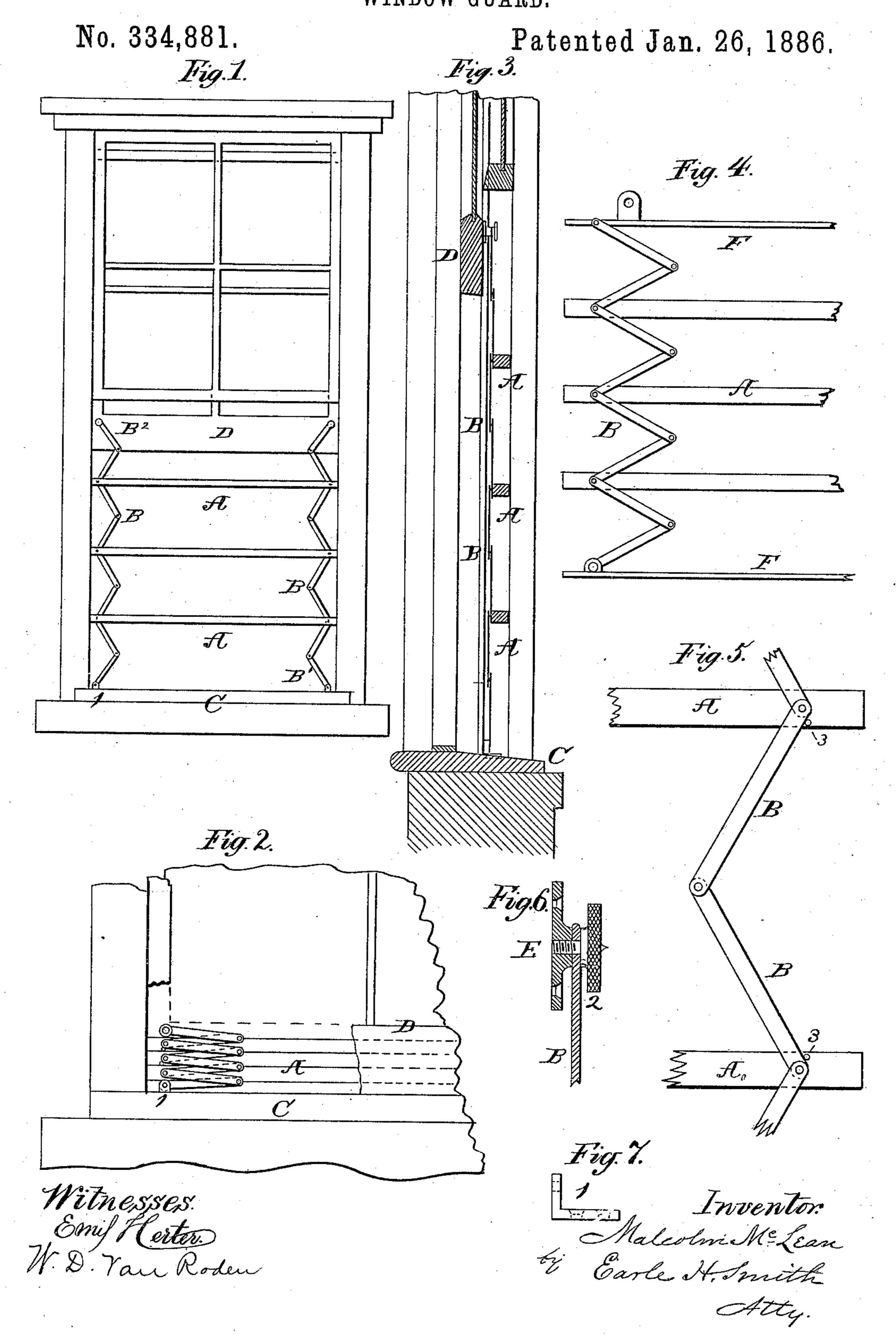
M. McLEAN.
WINDOW GUARD.



INITED STATES PATENT OFFICE.

MALCOLM McLEAN, OF NEW YORK, N. Y.

WINDOW-GUARD.

SPECIFICATION forming part of Letters Patent No. 334,881, dated January 26, 1886.

Application filed October 6, 1885. Serial No. 179,133. (No model.)

To all whom it may concern:

Be it known that I, MALCOLM MCLEAN, of the city, county, and State of New York, have invented certain new and useful Improvements in Window-Guards, whereof the following is

a specification.

My improvements relate to window-guards having a number of bars which obstruct the window-opening when the sash is raised; and to the invention comprises an apparatus provided with means of attachment to the window-sill and to the sash, and constructed in such a manner as to be automatically brought into action and expanded by the opening of the window, and so that the closing of the window collapses the apparatus into the small space occupied by the lower bar or stile of the window-sash, whereby it is prevented from obscuring the vision and may be concealed from view.

In the annexed drawings I have shown an apparatus which illustrates my invention, wherein Figure 1 represents the window-guard as it appears in use, seen from outside the window. Fig. 2 is a fragmentary view wherein a part of the sash is broken away, showing the guard when collapsed, and as seen from the inside. Fig. 3 is a cross-section of the guard as in use in a window. Fig. 4 is a modified form of the guard. Figs. 5, 6, and 7 refer to details.

A A are a number of bars whose width is slightly less than the thickness of the sash, and arranged to move freely in the groove for 35 the upper sash. There are usually three or four of these bars, each of such thickness that when placed one on the other they together will not quite equal the width of the lower stile or sash-bar, D. They are connected with 40 each other by flexible means, by which is meant some device that will permit the bars to close together in a very small space. The means pairs of light metal strips, B, jointed to each 15 other and pivoted to the bars, so as to articulate freely. They are preferably attached to the sides of the bars, in order to permit the bars. to lie in close contact when the apparatus is contracted to its smallest compass. Two of 50 the connections, B', are pivoted to a part of

C—and other connections, B², are pivoted to a bar of the sash—in this case the lower stile, D, of the lower sash.

To provide for temporarily detaching the 55 guard from the sash without removing it from the window-sill—as for window-washing, &c.—I employ a suitable fixture, (illustrated by the plate E, Fig. 6,) which is permanently secured to the sash, and has a thread formed 60 therein to receive a thumb-screw, 2, the shank of which serves for the pivot of the parts B'.

As a convenient way of connecting with the sill C, I use bracket-eyes 1. (Seen enlarged

in Fig. 7.)

The apparatus or guard is shown expanded in Fig. 1, when the flexible connection strips B serve as transverse guards. In this condition the knee of each pair of connections is bent, whereby they readily double up when a 70 contractive motion is imparted to the guard. They are prevented from straightening out at the knee by check-pins 3, driven into the bars A, as seen in Fig. 5. When the sash is moved downward more or less, the apparatus is forced 75 to contract with the movement, and when the window is entirely closed collapses completely, the bars A lying directly on each other, as seen in Fig. 2—a position they are permitted to assume by having the connection strips B 80 pivoted to the sides of the bars. Thus disposed, they occupy no more space in height than the width of the ordinary lower sash-bar of a sliding sash, and the apparatus is thus concealed from view when not in use.

From the foregoing description it will be seen that in operation the apparatus or guard is out of sight when not wanted—that is, when the window is closed—and that when the sash is raised and the window opened (more or less) 90 the guard is immediately brought into operation.

shown in the drawings consist of a number of pairs of light metal strips, B, jointed to each other and pivoted to the bars, so as to articulate freely. They are preferably attached to the

sides of the bars, in order to permit the bars to lie in close contact when the apparatus is contracted to its smallest compass. Two of the connections, B', are pivoted to a part of the window-frame—in this instance the sill instead of having the series of bars A to run in the groove of the outer sash, they may be formed and adapted to run on the stop-bead on the the attachment to the sash will be made on the

inside instead of the outside thereof, and in some cases the check-pins 3 may be dispensed with.

In the modification, Fig. 4, the upper and lower attaching-strips, B' and B², are pivoted to upper and lower supplemental bars, F—made of thin metal, for example—and they, instead of the strips B' and B², are connected to the sill and to the sash, respectively. In this modification the eyes 1, Fig. 7, are not required.

I claim as my invention—

1. As a new article of manufacture, a window-guard consisting of one or more horizontal or parallel bars, A, connected at or near their ends to the articulations of two sets of

pivoted arms, B, the latter provided with suitable means for attachment to the window frame and sash, substantially as shown and described, whereby the opening between the sill of the 20 window and lower rail of the sash is guarded when the latter is elevated, and the guard is concealed when the sash is lowered, substantially as hereinbefore set forth.

2. The combination, with the bars A and 25 pivoted arms B, of the check pins or screws 3, substantially as and for the purpose set forth.

MALCOLM McLEAN.

Witnesses:

DONALD McLean, Earle H. Smith.