

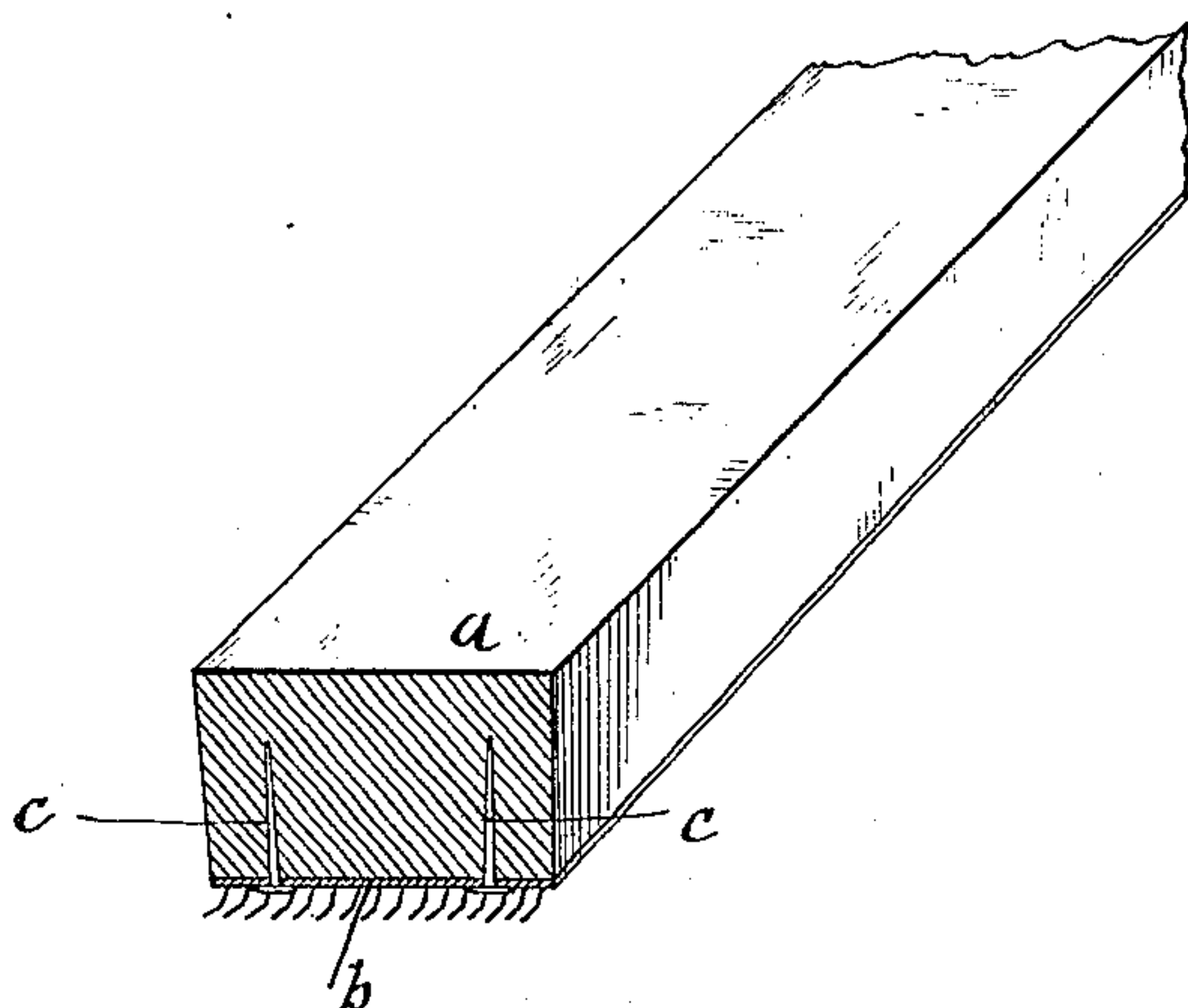
(No Model.)

W. E. WHITEHEAD.

TOP FLAT OF CARDING MACHINES.

No. 258,620.

Patented May 30, 1882.



WITNESSES

Wm A. Shunk
Jos. S. Latimer

INVENTOR

William E. Whitehead
By *his Attorney*
Marshall Bailey

UNITED STATES PATENT OFFICE.

WILLIAM E. WHITEHEAD, OF LOWELL, MASSACHUSETTS, ASSIGNOR TO THE
WHITEHEAD & ATHERTON MACHINE COMPANY, OF SAME PLACE.

TOP-FLAT OF CARDING-MACHINES.

SPECIFICATION forming part of Letters Patent No. 258,620, dated May 30, 1882.

Application filed March 22, 1882. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM E. WHITEHEAD, of Lowell, Massachusetts, have invented certain new and useful Improvements in Top-Flats of Carding-Machines, of which the following is a specification.

My invention has reference to the top-flats of carding-machines. These flats have, so far as I am informed, hitherto been made of wood. Wooden flats are very liable to warp and get out of shape, no matter how dry or well seasoned the wood may be. Varying atmospheric conditions and changes in the temperature of the room where the machine may be used will sooner or later affect the wood and cause a distortion of the flat. When it is considered that a top-flat must be set so accurately and nicely with respect to the carding-cylinder that the difference of the thickness of a sheet of paper in the adjustment makes a success or failure of the carding, it will be perceived that the slightest warping, springing, or distortion of the flat must be disastrous to good carding. A further objection to the wooden top-flat is that, owing to the shrinking, or, rather, what may be termed the "contraction and expansion," of the wood under varying atmospheric conditions, the tacks usually employed to fasten the card-clothing to the flat are apt to work loose, and thus permit the disarrangement of the clothing.

It is my object to remove these objections; and this object I find can be realized by making the top-flat of fibrous pulp—such, for instance, as that from which pasteboard or leather-board is made—compressed and molded into the required shape. Such a flat, provided with the usual card-clothing, is represented in the accompanying drawing in perspective.

In the drawing, *a* represents the flat; *b*, the card-clothing, and *c* the tacks which secure the latter to the flat. It can be made easily and inexpensively. It possesses strength and durability, and is entirely free from the tendency to warp and shrink which is so detrimental to the usefulness of the wooden flat. When molded and dried it is solid and holds firmly and tightly the tacks by which the card-clothing is fastened to it.

What I claim as of my invention is—

A molded fibrous pulp top-flat for carding-machines, substantially as hereinbefore set forth.

In testimony whereof I have hereunto set my hand this 2d day of March, 1882.

WILLIAM E. WHITEHEAD.

Witnesses:

A. T. ATHERTON,
E. E. RIPLEY.