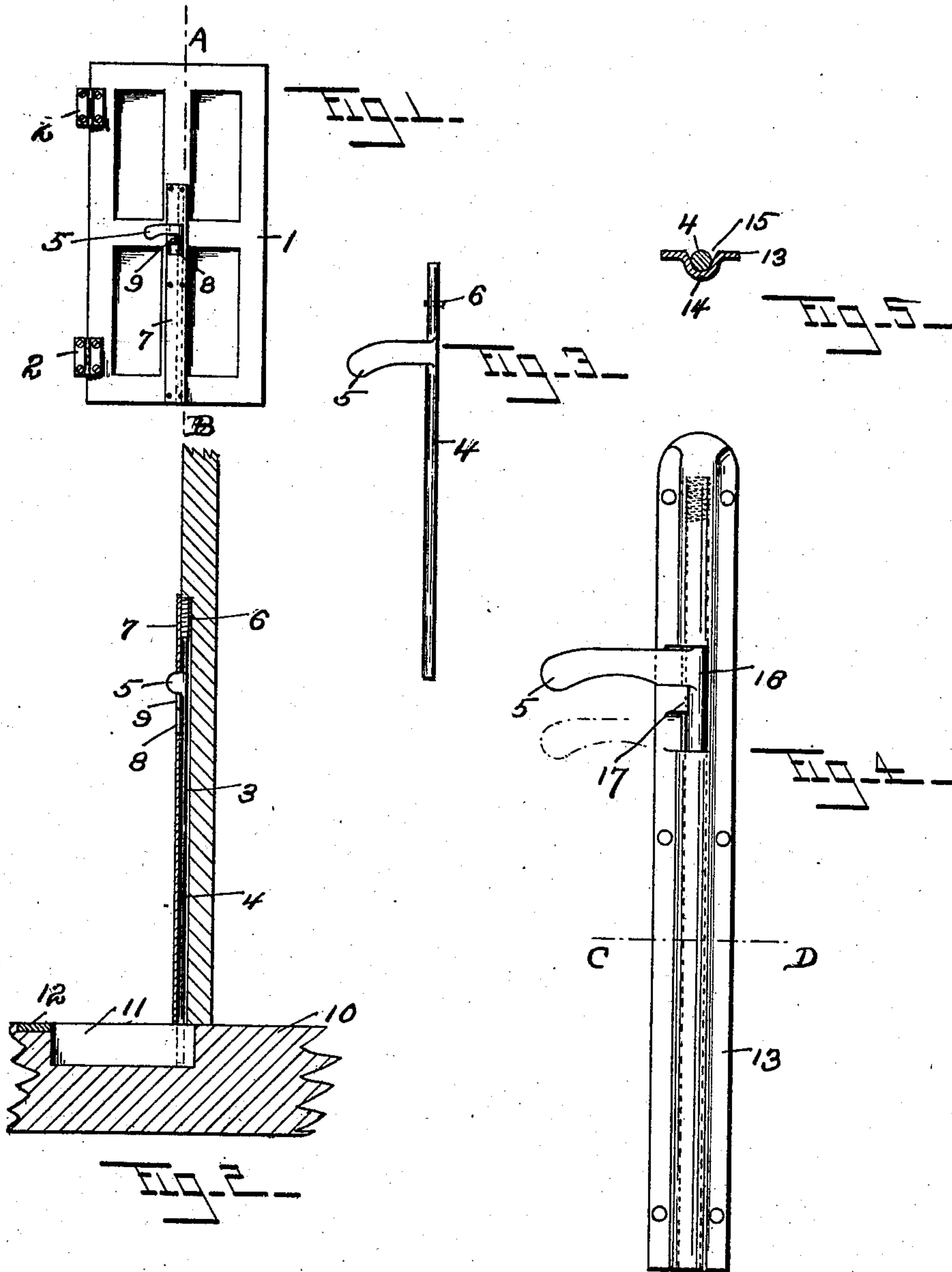


No. 889,453.

PATENTED JUNE 2, 1908.

J. GERSON.
DOOR STOP.

APPLICATION FILED DEC. 26, 1907.



WITNESSES:

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JOSEPH GERSON, OF NEW HAVEN, CONNECTICUT.

DOOR-STOP.

No. 889,453.

Specification of Letters Patent.

Patented June 2, 1908.

Application filed December 26, 1907. Serial No. 408,107.

To all whom it may concern:

Be it known that I, JOSEPH GERSON, a citizen of the United States, residing at New Haven, in the county of New Haven and State of Connecticut, have invented certain new and useful Improvements in Door-Stops, of which the following is a specification, reference being had therein to the accompanying drawings.

My invention relates to new and useful improvements in door stops, and has for its object, among other things, to provide a device economical in its construction, and simple in its operation, that can be applied to a door to limit, when desired, the distance the same can be opened.

To these, and other ends, my invention consists in the door stop having certain details of construction and combinations of parts, as will be hereinafter described and more particularly pointed out in the claims.

Referring to the drawings, in which like numerals of reference designate like parts in the several figures; Figure 1 is a front elevation of a door having my improved device attached thereto; Fig. 2 is an enlarged transverse section thereof upon line A—B of Fig. 1; Fig. 3 an elevation of the bolt in detail; Fig. 4 is a front elevation of a modified form of my invention; and Fig. 5 is a sectional view thereof upon line C—D of Fig. 4.

My invention is designed to be applied to a door and when so applied and the bolt thereof is in one extreme position the door can be moved from its wide open to its closed position, but when the bolt is in its other extreme position the door can be opened but a limited distance.

In the drawings the numeral 1 designates a door which may be of any desired construction and 2 the hinges by which the same is secured to the door frame. Upon the inside of the door, extending from the bottom thereof, is a groove 3 within which lies a bolt 4 having an operating arm 5 integral therewith and projecting laterally therefrom. Surrounding the upper end of this bolt and abutting against the end of the groove 3 is a coil spring 6 which exerts a pressure downwardly on said bolt. Covering said bolt and

groove is a plate 7 having an aperture 8 there-through with a lug 9 upon one side thereof. When the parts are assembled the arm 5 projects through the aperture 8 and is exposed upon the outside of the door, all of the other parts being concealed beneath the plate 7. Within the floor 10 and beneath the bolt 4 a recess 11 is provided having a metal stop plate 12 secured to the inner edge thereof. When the bolt 4 is in its up position the lower end thereof is flush with the underside of the door and the arm rests upon the lug 9. When the parts are in these relative positions the door can be opened and closed at will, but if it is desired to only open the door for a limited distance the arm 5 is grasped between the fingers and moved in a circular path so as to be free from the lug 9, at which time the spring 6 forces the bolt downwardly and the lower end thereof projects into the recess 11, as shown by the broken lines in Fig. 2 and the down position of the arm 5 is shown by broken lines in Fig. 4. While the bolt is in the recess 11 the door can be opened only a distance equal thereto.

In Figs. 4 and 5 I have shown a modified form of my invention, in which the plate 13 is curved at 14 leaving a recess 15 in the back side thereof within which the bolt 4 is movable. This plate has an aperture 16 there-through with a lug 17 projecting into the same to correspond with the aperture 8 and lug 9 of the construction first above described. This modified construction obviates the need of a recess in the door but in all other respects its mode of attachment and operation is the same.

There are minor changes and alterations that can be made within my invention, aside from those herein shown and described, and I would therefore have it understood that I do not limit myself to the exact construction herein shown and described, but claim all that falls fairly within the spirit and scope of my invention.

Having described my invention, what I claim as new and desire to secure by Letters Patent, is:—

The combination with a door having a groove 3 thereon; of a plate 7 of greater

width than said groove secured to said door
so as to cover said groove and having an
aperture 8 therein with a lug 9 upon one side
thereof; a bolt 4 movable about its axis and
5 endwise in said groove and having an arm 5
thereon which projects through said aperture
and in one position of said bolt rests upon
said lug; and a spring 6 lying within said

groove between the end wall thereof and
said bolt.

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

JOSEPH GERSON.

Witnesses:

GEORGE E. HALL,
FLORENCE H. MONK.