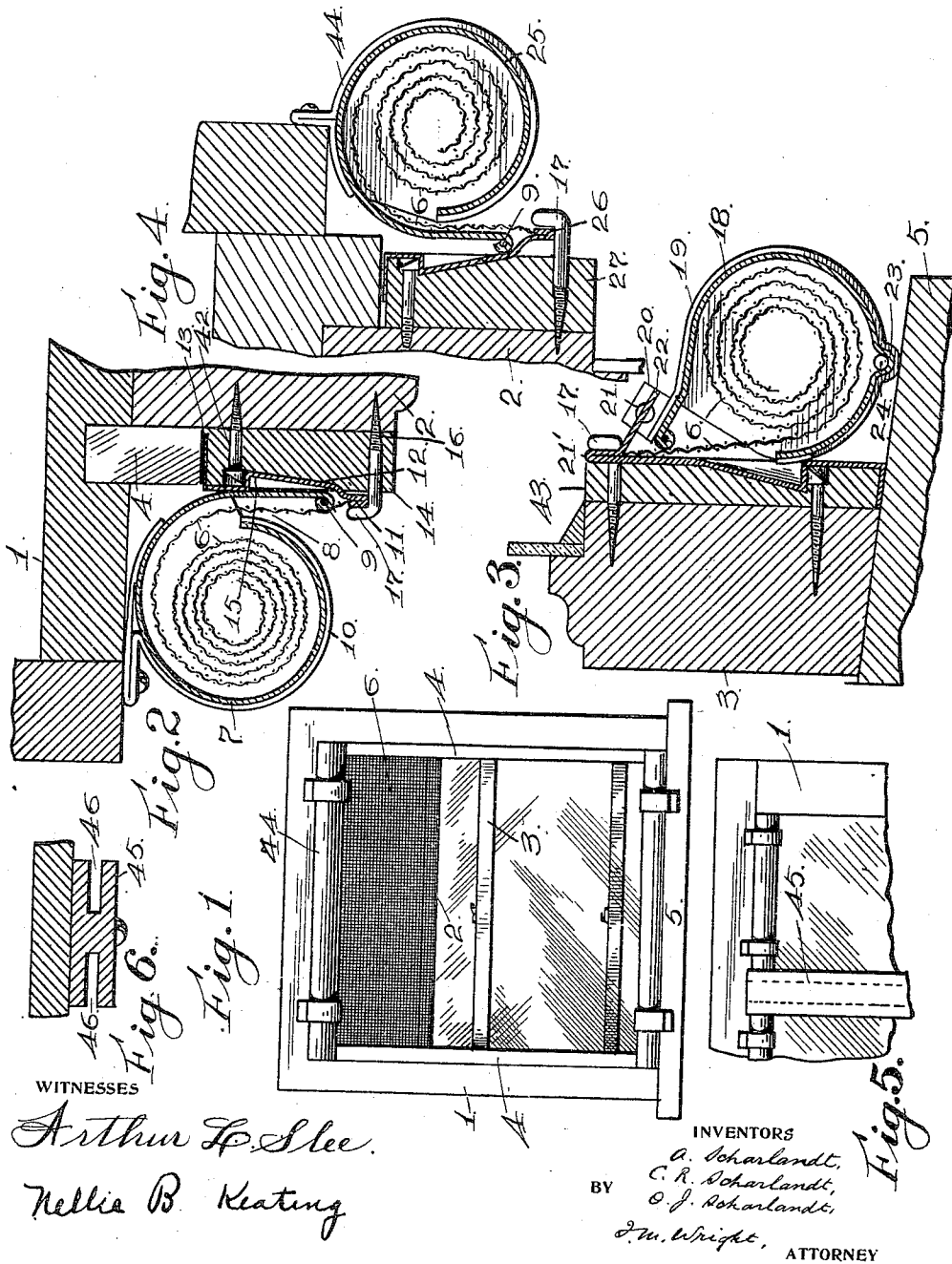


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WINDOW SCREEN.

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964,700.

Patented July 19, 1910.



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ALEXANDER SCHARLANDT, CHARLES R. SCHARLANDT, AND OSCAR J. SCHARLANDT,
OF SAN FRANCISCO, CALIFORNIA.

WINDOW-SCREEN.

964,700.

Specification of Letters Patent.

Patented July 19, 1910.

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To all whom it may concern:

Be it known that we, ALEXANDER SCHARLANDT, CHARLES R. SCHARLANDT, and OSCAR J. SCHARLANDT, citizens of the United States, residing at San Francisco, in the county of San Francisco and State of California, have invented new and useful Improvements in Window-Screens, of which the following is a specification.

The present invention relates to an improved window screen, the object of the invention being to provide a screen for windows which will automatically open and close with the opening and closing of the sashes, thereby saving greatly in the labor of placing the screens in position, and which will be more sightly in appearance than those in use.

In the accompanying drawings, Figure 1 is a front view of a window equipped with our improved screen; Fig. 2 is an enlarged vertical sectional view of the screen for the upper sash; Fig. 3 is a similar view of a screen for the lower sash; Fig. 4 is a view similar to Fig. 2 of a modified form of the invention; Fig. 5 is a broken front view showing the screen as applied to a wide window; Fig. 6 is a sectional view through the guide strip shown in the modification in Fig. 5.

Referring to the drawing, 1 indicates a window frame, 2 an upper sash, 3 a lower sash, 4 a parting bead, and 5 a window sill.

6 indicates the screens, which in all cases are made of woven spring wire, which, after weaving, is given sufficient tension or pressure to have a permanent curvature, so that it acts as its own spring for winding itself up, when released and permitted to do so.

The casing for the spring is in all cases approximately cylindrical in form, but is formed with a longitudinal passage 8 through which can pass the outer edge of the wire screen. The lower edge of the casing is beaded around a wire 9 to strengthen it. In general, the casing will be stationary, at the top or bottom of the window, and the outer end of the screen will be movable with the sash.

In Figs. 1 and 2, which show the arrangement as ordinarily used in a window, the casing 7 of the screen for the outer or upper sash is secured to the top of the window frame, on the inner side of the parting bead,

by means of curved brackets 10, surrounding the casing. The outer edge of the screen is secured within a fold 11 of a plate 12, which is bent over at its upper edge, as shown at 13, and is engaged by a spacing block 14, secured to the inner side of the top part of the outer sash. Into said block is screwed a screw 42 which engages a lip 15 extending outward from the plate. The lower edge of said plate is additionally held close to said block 14 by means of a screw 16 having a finger 17, which engages the lower edge of the plate 12 and is screwed into the block. It results from this construction that, when the outer or upper sash is drawn down, the screen is drawn from its casing to cover the opening which would otherwise be made by the downward movement of said sash.

In Fig. 3, the casing 18 of the screen for the lower sash is secured in position by means of caps 19 at its ends, which caps have upwardly turned flanges or lips 20, which are screwed as shown at 21 to the pulley stiles. The outer edge of the screen is attached in the same manner as before to a plate 21', which plate is attached to a block 43 secured to the lower side of the inner sash frame in the manner already explained for the upper sash. Said plate 21' has, however, an overhanging lip 22, which covers the opening into the casing, and excludes entrance of rain and moisture therefrom. However, should moisture enter, it will flow into a channel 23 formed in the bottom of the casing, and out through openings 24 at the end of said channel.

It is sometimes found that the windows to which the screens are to be attached are too narrow to permit of the screens being inserted between the pulley stiles. In such a case we use the constructions illustrated in Fig. 4. In Fig. 4 the casing 25 is attached by brackets 44 to the outside of the window frame, the edge of the screen being attached to a plate 26 which is bent inwardly and attached, in the same manner as in Fig. 2, to a block 27 which is now secured upon the outer side, (instead of on the inner side, as in Fig. 2) of the upper part of the frame of the upper sash. The lower edge of the plate which carries the edge of the screen is supported in like manner as before by screws 17 screwed into said block 27.

For a very wide window, a central ver-

tical strip 45 (Figs. 5, 6) may be used, having two grooves 46 adapted to receive the adjacent edges of adjacent screens.

We claim:—

- 5 1. In combination, with a rolled spring wire window screen, a casing therefor secured to the window frame, and means for attaching the outer end of the window screen to a sash, comprising a block secured
10 to the sash, and having a recess in its face next to the screen, and a metallic plate formed with a lip entering said recess, and having a marginal portion folded back on
15 itself, the edge of the screen being secured within said fold, substantially as described.
2. In combination with a rolled spring wire window screen, a casing therefor secured to the window frame, and means for attaching the outer end of the window screen

to a sash, comprising a block, a screw securing said block to a sash and having a head, the block having a recess in its outer face adjacent to said head, and a metallic plate having a lip in said recess, abutting against said head, a marginal portion of the plate
25 being folded back on itself, and the outer edge of the screen being secured within said fold, and a screw securing said free edge to the block, substantially as described.

In testimony whereof we have hereunto
30 set our hands in the presence of two subscribing witnesses.

ALEXANDER SCHARLANDT.

CHARLES R. SCHARLANDT.

OSCAR J. SCHARLANDT.

Witnesses:

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