size, bore holes for the knobs and install the brackets.

**7** Clamp sides to the bottom and drive the pocket screws. Then, lay the top upside down, position the cabinet on it and secure with screws.

## POCKET-HOLE JOINERY

If you're familiar with toenailing--the technique of driving nails at an angle--you should feel right at home with pocket-hole joinery. Here, frames and cabinet panels are assembled with special screws driven at a shallow angle through the stock face.

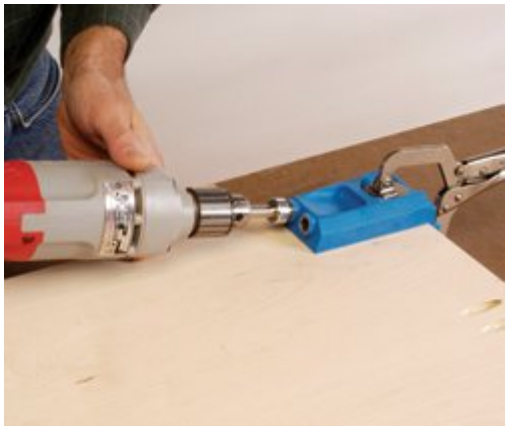
To bore the angled pilot and screwhead clearance holes, you'll need some special tools. Several jigs are available through woodworking mail-order dealers. The one we used is in the Kreg Rocket Pocket Hole Fixture Kit (about $60, Woodcraft Supply). The kit also comes with a special bit, screws, a long driver for power driving the screws, and a clamp for locking the jig to the work.

## STORAGE CABINET

**1** Cut maple plywood for the sides, partition and bottom slightly oversize. Then, apply the 3/8-in. maple edging to the exposed edges.

**2** Cut the top panel to size. Rip 3/4-in. edge strips for the front and sides, miter the corners and glue them in place. Trim the edging flush.

**3** Lay out the stopped rabbets in the top and side panels, and use a router to make the cuts. Square the rabbet ends with a chisel.



**4** We used pocket screws (see sidebar, page 90) to join the panels. Clamp the parts together and use a pocket-hole jig to bore the holes.

**5** Lay out the hinges on the right side panel and cut the recesses. Remove most of the waste with a small router and finish with a chisel.

**6** To join the bottom panel to the partition, first clamp the pieces together. Then, bore pilot holes and drive the screws.

**7** Clamp sides to the bottom and drive the pocket screws. Then, lay the top upside down, position the cabinet on it and secure with screws.

**8** Use a sabre saw to shape the apron. Then, glue and screw it to the cabinet. Attach the plywood back and add the shelves.

**9** Install a dado blade in your table saw and cut the rabbets in the drawer sides. Assemble the drawer boxes with nails and glue.

**10** Attach the bottoms with screws. Clamp each face to its drawer box and secure with screws. Then install the drawer slides.

**11** Cut maple stock for the door frame. Rout the mortises, square the rounded ends with a chisel and rout the panel grooves.

**12** Cut the tenons with a dado blade and table saw. Use a backsaw to cut the tenon haunches (small stepped shoulders).

**13** Cut the door panel from 1/2-in. plywood. Test fit the door-frame joints to make sure they're not too tight or loose.

**14** Spread glue on the frame joints and assemble the door. Apply clamps and check that diagonal measurements are equal.

## FINISHING

We finished both the cabinet and easel with three coats of McCloskey Water Base Polyurethane in a satin finish. To do the job, first remove all hardware and sand the wood with 120-, 150- and 220-grit sandpaper. Then apply each coat according to the manufacturer's instructions. When the final coat is dry, rub the surface with 4/0 steel wool and buff with a soft cloth.

If you'd like to paint your hinges to match the cabinet's knobs, first lightly sand the metal with 180-grit sandpaper or scuff it with a wire wheel. Then, spray with Rust-Oleum Painter's Touch Multi-Purpose Paint, Colonial Red. Apply two or three light coats.