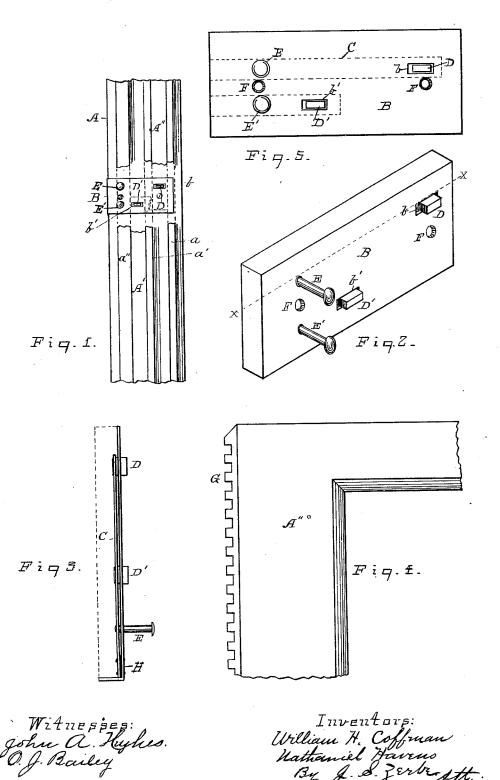
## $\begin{array}{c} \textbf{W. H. COFFMAN \& N. HAVENS.} \\ \textbf{Sash-Fastener.} \end{array}$

No. 206,664.

Patented Aug. 6, 1878.



## UNITED STATES PATENT OFFICE.

WILLIAM H. COFFMAN AND NATHANIEL HAVENS, OF CARROLL, OHIO.

## IMPROVEMENT IN SASH-FASTENERS.

Specification forming part of Letters Patent No. 206,664, dated August 6, 1878; application filed May 17, 1878.

To all whom it may concern:

Be it known that we, WILLIAM H. COFF-MAN and NATHANIEL HAVENS, of Carroll, in the county of Fairfield and State of Ohio, have invented a new and useful Improvement in Sash-Fasteners, which improvement is fully set forth in the following specification and accompanying drawing, in which—

Figure 1 is a view of the inside face of the window-frame; Fig. 2, perspective enlarged view of the fastening device; Fig. 3, sectional view of Fig. 2 through the line x; Fig. 4, portion of window-sash, showing ratchet-bar on the side of the same. Fig. 5 is a plan view, showing arrangement of the springs.

The object of our invention is to provide a convenient and simple sash-fastener, so constructed that it can be adapted for fastening both upper and lower sash, and arranged in such a manner that when adjusted on the frame for one sash both sashes can be operated thereby, thus saving the cost of a fastener for each sash. It has also the additional advantage that the fastener can be manufactured of any kind of metal, and is not liable

to get out of order.

It consists of a lock-piece or case, B, which is mortised, preferably, in the left windowframe, so that the face thereof will be even with the surface of the frame A. The said case or lock is placed midway between the bottom and top of the frame at a point where the upper part of one sash and the lower part of the other sash meet. The case B has two steel spring-plates, C C', fastened at one end to the inner side of its face-piece, as shown at H, the opposite ends thereof being provided each with a cog or catch, D D', cog D being fastened to the end of spring C, and cog D' to the end of the short spring C', below spring C. The cogs D D' pass through apertures or slots b b' in case B, and pass beyond the surface of said case a slight distance.

At a suitable distance from the rigid point H a knob, E, passes through the case B, and is attached to spring C, and knob E' is attached to the short spring C' in a similar way.

Fig. 4 represents a portion of the sash A". showing the attachment of the ratchet-bar G to one of its edges. The teeth in this bar are made to correspond with the cog D. In like manner the ratchets in the lower sash correspond with the cog D'.

In adjusting and operating this device, we first place the lock in the frame, as shown in Fig. 1. The stops a a' a'' are then placed in the frame. The lock or case will be so constructed that the cog D will operate in the groove which receives the upper sash, A", and the cog D' in the groove in which the lower sash, A', slides. The ratchet-bar G is made as long as the sash.

We will now suppose that both sashes are closed, as in Fig. 1. If it is desired to raise the lower sash, press on the knob E'. The free end of the spring will be depressed, and the cog D' released from ratchet-bar G. In the same way, by depressing the knob E, the cog D will become disengaged from the ratchet, and the sash can be lowered.

It will be seen that there is no pressure or weight of the sash on the spring, which is the great difficulty with many of the other sashfasteners.

The lock can be fastened to the frame rigidly by means of screws through the holes F F.

Having thus described our invention, what we claim as new, and desire to secure by Letters Patent, is-

The combination of the plate B, recessed into the side of the window-casing, the two springs C C', attached to the said plate and provided with stop-lugs D D', and push-pins E E', with the sash-rack G, all arranged as described, for holding both sashes in any desired position, substantially as described.

In testimony we have hereunto set our hands this 4th day of May, 1878, in the presence of witnesses.

WILLIAM H. COFFMAN. NATHANIEL HAVENS.

Witnesses:

JOHN AZBELL, JOHN DETWILER.