

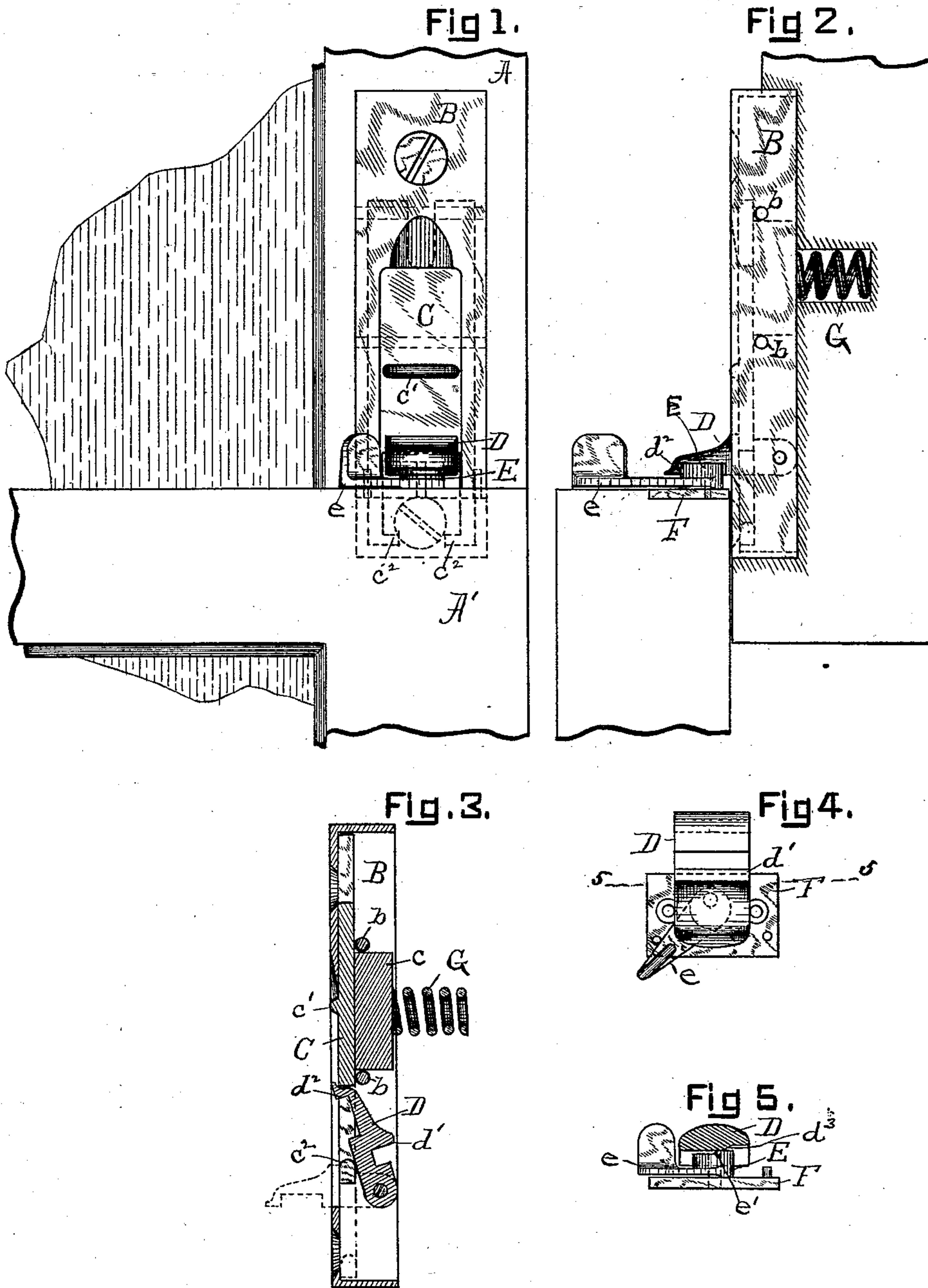
(No Model.)

H. D. JAMES.

FASTENER FOR THE MEETING RAILS OF SASHES.

No. 424,064.

Patented Mar. 25, 1890.



WITNESSES.

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FASTENER FOR THE MEETING-RAILS OF SASHES.

SPECIFICATION forming part of Letters Patent No. 424,064, dated March 25, 1890.

Application filed December 30, 1889. Serial No. 335,421. (No model.)

To all whom it may concern:

Be it known that I, HEMAN D. JANES, a citizen of the United States, residing at Cleveland, in the county of Cuyahoga and State of Ohio, have invented certain new and useful Improvements in Sash-Fasteners, of which the following is such a full, clear, and exact description as will enable others skilled in the art to which it appertains to practice the same.

In the drawings, which represent the best embodiment of my invention now known to me, Figure 1 is a front elevation of said invention and a portion of the sash-frames to which it is attached. Fig. 2 is a side elevation of the same. Fig. 3 is a vertical sectional view of that part of the sash-fastener which is to be attached to the upper sash. Fig. 4 is a top plan view of the part of the device which is to be attached to the lower sash and the pivoted locking-lever, hereinafter described. Fig. 5 is a vertical sectional view of line 5 5 of Fig. 4.

My invention relates to that class of devices which are employed to fasten together the upper and lower sashes of windows. In most of the sash-fasteners now in use the chief purpose seems to be to draw the window-sashes together to prevent rattling and to prevent air from entering the room between them. Few of them offer any protection as a lock, because they may either be readily forced open by burglars' tools or picked by a skillful man operating from the outside of the window.

The primary object of my invention is to provide a sash-fastener which shall serve as a lock which may neither be picked from the outside nor easily forced open. In addition to this primary feature it is my object to provide means whereby the two sashes may be drawn closely together, and it is also my object to provide a device which is simple and inexpensive in its construction and neat in its appearance.

To this end my invention consists in the construction, combination, and arrangement of the parts herein described and shown, as definitely pointed out in the claims.

Referring by letter to the drawings, A represents the upper and A' the lower sash of a window.

I will now proceed to describe in detail the particular embodiment of my invention which the drawings show, calling attention to the fact that I do not desire nor intend to limit my invention to these details further than is definitely expressed in the claims.

B represents a housing to which are attached those parts of the fastener which are to be carried by the upper sash. The front wall of the housing is provided with an opening, through which the locking-lever moves, as hereinafter described. This housing is secured by screws or other suitable means to one of the side rails of the upper sash, which may be mortised, so that the housing may set therein and permit the sashes to pass when unlocked.

A locking-lever D is pivoted by means of a horizontal pivot to the housing at a point where, when the sashes are closed, it will be in a substantially horizontal position when its end is resting upon the top rail of the lower sash. Upon the upper side of this lever D is formed a shoulder *d'*, behind which a keeper, attached to the housing, engages, and thereby prevents the raising of the locking-lever. This keeper in the form shown is a plate C, inclosed within the housing between its front wall and the pins *b b*, and it is slidable vertically in a position where it will engage behind the shoulder *d'* at the lowest point of its movement. It is not intended that the invention shall be limited to the form shown either of the keeper or the housing, except in the claims, where their form is specified as material. When the sashes are closed and the lever D is in its horizontal position and the keeper is in place behind the shoulder *d'*, neither sash can be moved without first breaking some of the movable parts above mentioned, and the form and arrangement of the parts are such that they may be made of any necessary strength to prevent this.

The other parts of the device are in the nature of improvements upon and additions to so much of the device shown as has been heretofore explained.

In order that the same movement which lowers the locking-lever to its horizontal position may seat the keeper behind the shoulder *d'*, the upper side of said locking-lever is

beveled, substantially as shown, and when the plate C is moved downward by means of the lugs c' it presses on the beveled back of said lever and forces it to swing on its pivot to the horizontal position, and immediately thereafter the plate C passes behind the shoulder d' .

In order that the upward movement of the plate C may lift the lever D, the plate is slotted and said lever passes through the slot, while lugs c^2 c^2 on said plate engage beneath said lever. Lifting the plate C, therefore, not only makes it possible that the lever be lifted, but actually lifts it to the position shown in Fig. 3, which permits the two sashes to be moved. If it is desired that the lever D be held in the raised position, the parts may be so balanced that they will remain in that position until the plate is moved downward by some power from without; or the plate, and consequently the lever, may be held up by the friction produced by the pressure of a spring G, arranged, as shown, to press against a block c between it and the plate C or otherwise.

In order that the two sashes may be drawn together when locked, mechanism adapted to engage with the lever D is attached to the top rail of the lower sash, and in the form shown the lever D is provided with a shoulder d^2 on its lower side, and a cam E, pivoted to a plate F, which is attached to the upper rail of the lower sash, engages with said shoulder. An arm e , rigid with said cam, affords means whereby it can be oscillated to the left, as shown, to draw the sashes together and to the right to release them. If it is desired that the movement of this cam shall tend to force the upper sash up and the lower sash down to the full extent of their movement, the lower side of the lever D and the upper side of the cam are provided with beveled shoulders d^3 e' , which engage with each other when the cam-arm e is moved toward the left, and thus produce this result.

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

1. The combination of a housing, a lever pivoted thereto by a substantially horizontal pivot and having its upper side beveled and having a shoulder on said upper side, with a

vertically-movable keeper having means for engaging both the upper and under sides of said lever, whereby said lever is raised and lowered by the movement of said keeper, substantially as and for the purpose specified.

2. The combination of a housing having an opening in its front face, a lever pivoted to said housing by a substantially horizontal pivot, a shoulder upon the upper side of said lever, and a plate adapted to slide up and down within said housing and to engage behind said shoulder, substantially as and for the purpose specified.

3. The combination of a housing, a lever pivoted thereto and provided with a shoulder, and a slotted plate having a vertical movement within said housing and having lugs adapted to engage beneath said lever, substantially as and for the purpose specified.

4. The combination of a housing, a lever having a shoulder upon its upper side pivotally connected by a substantially horizontal pivot with said housing, a movable keeper adapted to engage behind said shoulder, and mechanism secured to the lower sash and engaging with said lever, whereby the meeting-rails of the two sashes may be drawn together, substantially as and for the purpose specified.

5. The combination of a housing, a lever pivotally connected therewith by a substantially horizontal pivot, a shoulder upon the upper side of said lever, a movable keeper adapted to engage behind said shoulder, a shoulder upon the under side of said lever, and a cam pivoted to the lower sash and adapted to engage with the last-named shoulder, substantially as and for the purpose specified.

6. The combination of a housing, a lever pivotally connected with the upper sash by a substantially horizontal pivot, a shoulder upon the upper side of said lever, a keeper adapted to engage behind said shoulder, an oscillation piece pivoted to the lower sash, and beveled shoulders on the upper side of said piece and on the lower side of said lever, substantially as and for the purpose specified.

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Witnesses:

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