W. D. YOUNG
Ventilator.

No. 208,554. Patented Oct. 1, 1878.

Fig. 1.

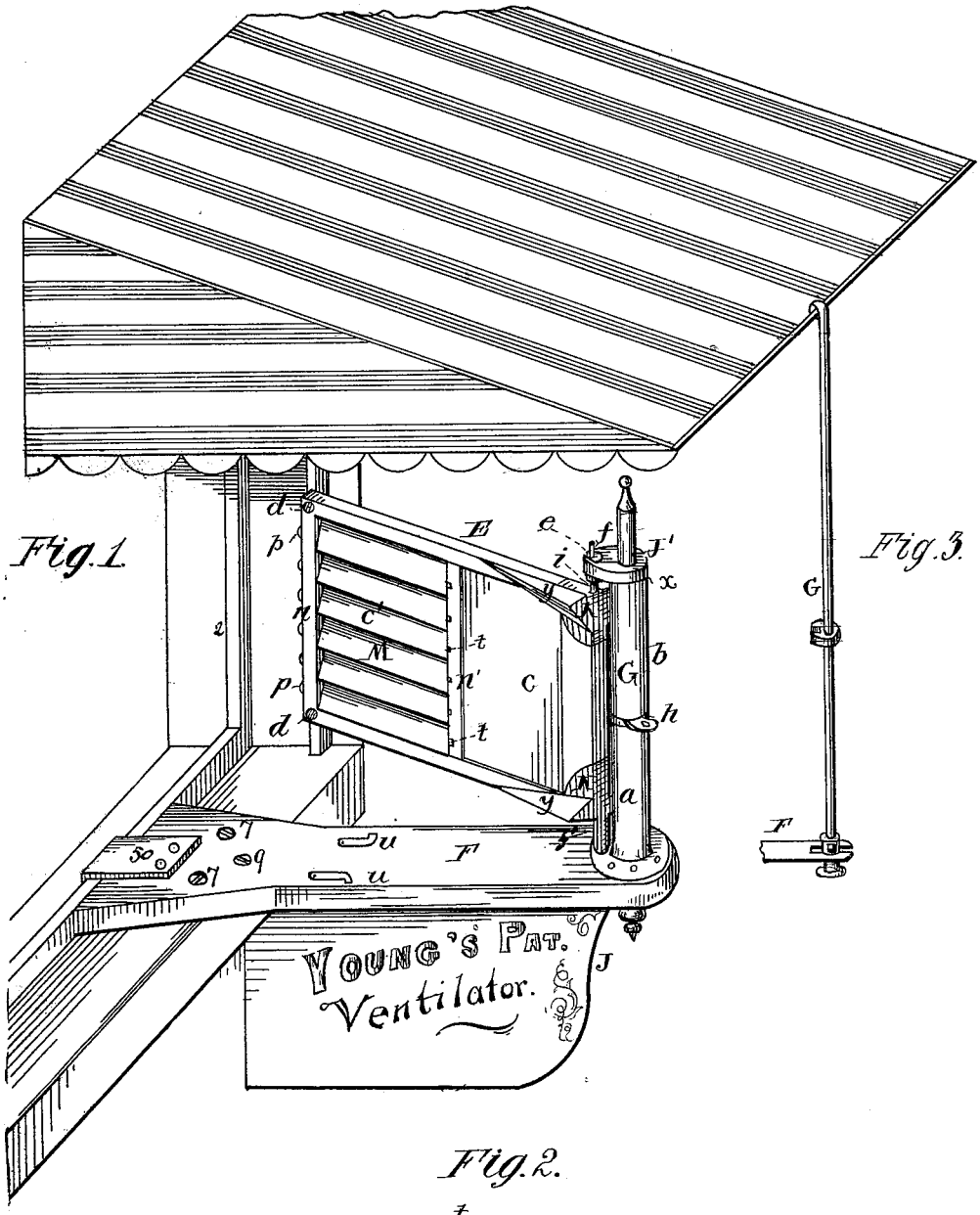
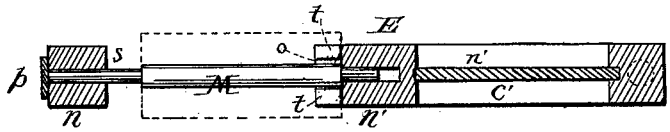


Fig. 3.

Fig. 2.



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WILLIAM D. YOUNG, OF PHILADELPHIA, PENNSYLVANIA.

IMPROVEMENT IN VENTILATORS.

Specification forming part of Letters Patent No. **208,554**, dated October 1, 1878; application filed September 6, 1878.

To all whom it may concern:

Be it known that I, WILLIAM D. YOUNG, of Philadelphia, Philadelphia county, Pennsylvania, have invented Improvements in Ventilators, of which the following is a specification:

My invention is a ventilating attachment constructed and adapted to a window, as fully described hereinafter, so as to facilitate the ventilation of the apartment, as well as serve other useful purposes.

In the accompanying drawings, which form part of the specification, Figure 1 is a perspective view of my invention applied to a window. Fig. 2 is a section of the ventilating-blind, and Fig. 3 a view showing a modification.

The attachment consists, essentially, of an arm, F, a post, G, and a swinging frame or plate, E. The arm F is provided with suitable attachments for securing it to or upon the sill of a window. Various devices may be employed for this purpose; but I have illustrated in the drawing a flanged blade, 5, which clamps the bead 2 of the window-frame, and adjusting and retaining screws 7 and 9, by which the angle of the arm may be regulated. In order to support the arm in its horizontal position, it is preferable to use a bracket, J, which may be in the form of a plate, as shown, so as to serve the purposes of a sign-board.

The post G, which is at the outer end of the arm F, may be secured permanently, or may be adjustable in any suitable manner on the arm, and may consist of a single bar of metal, or of a metal base, *a*, supporting a wooden shaft, *b*. The upper end of the post is reduced in diameter to form a shoulder, *x*, for a metal block or bearing, J′, having a recess, *e*, to receive the journal *f*, constituting the upper pivot of the frame E, the lower pivot, *f′*, turning in a bearing in the arm F, or in the foot of the post. The opening or bearing in the block J′ communicates with a slot in the front of the block, of such width as to permit the passage of a reduced portion, *i*, of the journal *f* when the frame E is elevated, thus permitting the frame to be readily attached and removed.

In order to facilitate the construction, each journal may be attached to or form part of a cast-metal corner-piece, K, into which the pieces of the frames are set, increased strength being also thus imparted. The frame E may be divided into two divisions, *c c′*, the former being closed, and constituting a sign-board, and the latter being provided with slats or blinds. The action of the wind will carry the frame or plate E in the direction in which the wind is blowing until it is arrested by striking the side of the window-frame, when its inclined position will serve to deflect the current of air inward into the room, thus aiding in ventilating the apartment. Any suitable devices may be employed for securing the plate in its desired positions. Cushions *d* may be secured to the sides of the plate to prevent it from wounding the bead of the window. The post G may be provided with a staple, *h*, to which a cord may be attached and extended to the window-frame, or a spring may be attached to the post, so as to strike the blind when it assumes the desired angle, and there hold it. An ordinary Venetian blind may be placed within the division *c′*, or may occupy the whole of the frame E. I prefer, however, to use a series of slats, M, as shown in the drawing.

The end piece, *n*, of the frame, Fig. 2, has openings for the journals *s* of the slats M, and the cross-piece *n′* has similar openings, and is provided with a vertical groove, *o*, and with cross-grooves *t*. Each slat is equal in length to the space between the uprights, and the journals are of such length that the slat may be slid outward, and then turned either to a horizontal or upright position. To secure the slat when upright, it is slid back into the groove *o*, and to retain it when horizontal it is carried into the cross-groove *t*. After adjustment it is secured by turning down a pendent plate, *p*, which prevents the outward movement of the journal *s*. By this means any one or more of the slats may be adjusted.

If desired, the upper trunnion or journal of the frame may be locked to the block J by a pin or projection on the journal, adapted to a slot in the block, somewhat in the manner of a bayonet-joint. I do not limit myself, however, to any special mode of connection.

In some instances the frame may be supported by a post, G, pendent from the frame of an awning, and supported by a lighter arm,

F, as shown in Fig. 3; or the journals of the frame may turn in bearings in the window frame and sash.

In order to collect the air, flanges may be arranged at *y*, as shown, and catches *u* may be secured to the arm *f*, for holding the usual shutters when bowed.

I claim—

1. A ventilating device consisting of an arm, F, adapted for attachment at the window-sill, the post G, supported centrally by said arm opposite the window, and swinging frame or plate E, supported by the arm and post, substantially as specified.

2. The frame E, provided with journals *f f'*, adapted to bearings in the arm F, and post G, arranged centrally opposite the window, as set forth.

3. The block J', adjustable upon the post G, in combination with the frame E and its journal, as set forth.

4. The frame E, having flanges at *y*, for the purpose set forth.

5. The combination, with the frame E, of the pieces *n n'*, having slots *o t*, and bearings for the journals *s* of the adjustable slats M, as set forth.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

WILLIAM D. YOUNG.

Witnesses:

CHARLES W. SPARHAWK,

JOHN SPARHAWK, Jr.