

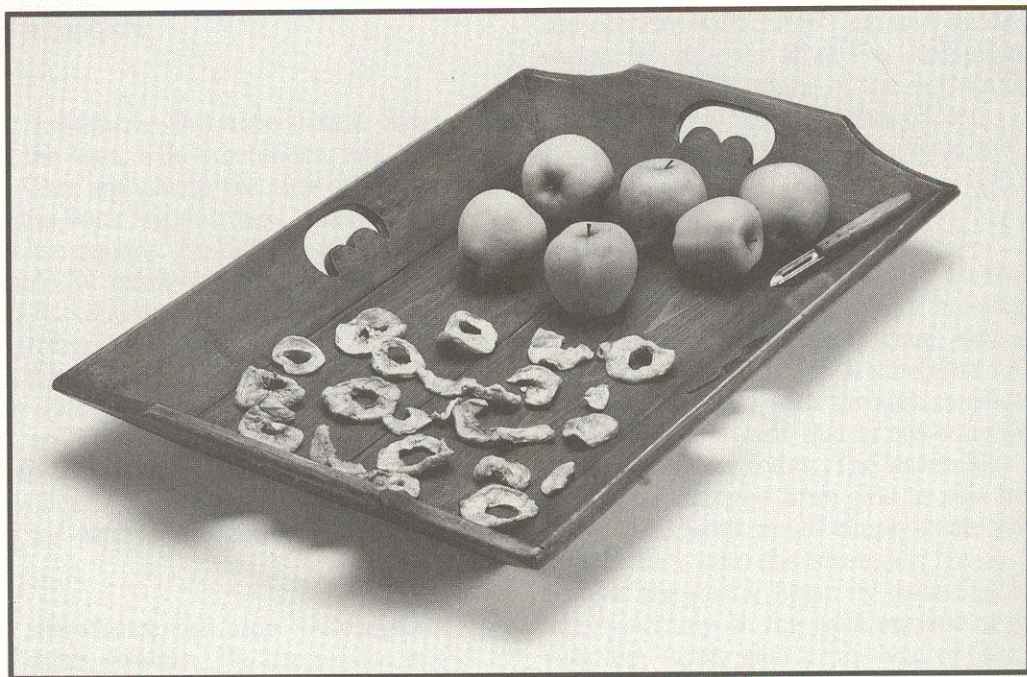
APPLE-DRYING TRAY

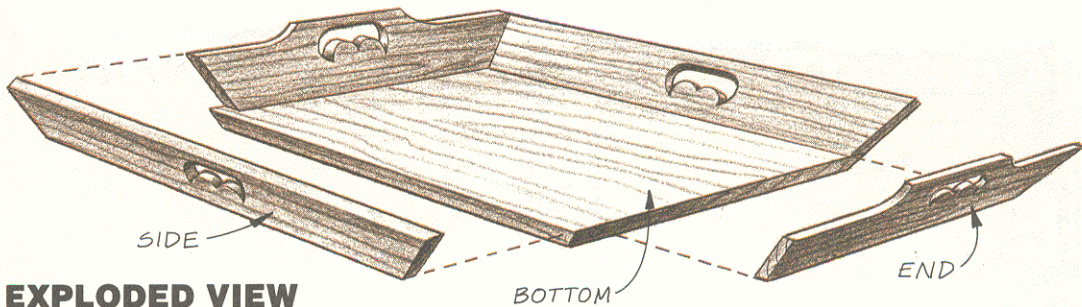
Every once in a while a design comes along that is pure delight. This tray, which was probably used for drying apples and other fruit, is a good example. The original red stain lends it so much warmth and character you could hang it on your wall. But its generous size and light weight make it so useful that you won't leave it on the wall.

Don't let the angles on the corners of the tray intimidate you. If you haven't made this kind of joint before, just follow the step-by-step instructions and make test cuts on scrap before cutting your tray parts. The tray pieces are joined with glue and nails.

1 Select the stock and cut the parts. Choose a light and easily worked wood like pine or poplar for this project and plane it, or have your lumberyard plane it, to $\frac{5}{8}$ inch thickness. Edge-glue boards as necessary to obtain the required width for the bottom. (See page 6 for more on edge-gluing.) Rip the parts to width and crosscut them to a couple of inches over the lengths given in the Cutting List.

2 Bevel the bottom edges of the sides and ends. The bottom edges of the sides and ends are beveled to join





EXPLODED VIEW

the bottom. Ripping this bevel before cutting the angled ends makes it easier to cut the ends. Tilt the saw blade 45 degrees and adjust the fence to cut the bevel without narrowing the parts. Rip the bevels, then plane off the saw marks.

3 Cut the angles on the sides and ends. The ends of the tray sides and ends require a compound angle. The simplest way to cut these angles is to make a beveled auxiliary fence for your miter gauge as shown in the *Mitering Jig Detail*. This allows you to cut the joints with only one angle setting: the standard 45-degree blade tilt.

To make the jig, bevel a piece of 8/4 (eight-quarter) stock so the width on the wide surface is no less than the height of your miter-gauge fence. A dry piece of construction lumber will do for this fence. Make the length of the fence twice the distance from your miter-gauge slot to your saw blade. Center the beveled fence on your miter-gauge fence and screw it in place through the holes provided in most miter gauges.

Lay out the bottom edge width on the sides and ends as shown in the *Side View* and *End View*. Tilt the saw blade to 45 degrees, raise the blade to maximum height, and check that the miter-gauge fence is perpendicular to the bar. Hold each part in turn against the beveled

CUTTING LIST

Part

Dimensions

Sides (2)

$\frac{5}{8}" \times 3\frac{3}{4}" \times 27\frac{1}{4}"$

Ends (2)

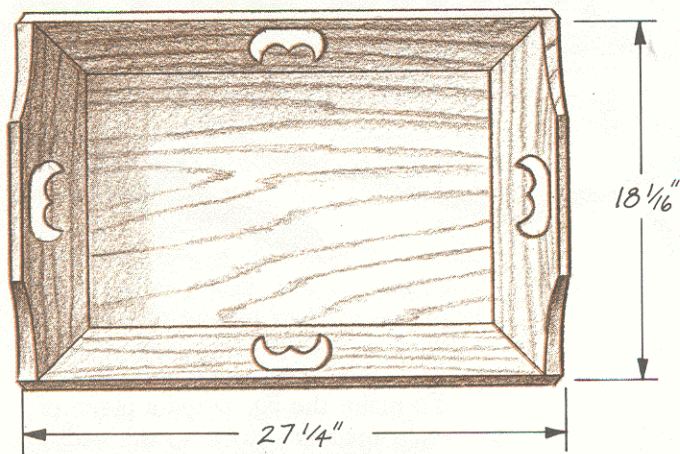
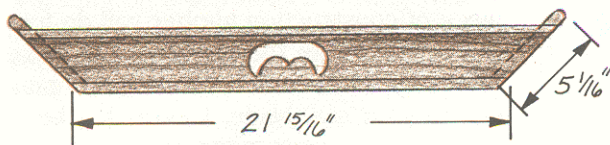
$\frac{5}{8}" \times 5\frac{1}{16}" \times 18\frac{1}{16}"$

Bottom

$\frac{5}{8}" \times 14\frac{1}{2}" \times 21\frac{15}{16}"$

Hardware

4d finishing nails

**TOP VIEW****SIDE VIEW****END VIEW**

fence, align the blade with the mark on the bottom edge of the part, and cut the angle on one end of the part. With a 10-inch-diameter saw blade you'll find that the cut is about 1 inch shy of completion on the sides, more on the ends. Finish the cuts with a fine-tooth handsaw.

To cut the second compound angle on each part, turn the miter gauge around and slide it backward into the slot on the saw table. Line up the cut, then screw the part to the beveled fence through the waste area where the handle will be cut out. Make the second cut in each part in this way.

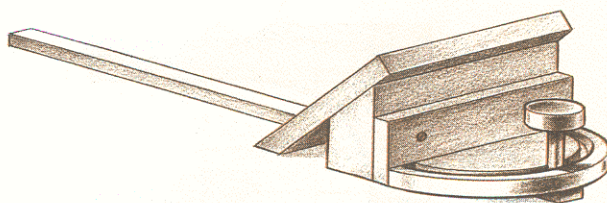
4 Cut out the end piece shapes.

Round-over the top edges of the end pieces with a 1/4-inch-radius, ball-bearing roundover bit in your router.

Assemble the sides to the ends on a flat surface, holding them together with masking tape. Mark the top edges of the sides on the ends of the end parts. Since the sides meet the ends at an angle, these marks will angle across the ends. You need only mark the high points at the outside surfaces of the ends.

Make a stiff paper pattern of the end shape as shown in the *End Shape Detail*. Trace the pattern on the outside

SHOP TIP: If two adjoining parts are difficult to hold in position during assembly, drive two small brads into one of them and snip the brads off so they protrude about $\frac{1}{16}$ inch. Press the adjoining parts together embedding the brad tips in the second part.



MITERING JIG DETAIL

surface of the ends aligning the bottom of the curve with the marks you made on the ends. Saw to the lines with a coping saw. You'll finish shaping the ends later.

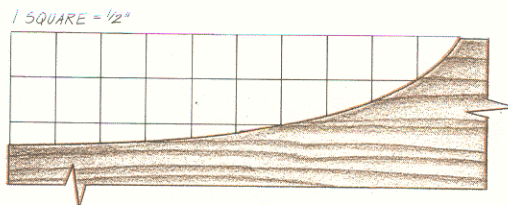
5 Cut out the handles. Make a stiff paper pattern of the handle design as shown in the *Handle Detail*. Trace the pattern onto the sides and ends, centering it from end to end. Drill starting holes within the handle layouts, insert the coping saw blade, and cut out the handles. Clean up the sawn edges with sandpaper wrapped around dowels and/or small sticks. While you're at it, soften the edges of the handles for a more comfortable grip.

6 Assemble the tray frame. Sand the tray sides and ends. Assemble the sides to the ends on a flat surface, holding them together with masking tape. Make sure the bottom edges are flush. Drill three pilot holes for 4d finish nails to hold each joint together. Drill right through the tape if necessary. Remove the tape, clamp an end piece in your vise, and glue and nail an adjoining side to it. Repeat for all four joints.

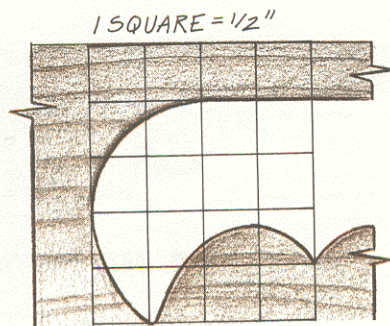
Check that the diagonals of the assembly are equal, ensuring that the assembly is square. When the glue is dry, set the nails and fill the nail holes.

7 Bevel the edges of the bottom. Tilt the table-saw blade 45 degrees and bevel one edge and one end of the bottom board. Set the assembled sides and ends on the bottom board, align the assembly with the beveled edges of the bottom, and trace the other two edges onto the bottom. Bevel the last two edges of the bottom allowing a little extra for cleaning up the saw marks.

8 Attach the tray bottom. Sand the bottom, then tape it to the assembled sides and ends. Drill shank holes for



END SHAPE DETAIL

**HANDLE DETAIL**

4d finishing nails about every 3 inches to hold the bottom to the sides and ends. Be sure to angle the holes at 45 degrees. Nail the bottom in place, then set the nails and fill the holes. Plane and sand the beveled bottom edges flush with the sides and ends.

9 Bevel the curved ends. The inner surfaces of the ends still protrude above the sides. The curves in the ends must have gradually changing bevels to eliminate this protrusion. The bevels will be 45 degrees at the sides but 90 degrees at the other ends of the curves. Shape the bevels by hand with a round-bottom spokeshave or rasp, then sand them smooth. Clean up any remaining saw marks on the tray.

10 Complete the apple-drying tray. Give the entire tray a final sanding and soften any sharp edges. The original tray has a mellow red-brown stain that you can reproduce if you like, then apply several coats of tung oil or Danish oil, following the manufacturer's instructions.