

HOW TO MAKE REVOLVING BOOK-CASES.

In No. 1, Fig. 183, is an illustration of a completed revolving book-case of the ordinary type. It stands 3 or 4 feet high, and is about 20 inches square. A plan of the base on which the book-case revolves is shown on No. 2. This is made of two pieces of wood $2\frac{1}{2}$ inches wide and $1\frac{1}{2}$ inches thick. These are joined together by halving, and have rounded ends. Four castors are fixed at the base, one near each corner. The top is made of $1\frac{1}{2}$ inch boards doweled together, and the edge moulded and a rebate cut on the under side. The top may also be made of a $\frac{1}{2}$ -inch board with a $1\frac{1}{2}$ -inch moulding fitted round the edge, and another $\frac{1}{2}$ -inch board fastened below, thus saving material and effecting lightness. No. 3 is a section of the book-case showing the details of construction of the top and bottom and the method of attaching the revolving part to the base, A being the top, B F and B F two of the laths which keep the books in position, and H the fixed base (shown in No. 2). The base of the revolving part is made of $1\frac{1}{2}$ -inch boards, C, which have a rebate cut round the lower edge to receive the 1-inch plinth, D D, which is mitred at the corners and fastened into the rebate. The lower edge of the plinth is rebated and a thin board, E, fixed into it.

No. 4 is a perspective view of the frame to which the shelves are fastened. It is made of four boards of equal

width and thickness joined by grooves and overlapping so that a square tube is formed. These boards must be of such a width that, when fastened in their places, the

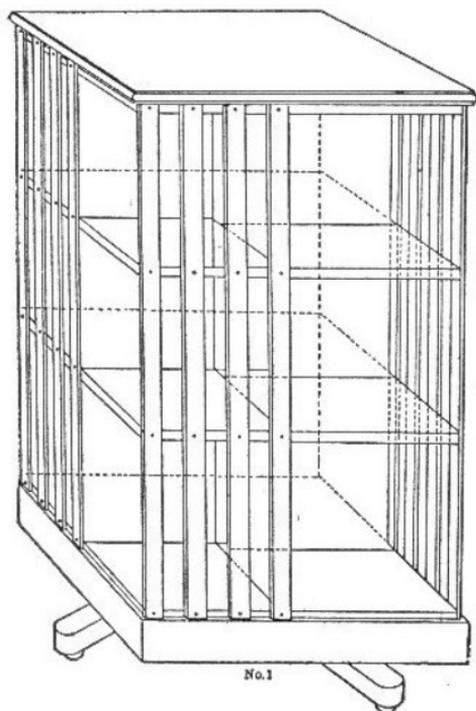


Figure 183

width of the frame is the same as that of the base, C (No. 3). The middle part of the frame should be $1\frac{1}{2}$ inch longer than the rest, and fit into the center of C. Another way of fastening the shelves, which requires less material, is to make a square tube, and attach the shelves to this. Strips of wood 2 or 3 inches wide are fastened along the top and bottom of each shelf in the

position in which the boards (No. 4) would come. These strips keep the books in position at one end of each row, and the laths (B F and B F, No. 3) at the other end.

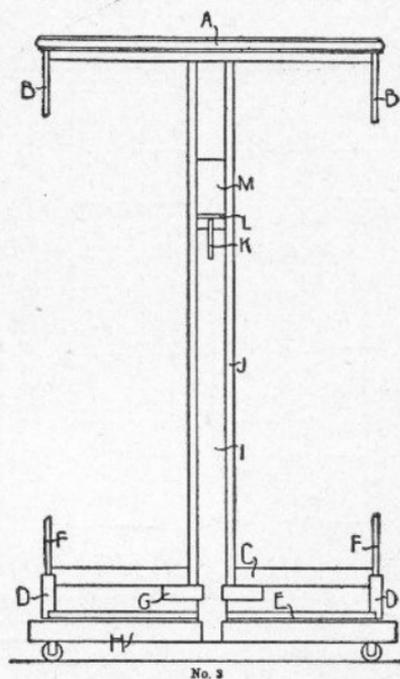
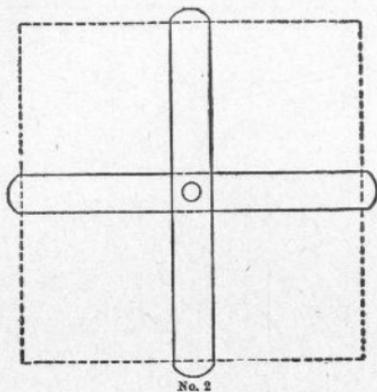


Fig. 183

The method of pivoting the revolving part is shown in No. 3. A circular pillar, I, is turned to fit the interior of the square tube, and the lower end is turned down to form a pivot which fits the hole in the fixed base, H; a little above the pivot a groove is cut in the pillar, forming a neck which works in a hole cut in a piece of 1-inch board, G, which is attached to the

under side of C. This piece of wood is sawn in half, the two halves placed in position on the pillar, and then glued together again. The pillar extends to within about 1 foot of the top of the tube. A steel spindle, K, with a pointed top is screwed into the upper end, and



Revolving Book-case

Fig. 183

this spindle pivots in the under side of a metal plate, L, which is attached to a block of wood, M. The latter should exactly fit the tube, and is attached to it by screws.

The revolving apparatus can also be made by fastening two or more castors or wheels to the lower side of the base. These castors roll over a metal plate fastened to the upper side of the fixed base. The latter is attached to the revolving part by a spindle, which passes through the frame and the base, and is secured by nuts.

When the top and bottom has been attached to the tube, and the shelves are in their places, the laths B F and B F (No. 3) are attached to the shelves, and also

