(No Model.)

J. H. JOHNSON.

SASH FASTENER.

No. 576,582. Patented Feb. 9, 1897.

Fig. 3.

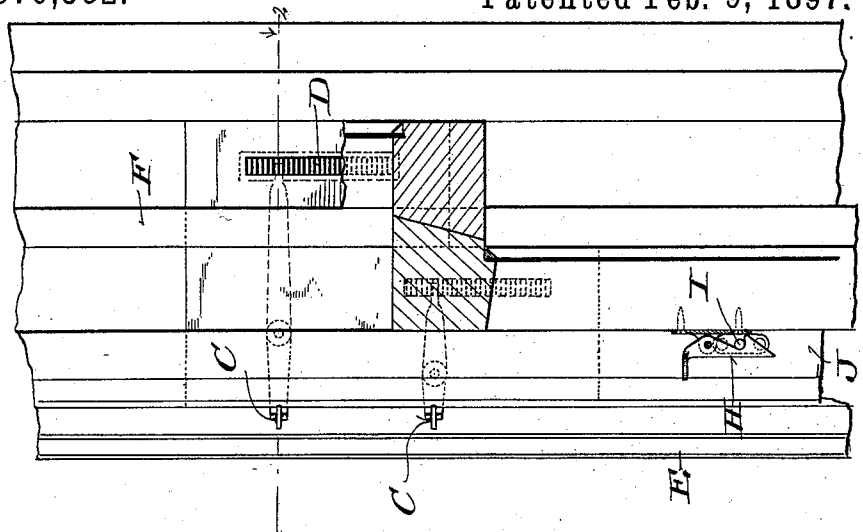


Fig. 2.

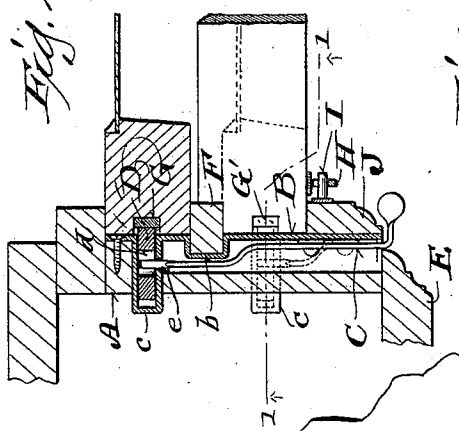


Fig. 4.

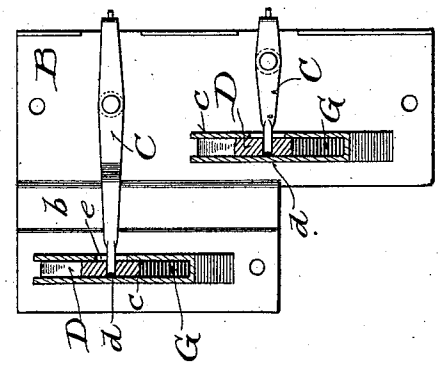
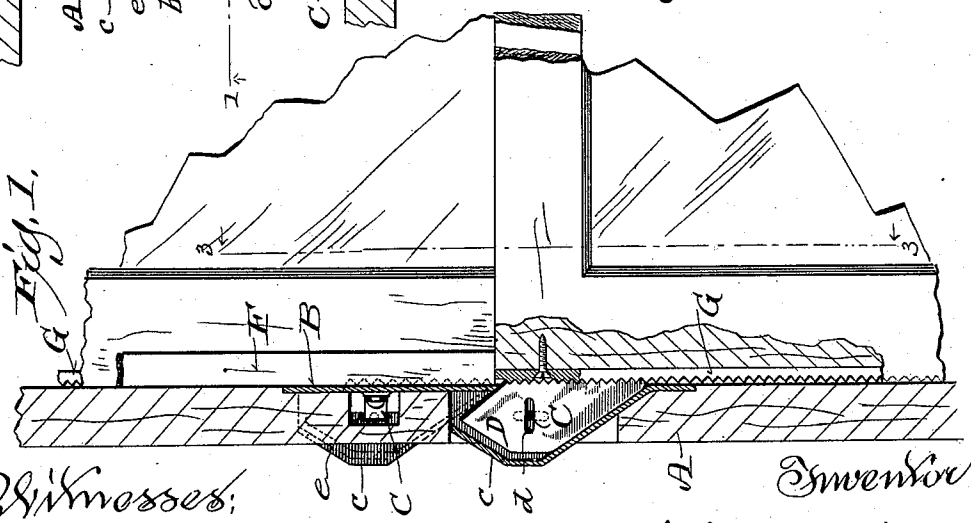


Fig. 1.



Witnesses:
Geo W Young
N. E. Oliphant

Inventor:
Johannes H. Johnson
By H. G. Underwood
Attorney

UNITED STATES PATENT OFFICE.

JOHANNES H. JOHNSON, OF NORTH CAPE, WISCONSIN.

SASH-FASTENER.

SPECIFICATION forming part of Letters Patent No. 576,582, dated February 9, 1897.

Application filed August 14, 1896. Serial No. 602,707. (No model.)

To all whom it may concern:

Be it known that I, JOHANNES H. JOHNSON, a citizen of the United States, and a resident of North Cape, in the county of Racine and State of Wisconsin, have invented certain new and useful Improvements in Sash-Fasteners; and I do hereby declare that the following is a full, clear, and exact description thereof.

My invention has for its object to provide a simple economical means for the automatic retention of window-sash in vertically-adjusted position; and it consists in certain peculiarities of construction and combination of parts hereinafter set forth with reference to the accompanying drawings and subsequently claimed.

In the drawings, Figure 1 represents a view on the plane indicated by line 1 1 in Fig. 2 to illustrate my improvements in connection with a window frame and sash; Fig. 2, a horizontal section on the plane indicated by line 2 2 in Fig. 3; Fig. 3, a front elevation, partly in section, on the plane indicated by line 3 3 in Fig. 1; and Fig. 4, a detail rear elevation of a portion of the locking mechanism, partly in section.

Referring by letter to the drawings, A represents a suitably mortised and slotted window-casing stile, and B a plate made fast to the mortised portion of said stile. The plate is herein shown provided with a parting-rail recess *b* and rearwardly-extending housings *c*, the latter being engaged with the frame-stile slots, but it is practical to omit the parting-rail recess, and it is also practical to utilize a separate plate in connection with each housing, but each lever C, coöperating with a detent D, movable in one or the other of the housings, has its end for the application of power projected beyond the plate edge that comes inside of the window, adjacent to the casing E of the same, this plate edge being preferably flanged and recessed, as herein shown, each recess affording play for a lever engaged therewith. It is preferable, as also herein shown, to fulcrum each lever on that portion of the single plate inside of the parting-rail F of the window, but it is practical to otherwise fulcrum the levers without departure from the scope of my invention.

Each housing *c* is in register with a plate-slot and has the form of an irregular pentagon, and the detent D within the housing has also the form of an irregular pentagon, similar in contour to the one aforesaid, except that its upper end is triangular instead of being on a horizontal plane. The lower face of the pentagonal detent D is parallel to the outer face of its triangular upper end, and these faces have their play along the lower and upper boundaries of the slot in plate A that registers with the housing containing said detent.

Each detent is provided with a horizontal slot *d*, engaged by the inner end of one of the levers C, working in a vertical slot *e* in the housing containing said detent, and the latter has a serrated outer vertical face for the engagement of a rack G, made fast in an edge of a sash-stile by screws or other suitable means. The position of the slot *d* in each detent is such that the latter overbalances its lever C, and therefore always drops by its own gravity into engagement with the corresponding rack, this being the normal position of the respective parts. Therefore it requires a depression of said lever in order to disengage said detent from said rack.

From the foregoing it will be understood that each detent will yield to lift of the sash with which it coöperates, but that it is impossible to pull down said sash without retracting the detent by means of the lever C, in connection therewith. This is a matter of especial advantage for the reason that various means may be employed to lock the lower sash when the same is full down, and the upper sash may be lowered a limited distance for the purpose of ventilation and be automatically held against attempt at further lowering by any one outside the window.

As one means for locking the lower sash when full down the same is shown provided with a pivotal latch H, that automatically engages a pin I, extending laterally from an inside stop J of the window-frame.

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

1. The combination of a slotted plate for rigid connection with a mortised and slotted portion of a window-frame stile, a housing fast on the plate but extended rearward therefrom to enter a slot of said stile, a detent hav-

ing play in the housing and plate-slot, a sash-stile rack engageable with the detent, and a retracting-lever for said detent fulcrumed on the plate.

2. The combination of a single plate for rigid connection with a mortised and slotted portion of a window-frame stile, a plurality of housings fast on the plate but extended rearward therefrom to enter slots in the stile, a detent having play in each housing, a sash-stile rack engageable with each detent, and retractive levers for the detents fulcrumed on the plate.

In testimony that I claim the foregoing I have hereunto set my hand, at North Cape, in the county of Racine and State of Wisconsin, in the presence of two witnesses.

JOHANNES H. JOHNSON.

Witnesses:
H. F. JOHNSON,
CARRIE E. ADLAND.