L. E. THOMAS.

SASH FASTENER.

APPLICATION FILED SEPT. 17, 1912.

1,068,546. Patented July 29, 1913.

Fig. 1.

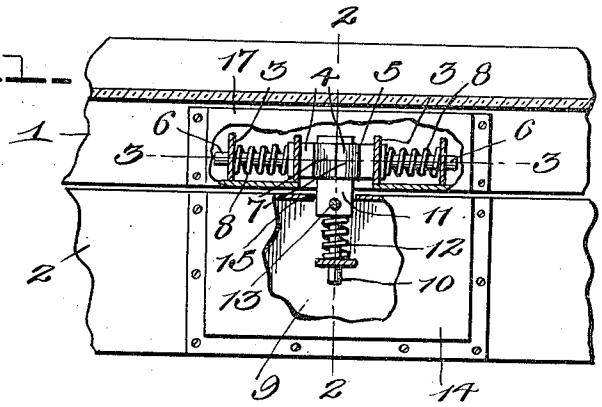


Fig. 2.

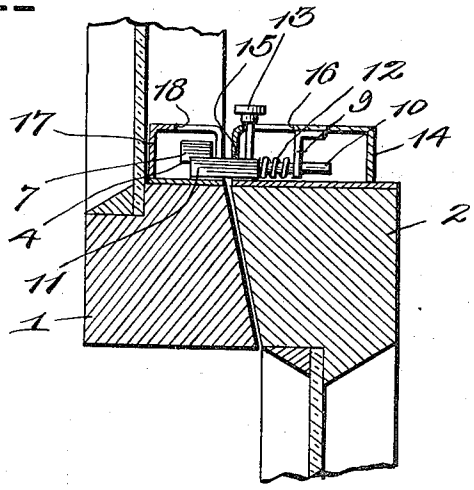
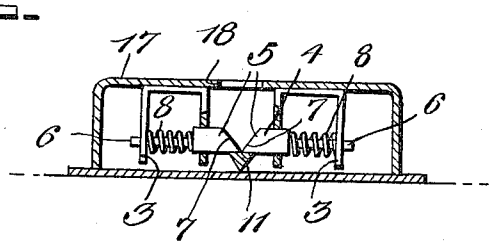


Fig. 3.



Inventor

L. E. Thomas,

Witnesses

Chas. L. Griestauer.

A. D. Hind

By Watson E. Coleman.

Attorney

COLUMBIA PLANOGRAPH CO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

LLOYD E. THOMAS, OF ELTON, LOUISIANA.

SASH-FASTENER.

1,068,546. Specification of Letters Patent. Patented July 29, 1913.

Application filed September 17, 1912. Serial No. 720,891.

To all whom it may concern:

Be it known that I, LLOYD E. THOMAS, a citizen of the United States, residing at Elton, in the parish of Calcasieu and State of Louisiana, have invented certain new and useful Improvements in Sash-Fasteners, of which the following is a specification, reference being had to the accompanying drawings.

My invention relates to new and useful improvements in sash fasteners and more particularly to a fastener for the meeting rails of sashes and my object is to provide a device of this character which will be effectively automatically locked when the sashes are brought to their closed positions.

A further object of the invention resides in providing a device wherein a latch is provided on the meeting rail of the upper sash and a locking bolt provided on the meeting rail of the lower sash, said bolt being adapted to be interlocked with the two latches when the sashes are brought to their closed positions.

A still further object of the invention resides in providing a device which is extremely simple and durable in construction, inexpensive to manufacture and one which will be very efficient and useful in operation.

With these and other objects in view, the invention consists in the novel features of construction, combination and arrangement of parts as will be hereinafter referred to and more particularly pointed out in the specification and claim.

In the accompanying drawing forming a part of this application, Figure 1 is a top plan view partly in section showing my improved device applied to use. Fig. 2 is a vertical transverse section through the sashes showing my improved device effectively applied; and Fig. 3 is a vertical longitudinal section as seen on line 3—3, Fig. 1.

In describing my invention, I shall refer to the drawing in which similar reference characters designate corresponding parts throughout the several views and in which—

1 and 2 indicate respectively the meeting rails of an upper and lower sash and slidably mounted between the pairs of guide keepers 3 on the meeting rail 1, are a pair of latch members 4. These latch members which are slidable longitudinally of the rail consist of the heads 5 and the shanks 6, said heads having their inner opposed faces beveled outwardly from their lower to their upper edges, as shown at 7 and encircling the shanks 6 between the heads 5 and the outer of the pairs of guide keepers 3, are the coil springs 8 which normally tend to force said latch members toward one another. As stated, the outer ends of the heads of said latches are beveled inwardly and as said heads are caused to abut one another, a substantially triangular space will be formed between the heads, the purpose of which will be hereinafter and more particularly set forth.

Slidably mounted between a keeper 9 on the meeting rail 2 and extending transversely of the latter is a locking bolt 10, the outer end of which is provided with a triangularly-shaped head 11. Encircled about the bolt 10 between the guide keeper 9 and the head 11, is an additional coil spring 12 which normally forces said bolt outwardly and in order to draw the same against the tension of the spring, a thumb or finger piece 13 is provided on said head. It must be here stated that the position of the locking bolt on the meeting rail 2 is such as to allow the head thereof to be readily entered in the triangular space formed between the latches 4 when said rails are disposed to their closed positions and it must also be stated that the substantial triangular space between said latches has the apex thereof disposed downwardly as is also the apex of the head 11. Also mounted on the meeting rail 2 is a casing or covering 14 which is provided with an opening 15 in the outer side wall thereof through which the head of the locking bolt is disposed. The upper face of this casing 14 is also provided with a slot 16 through which the finger piece 13 is disposed whereby it will be seen that the locking bolt is entirely inclosed, and may be readily operated from within the structure. An additional casing or covering 17 is secured to the meeting rail 1 to inclose the latches and their adjunctive parts, said latter casing or covering being provided with a slot or channel-way 18 extending from the front wall thereof, whereby the projecting head 11 of the locking bolt 10 may be readily entered therethrough to be engaged by the latches 4 when the sashes are brought to their closed positions.

In practice, assuming that the sashes are already in their closed positions, should it be desired to raise the lower sash or lower the upper sash, the operator first grasps the

finger piece 13 and draws the same inwardly, which releases the locking bolt 10 from its engagement with the latches 4. The sashes may then be raised or lowered without interfering with the operation of the fastener. When it is desired to draw the sashes to their closed positions and lock the same, it is only necessary to raise the upper sash and lower the lower sash, the latter action permitting the triangular head 11 of the locking bolt 10 to be forced between the latches 4 and automatically locked into engagement therewith.

It will be noted that the arms of the keepers 3 terminate short of the bottom of the casing whereby clearance spaces are produced which permit of the casing 17 as well as the keepers yielding downward during severe application of the locking bolt as in sudden shoving down of the lower sash, whereby fracture of the casing and keepers as well as displacement of the latch members is prevented.

Having thus described this invention, what I claim is:—

A sash lock comprising a casing having a slot in the front upper corner extending along the top and front side of the casing, a pair of inverted U-shaped keepers secured to the top of said casing depending therewithin on opposite sides of said slot the arms of said keepers terminating a short distance above the bottom of said casing to form clearance spaces, a pair of oppositely slidable spring pressed latch members carried by the arms of said keepers, and a manually operatable spring pressed bolt adapted to enter said slot from above and contact with said latch members to displace the same outwardly during its passage into locked position below said members, the clearance spaces between the terminals of said keeper arms and the bottom of said casing permitting yielding of said casing top and said keepers to a certain extent downward during severe application of said bolt whereby fracture of the parts of the sash lock is prevented.

In testimony whereof I hereunto affix my signature in the presence of two witnesses.

LLOYD E. THOMAS.

Witnesses:
W. E. THOMAS,
H. MCVEY.

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."