

(No Model.)

M. S. DRAKE.  
HANGING BOOK SHELVES.

No. 275,027.

Patented Apr. 3, 1883.

Fig. 1.

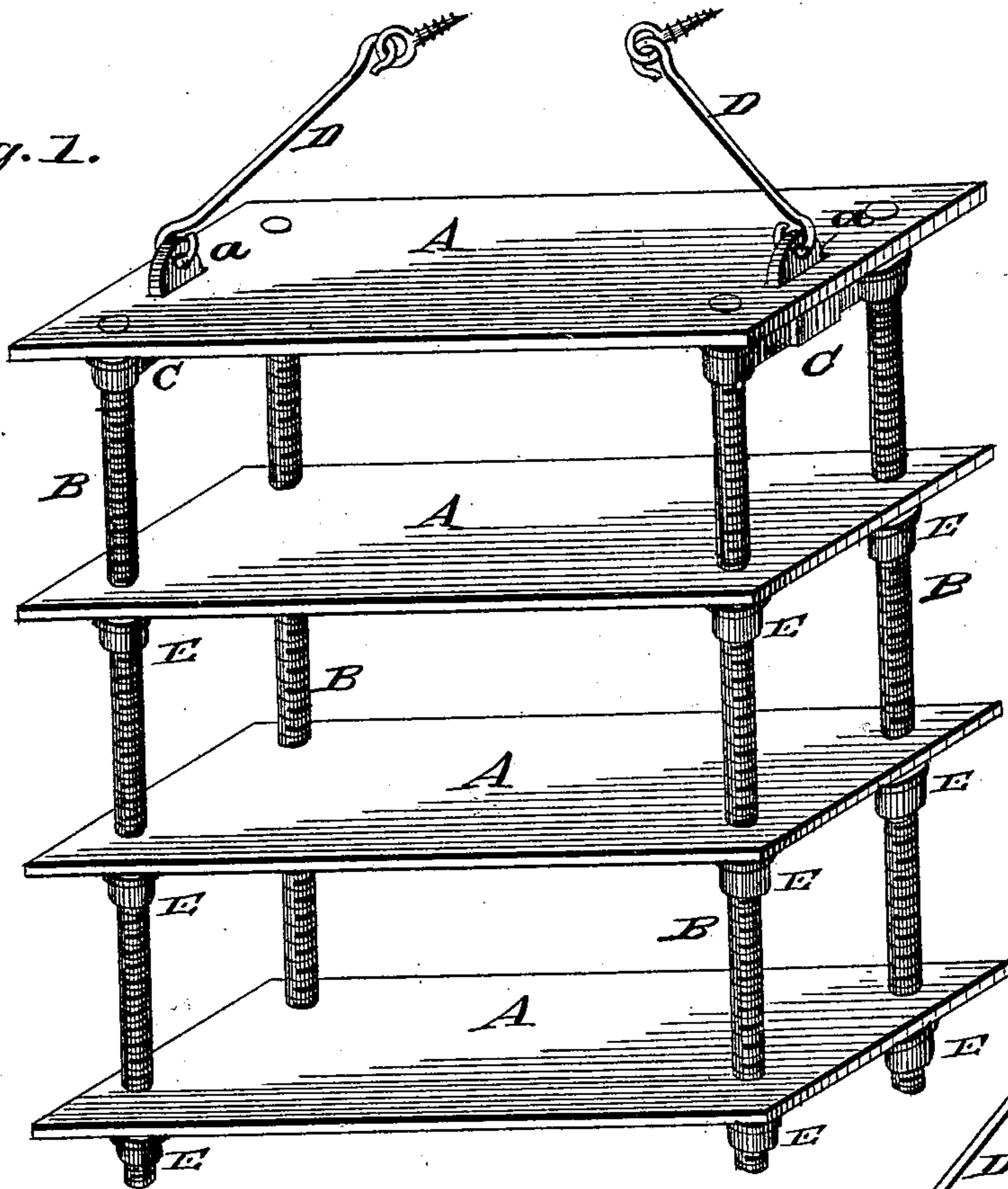


Fig. 2.

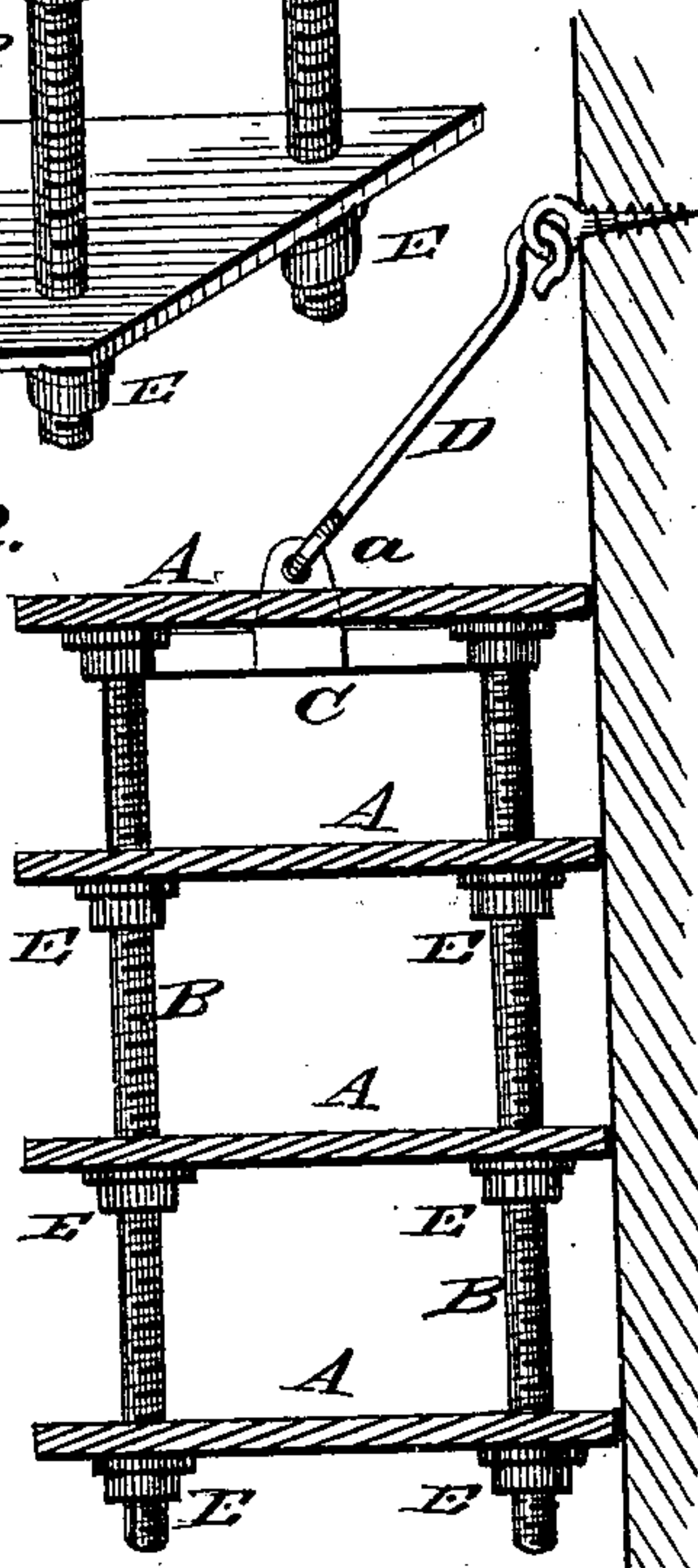
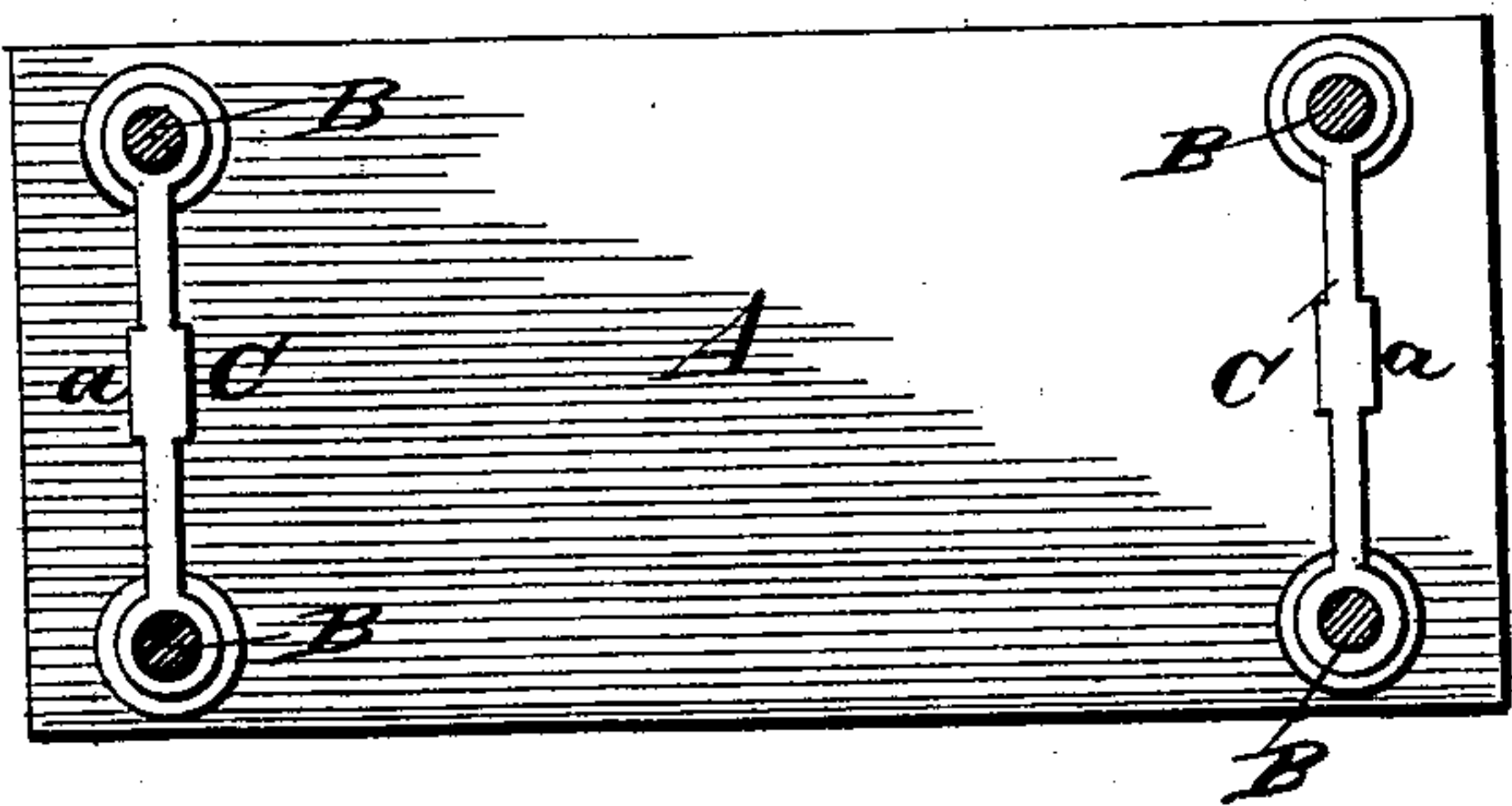


Fig. 3.



Witnesses:  
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# UNITED STATES PATENT OFFICE.

MAHLON S. DRAKE, OF NEWARK, NEW JERSEY, ASSIGNOR TO JOSEPH J. WALTON, OF SAME PLACE.

## HANGING BOOK-SHELVES.

SPECIFICATION forming part of Letters Patent No. 275,027, dated April 3, 1883.

Application filed October 16, 1882. (No model.)

*To all whom it may concern:*

Be it known that I, MAHLON S. DRAKE, of Newark, in the county of Essex and State of New Jersey, have invented certain new and useful Improvements in Hanging Shelves; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form part of this specification, in which—

Figure 1 is a perspective view. Fig. 2 is a central vertical section. Fig. 3 is a bottom plan view of the upper shelf.

This invention relates to special means for vertically adjusting the shelves of cases for holding books and for other purposes; and the nature of my invention consists in the combination of screw-threaded posts or standards and adjustable supporting-nuts for the purpose of supporting the shelves at any desired distance apart; and, also, in novel means for suspending the shelves, as will be fully understood from the following description, when taken in connection with the annexed drawings.

The letters A A designate a number of shelves which are designed for supporting books or any other articles desired, and B B are four screw-threaded posts which pass freely through the corners of the shelves, so that the latter can be readily raised or lowered. The top shelf is supported upon end transverse bars, C C, into or through the ends of which the posts are screwed, as shown in the drawings. At the middle of the length of each cross-bar C is an eye-piece, *a*, which passes through the top shelf, and has hooked to it a suspension-rod, D, having an eye on its free end. The suspension-rods D D have hooks on their free ends for attachment to screw-eyes fixed into a wall, and it will be seen that these rods can be adjusted toward or from each other at different angles, according to the distance apart of the said screw-eyes. As above stated, the posts B are screw-threaded, and on the posts flanged nuts E are applied,

having threads of considerable pitch, so that they can be moved up and down quickly. The flanged nuts are preferably of cast metal, although they may be made of hard wood. Each corner of every shelf below the topmost shelf has a nut, E, beneath it. These nuts afford supports for the shelves and allow the shelves to be adjusted up and down on the posts and supported by the nuts at whatever distance apart it may be desired to adjust them.

Instead of the eye-pieces *a a*, or in addition to these eye-pieces, eye-nuts may be screwed on the upper ends of the rods B, which would serve as clamps for the top shelf, and also as means for attaching suspension-cords to the posts.

It will be seen that the several parts composing the improved case can be detached from each other and closely packed for transportation or storage.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. A series of adjustable shelves, A, in combination with screw-threaded posts B and the adjustable supporting-nuts E for the shelves, substantially as described.

2. The combination of adjustable shelves A, the screw-threaded posts B, the supporting-nuts E for the shelves, the top stationary shelf, and the transverse supporting-bars C therefor, substantially as described.

3. The combination of adjustable shelves, screw-threaded posts, adjusting supporting-nuts for the shelves, the top stationary shelf, the transverse supporting-bars therefor, the eye-pieces on these bars, and the suspension-rods hooked into the eye-pieces, all substantially as and for the purpose set forth.

In testimony that I claim the foregoing as my own I affix my signature in presence of two witnesses.

MAHLON S. DRAKE.

Witnesses:

JOSEPH J. WALLEN,  
SOLOMON SMITH.