




December 2003
UPDATE

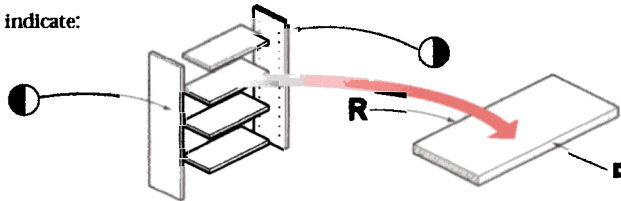
How To Rout Shelf Holes And Notches On Your Leigh Jig

 These instructions are based on the assumption that you are fully conversant with the dovetailing instructions in the Leigh Jig User Guide. Do not attempt the following procedures until you are.

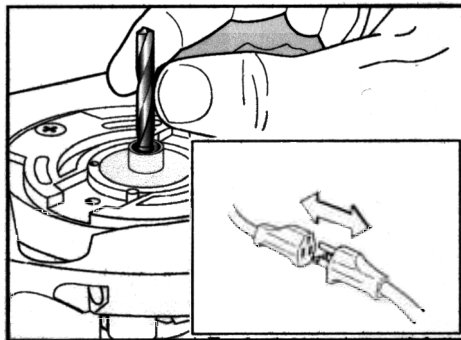
S H E L F H O L E S A N D N O T C H E S

The following symbols indicate:

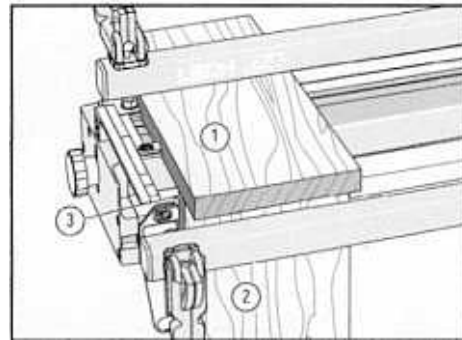
-  Left side
-  Right side
- F** Front
- R** Rear



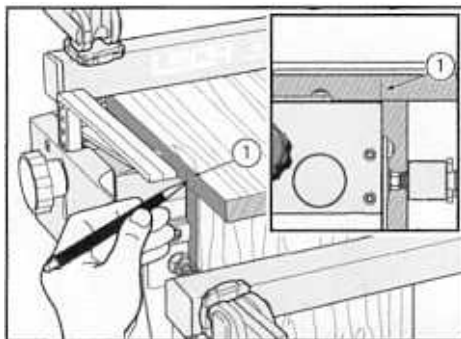
For ease of illustration we have shown cabinet sides and shelves narrower than most projects. We recommend you also use narrow (low cost) stock to practice this procedure.



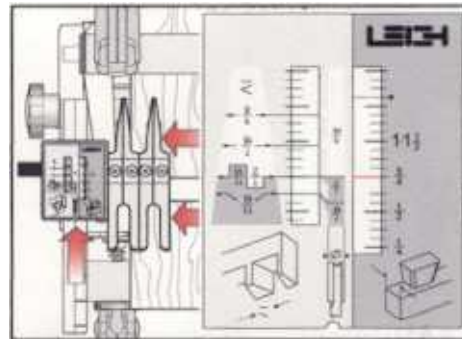
1 Set up your plunge router with a 7/16" guidebush and the plunge cutter size to suit the required pin or pin bush.



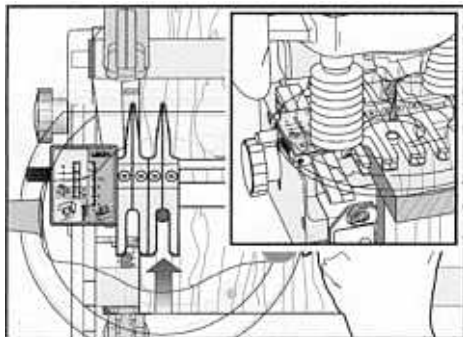
2 Clamp a piece of say 1 x 6 scrap-board horizontally in the rear clamp of the jig (1), against the left side stop. Clamp a board (any size, it doesn't matter) in the front clamp (2), against the left hand side stop, the top end edge touching flush under the scrap board. The left edges of both pieces should be flush with each other (3).



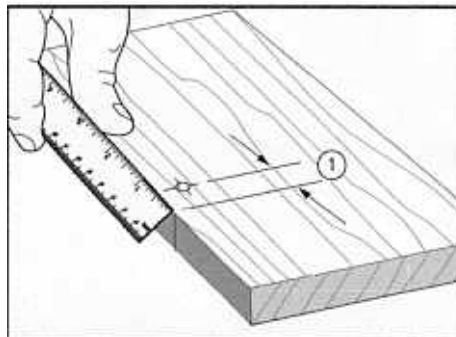
3 Make a pencil mark on the left edge of the horizontal scrap board exactly above the rear edge of the vertical board (1).



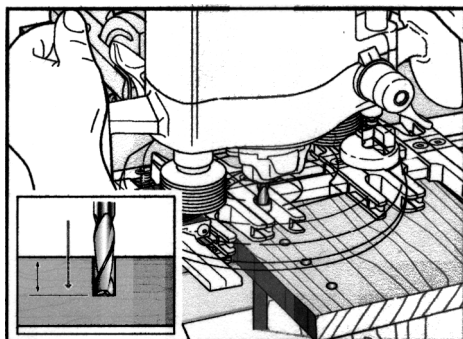
4 Put the finger assembly on the jig in the half blind tail mode; set 3/4" at both ends. Adjust one pair of guides somewhere near to the left edge of the board. Lower finger assembly onto the scrap board.



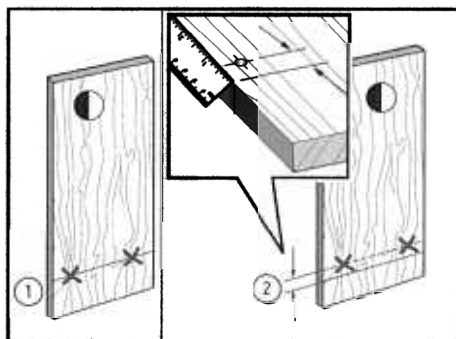
5 Using the crotch on the tail side of the fingers run the 7/16" guidebush into the crotch and maintaining slight inward pressure, plunge a shallow hole in the board.



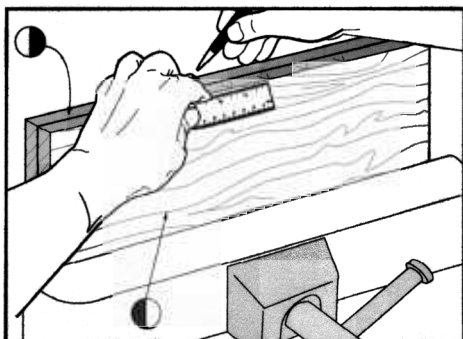
6 Remove the scrap board and measure the distance from the pencil mark to the centerline of the hole ①. Record this dimension!



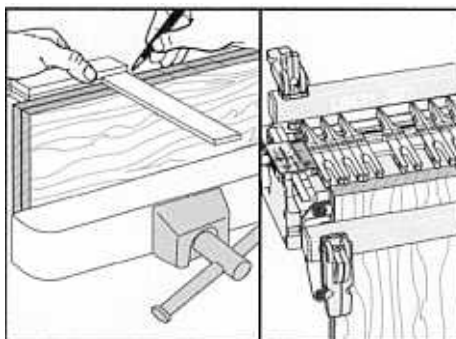
7 Put the scrap piece back in the jig and plunge a few more test holes to get the exact hole depth required. Set the router plunge depth stop.



8 Take the left hand side panel upright and mark with crosses where you want the two lower (front and rear) holes to go and square this centreline across to the panels front edge ①. Using the dimension recorded in No. 6, make a mark "down" along the front edge of the left hand panel from the hole centreline, by the recorded dimension ②.

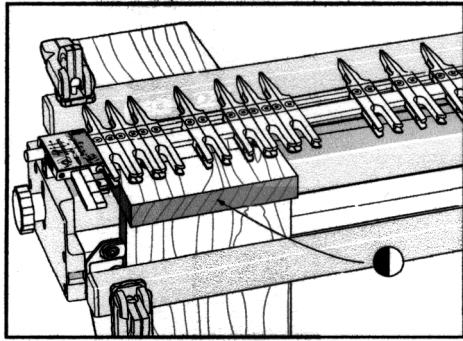


9 Stand the two side panels together in a bench vise, inside faces together, front edges up, all front, top and bottom edges flush. Now make further marks along the front edge (going "up" the panels front) at the spacing you require e.g. 1", 1-1/4", 32 mm or whatever you wish. (These marks are not in line with where you want the holes, they are merely reference marks for aligning the boards on the jig.

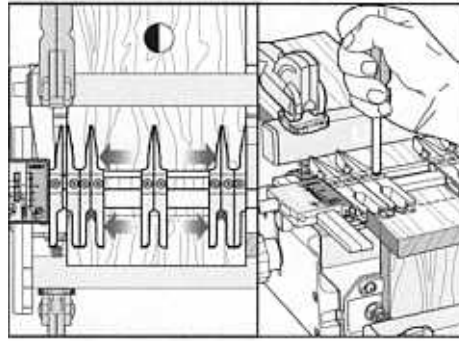


10 Square the pencil marks across the front edge of both panels.

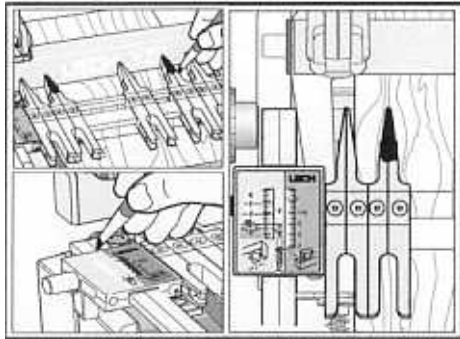
Note: the finger assembly is still in the half blind tail mode, set on 3/4" and the piece of wood is still in the front clamp.



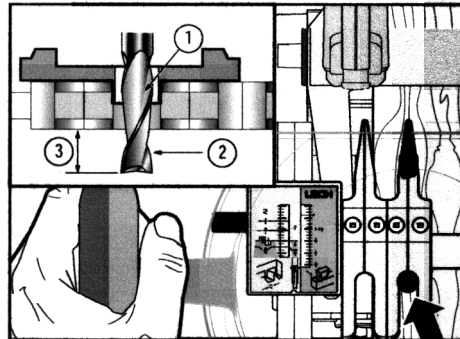
11 Clamp the left hand side panel in the rear clamp, front edge against the left hand side stop, inside face up and the first (lower hole) pencil mark exactly over the inside edge of the vertical board.



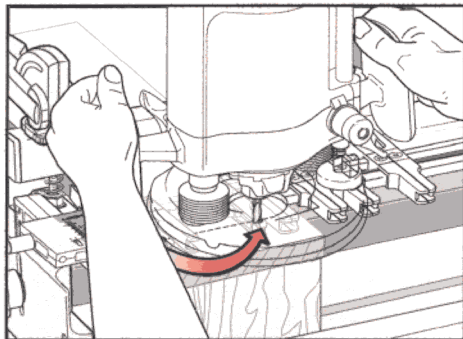
12 With the finger assembly slightly raised above the board, adjust a pair of fingers so that the tail "crotch" is directly over the left hand cross cross marking the hole position. Repeat with another pair of fingers to centre on the right hand cross. Leave spare fingers wherever required as router support. Tighten all the fingers and lower the finger assembly down onto the panel.



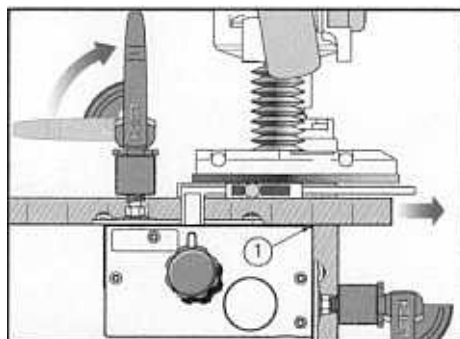
13 Mark the pin ends of the two operative pairs of fingers with a felt pen. This will aid in positioning the router correctly when routing.
Note: Using the front and rear of the scale as straight edges take a medium tipped dark felt pen and mark a line across the support brackets both in front and behind each scale. You will need these marks later.



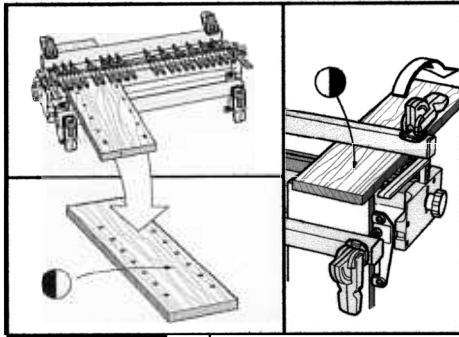
14 Your Router now has the 7/16" guidebush and correct sized cutter (2), and depth rod set at the correct plunge depth (3). With the router raised, Run the router into the left hand crotch and while maintaining light pressure toward the rear of the jig, plunge the left hand hole.



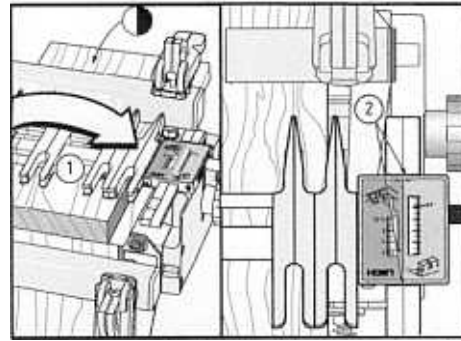
15 Raise the plunge and run the router round into the right hand crotch and plunge. Raise the plunge and leave the router there.



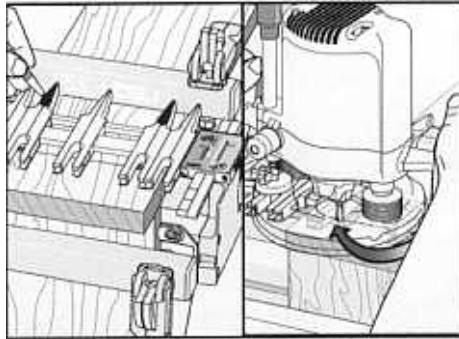
16 Release the rear clamp, pull the board forward toward you until the second pencil mark is in line with the rear of the front board (1) and re-clamp. Now plunge on the right; raise the plunge; move to the left position and plunge; raise the plunge and leave the router there. By this means the router only has to be moved once per each pair of holes and does not have to be lifted off the jig until the side panel is finished.
Note: Always ensure the panel is against the rear side stop and flush with the edge of the front board.



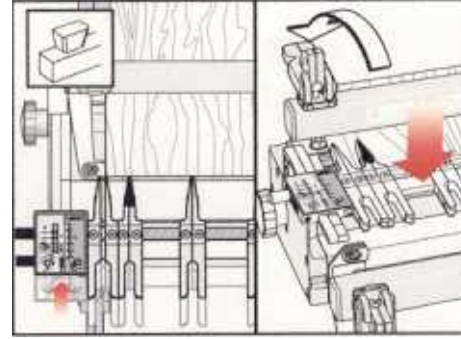
17 When the left panel is finished, remove it and the finger assembly from the jig. Clamp the right hand panel in the jig, inside face up, but with its front edge against the right side stop and lightly clamp. Bring the upright board from the left side to the right side stop and raise it so the top edge is flush under the panel and clamp. Unclamp and adjust the right hand panel and align the first reference line with the upright board. Clamp securely.



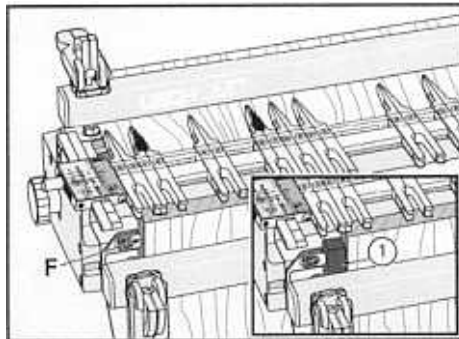
18 Turn the finger assembly end-over-end and replace the finger assembly onto the jig but now in the through dovetail tail mode ①. Line up the scale assemblies right between the felt pen marks you applied previously to the support brackets ②.



19 Mark the pin ends of the two pairs of fingers with a felt pen. This will aid in positioning the router correctly.
Repeat steps 14 thru 17 on this right hand panel.

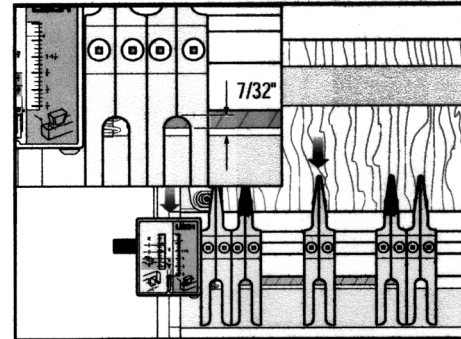


20 Shelf Notches
Clean the marks off the support bracket. Return the finger assembly to the HB tail mode.

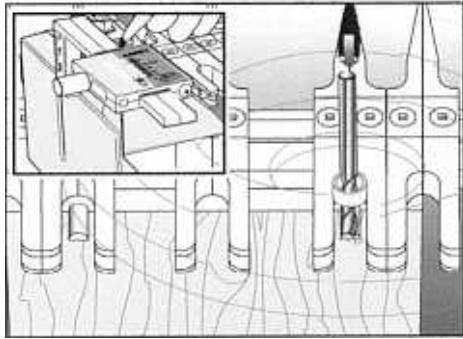


21 Place right hand end of shelves in left side of jig, bottom side out, front edge "F" to side stop.

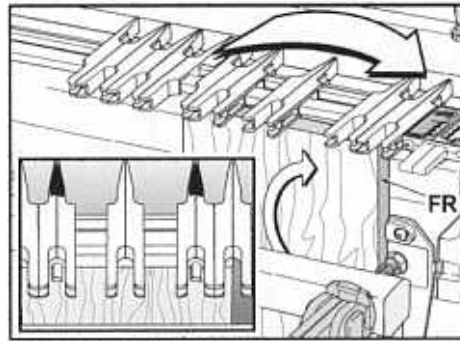
Note: If the shelf front is to be set back from the side panels front edge, this is the time to insert a spacer between the shelf and side stop, equivalent to the set-back ①.



22 Adjust the finger assembly out toward you until the two crotches used for the shelf holes are about $7/32$ " (5mm) into the (bottom) face of the shelf. Note, you have probably run out of scale readings in this finger position, so parallel the assembly up to the board by eye.



23 Set the depth of cut on your straight cutter to suit the length of the shelf support pins and rout a pair of notches. If set as indicated in 22, the notch will only be cutter radius in depth. If necessary, adjust the finger assembly in or out to vary the depth of notch. Rout all the right shelf end notches on the left end of the jig.
 Note: Once set, mark felt pen lines in front and behind the scales as before.



24 Turn the finger assembly end-for-end into the TD tail mode and reset using the new felt pen marks setting. Rout all the left shelf end notches on the right side of the jig.