

STRIP-CUTTING JIG

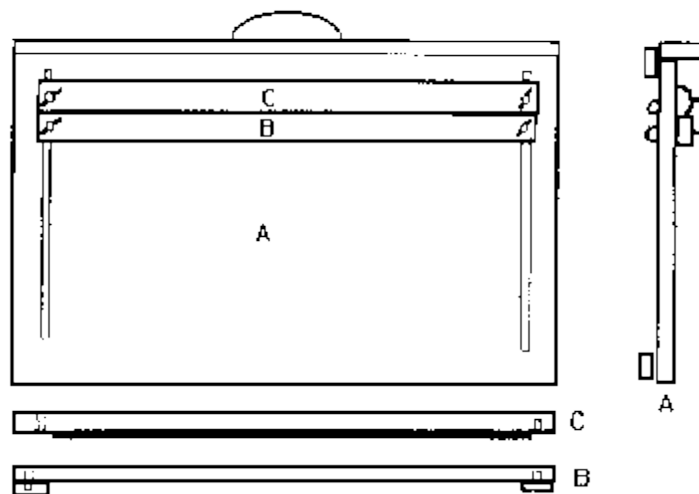
by *Bruce Fairchild*

The Jig

- Part A - Base 7/16 particle board 12"x18" ½" x 1" x 18" back stop. Carrying handle optional.
- Part B - Adjustable width stop 1"x ¾"x 18" hard wood.
- Part C - Adjustable metal straight edge cutting bar. I used a metal wall bracket mounting base for adjusting shelves.

Sundry Parts

- 4 - ¼" x 3" carriage bolts.
- 8 - ¼" flat washers.
- 4 - ¼" wing nuts.
- 12" x 18" piece of arborite for a cutting surface.
- 42" of 1" arborite edging.
- 4 - ½" x 2" x 2" feet (one on each corner).
- 18" x 1" strip of sand paper.



Assembly

Glue 18" x ½" x 1" back stop to 12" x 18" base board.

Glue 4 corner feet in place.

Glue 12" x 18" piece of arborite on top of base board, also glue arborite strip on sides and bottom to protect the particle board.

Drill 4 - 5/16 holes with ¾" centres from each side, ¾" from the top and 2" from the bottom.

Using a 5/16" straight router bit, set router guide to centre router bit in the pre- drilled holes and cut a 5/16" slot from the top hole to the bottom hole.

Repeat for the other side.

Drill 2 - 5/16" holes in the adjustable width stop to line up with the slot in the base.

Clear a 1/8" deep slot from the bottom to within 1¼" of each end.

This gives a tunnel about 15½" wide for veneer to slide freely in and out for the jig.

Drill 2 -5/16" holes in the adjustable cutting straight edge.

(prior to this I had to cut and epoxy glue a piece of wood into the hollow portion and sand to get a solid flat surface on the bottom.) A piece of sand paper is glued to the bottom of the cutting edge to hold the veneer steady while cutting.

Place a flat washer on each ¼" carriage bolt and above through the slots from the bottom of the base. Place each the width stop and the cutting edge onto the ¼" carriage bolts, place a flat washer and a wing nut on each ¼" bolt.

Operation

The width of veneer to be cut is established by moving the cutting edge till the distance between the back stop is established. Tighten the wing nuts on the cutting edge bar to hold this setting, then move the adjustable width stop up to the back of the cutting edge bar and tighten the wing nuts on the width stop. Loosen the wing nuts on the cutting edge bar and slide veneer under the slot in the width stop and under the cutting edge bar. Tighten the wing nuts on the cutting edge bar, making sure it is tight against the width stop. You can cut your veneer using a craft knife. Remove the cut piece and repeat for as many cuts as you require of the set width.

Making a Chessboard

Using the jig set the width of the cut to 1½". Take a piece of maple or birch about 15" wide and cut with the grain nine pieces that will be 1½" x 15". Next to a piece of walnut about 15" wide and cut with the grain eight pieces that will be 1½" x 15". Now join the alternately maple or birch and walnut strips together edge to edge and tape along the joints with gummed tape. Rotate the assembly by 90 deg. and slide into the jig. It is important to position the assembly at 90 deg to the back stop (this can be established prior to the setting the 1½" width by sliding a try square under the width stop and cutting edge to the back stop and marking the 90 deg edge).

The first cut will not be 1½" but enough to establish a square cut across the assembly. Now proceed to the 8 strips across the grain from the assembly that are 1½" wide. With the 8 strips move alternate strips forward by one square, to bring the light and dark squares together and tape them together. Trim off the unwanted ninth square which protrudes at the end of each row.
