

H. GROSS.

Improvement in Sash-Balances.

No. 132,572.

Fig. 1.

Patented Oct. 29, 1872.

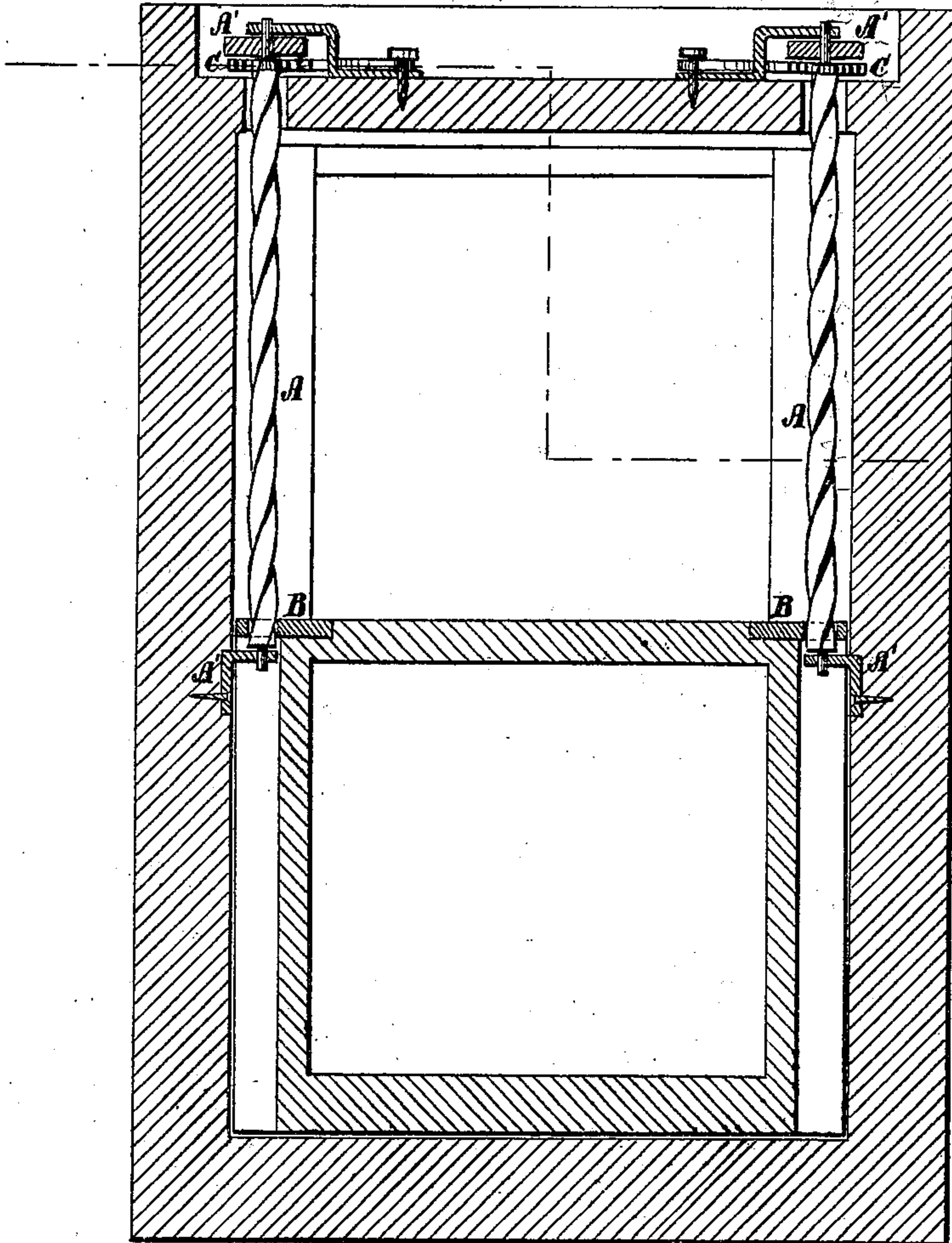
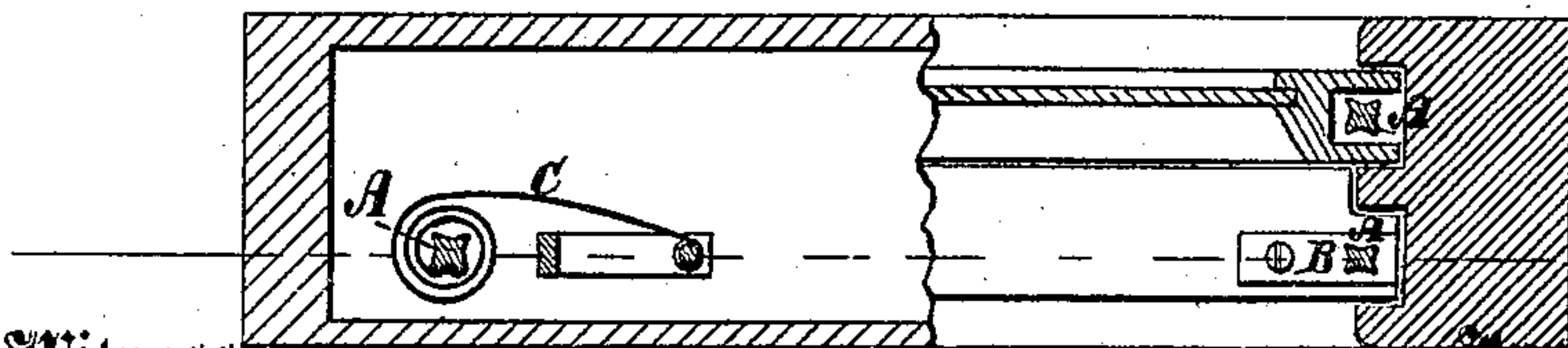


Fig. 2.



Witnesses:

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HERMAN GROSS, OF HOBOKEN, NEW JERSEY.

IMPROVEMENT IN SASH-BALANCES.

Specification forming part of Letters Patent No. **132,572**, dated October 29, 1872.

To all whom it may concern:

Be it known that I, HERMAN GROSS, of Hoboken, in the county of Hudson and State of New Jersey, have invented a new and Improved Sash-Balance, of which the following is a specification:

The invention consists in a screw passing through a nut at the meeting rail and spring at one end, all arranged on the inside of window-frame, as hereinafter fully described and pointed out in the claim.

Figure 1 represents my improved sash-balance in sectional elevation. Fig. 2 is a partial top view of Fig. 1 and partly a horizontal section.

Similar letters of reference indicate corresponding parts.

A is a long revolving screw, arranged parallel with the line of movement of the sashes, in suitable bearings A' at the ends, in the window-frame, with a nut, B, on the sash; or the screw may be mounted on the sash and the nut on the frame. C is a coiled spring, attached at one end to the screw and at the other to some fixed support, and so adjusted that its tension tends to turn the screw in the direction to raise the sash with just sufficient power to balance or hold the sash wherever it may

be, so that the latter can be moved up or down with but a slight application of force, the same as when balanced by a cord or weight or other balancing contrivance.

The screw may be located in the middle of the window, with one end stepped in a bar extending from the window-frame across the window and fastened to said frame, using one screw for each sash; or it may be placed at the side in a recess in the window-frame, as shown in the drawing, in which case one screw will answer for light sashes; but two may be used, one at each side, as represented in the drawing, if preferred, and will preferably be required for heavy sashes. The pitch of the screw may be varied to suit the circumstances of the case; but generally a sharp pitch will be preferred.

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

The screw A passing through the nut B at meeting-rail of the sashes and spring C, at one end thereof, all working on the inside of window-frame, as and for the purpose described.

Witnesses: HERMAN GROSS.

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