No. 759,621. PATENTED MAY 10, 1904.

R. A. LACKEY.

DOOR CHECK.

APPLICATION FILED DEC. 8, 1903.

NO MODEL.

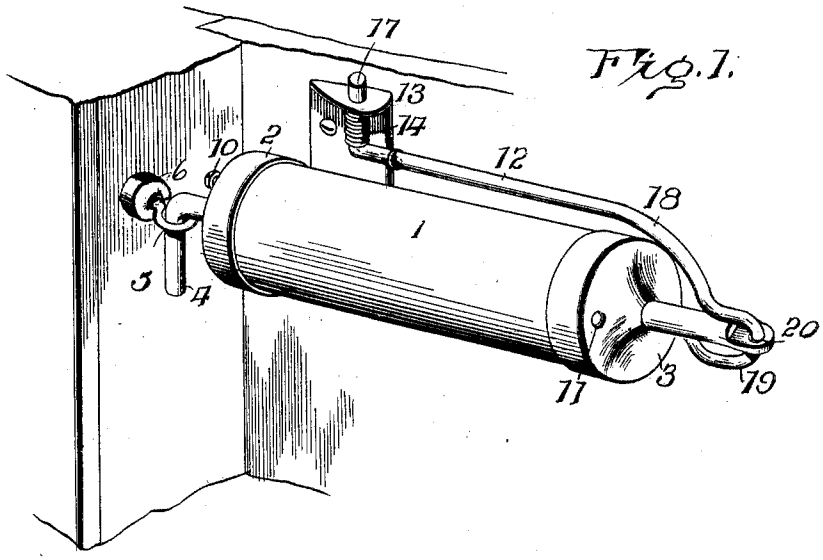


Fig. 1.

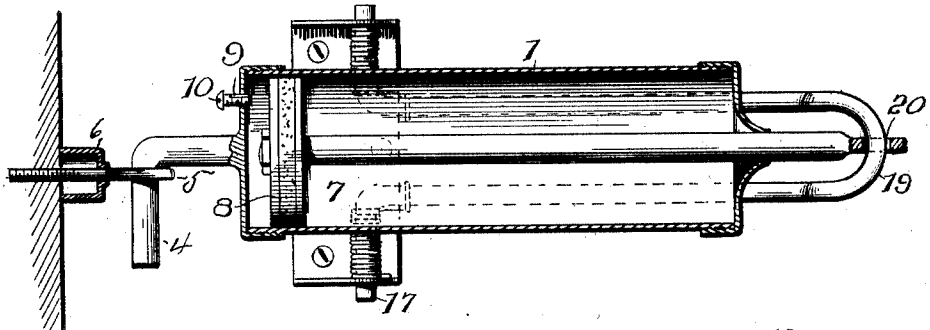


Fig. 2.

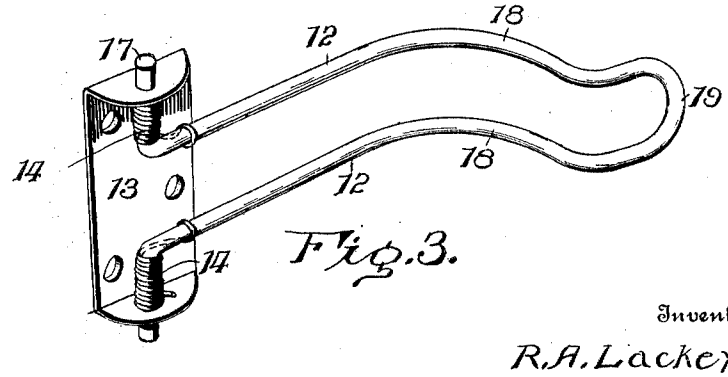


Fig. 3.

Inventor

R. A. Lackey.

Witnesses

Jno. Purcell

A. B. Williams

By Benj. R Catlin Attorney

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

No. 759,621. Patented May 10, 1904.

UNITED STATES PATENT OFFICE.

ROBERT A. LACKEY, OF OAKPARK, ILLINOIS, ASSIGNOR TO C. H. OCUMPAUGH, OF ROCHESTER, NEW YORK.

DOOR-CHECK.

SPECIFICATION forming part of Letters Patent No. 759,621, dated May 10, 1904.

Application filed December 8, 1903. Serial No. 184,363. (No model.)

To all whom it may concern:

Be it known that I, ROBERT A. LACKEY, a resident of Oakpark, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Door-Checks; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use the same.

The invention relates to pneumatic door-checks for self-closing screen and other like doors, and has for its object to produce an economical, efficient, and durable device.

The invention consists of the construction hereinafter described and pointed out.

In the accompanying drawings, Figure 1 is a broken perspective of the improved check applied to a door. Fig. 2 is a longitudinal section of the check connected to a door-casing. Fig. 3 is a perspective of a bracket, link, and connecting-springs.

1 denotes a cylinder having a cap at each end.

2 indicates a cap over one end of the cylinder, and 3 indicates a cap over its other end.

4 denotes a hook fastened to the cylinder at one end, said hook being loosely supported in the screw-eye 5, adapted to be attached to the casing of a door.

6 denotes a bracket or like device used, in connection with the screw-eye, to insure that the eye is at the proper distance from the casing to enable the check to stand at right angles to the casing when the door is opened to its extreme position.

7 denotes a plunger provided at its inner end with a packed or flexible disk 8, normally fitting the cylinder in an air-tight manner, and at its other end movably supported in a hole in the cylinder-cap 3.

9 denotes an air-vent controlled and regulated by a screw 10, the construction being as usual in this class of devices.

11 indicates the air-intake in cylinder-cap 3.

12 denotes a connecting-link pivoted to the bracket 13, which bracket is screwed to the door. It comprises two members, which are bent outwardly around the proximate end of the cylinder and then bent toward the side of the same, as indicated at 18, to permit the link to be held near the cylinder, whereby the link is placed near the side of the cylinder, and power is transmitted through the link in a direction as nearly parallel to the cylinder and piston-stem as practicable. They are also connected by a bend or coupling 19, adapted to engage an eye 20 on the outer end of the plunger-stem.

14 denotes coiled springs wound upon the bent ends 17 of the connecting-link. Said link-springs are at one end thereof attached each to a member of the link and at the other end to the bracket. These are put under tension when the door is opened and keep the cylinder and link in proper relation to the door during all stages of the opening of the latter.

A skilled mechanic can readily see how slight changes can be made in my improvement without departing from the spirit of the invention.

Having described my invention, what I claim is—

1. The combination of a cylinder, the plunger, means for loosely connecting the cylinder to a door-jamb, and a link, one end of said link being pivoted directly to the plunger-stem, exteriorly of the cylinder and its opposite end pivoted to the door, the link constituting the sole movable connection of the outer end of the stem.

2. The combination of the cylinder, the plunger, means for loosely connecting the cylinder to a door-jamb, a link pivotally connected to the plunger-stem and to the door, a link-supporting bracket to be attached to the door and loosely connected to the link, and springs, said link having two members each with a bent end to engage the bracket and hold a spring.

3. The combination of the cylinder, the plunger, means for loosely connecting the cylinder to a door-jamb, and a link pivotally connected to the plunger-stem and to the door, said link being bent outwardly from the stem near the proximate end of the cylinder and then bent back toward the side to permit the link to be held near to and approximately

parallel with said side, whereby the power-transmitting action of the said link is effected in a line near and approximately parallel with the cylinder and piston-stem.

4. The combination of the cylinder adapted to be loosely connected with a door-jamb, the plunger having a stem provided with an eye, a link having two members connected by a bend to engage said eye, and provided with a bent end to engage a bracket, and said bracket.

5. In a door-check, the cylinder, the piston, the piston-stem, a link connecting the outer end of the stem to the door, a screw-eye fixed to a side jamb of the door, and a hook fixed to the cylinder and engaging the said eye, said link constituting the sole movable connection of the stem.

6. In a door-check, the cylinder, the piston and stem, a link connecting the stem to a bracket on the door, a screw-eye fixed to a side jamb of the door, a hook fixed to the cylinder and engaging the said eye, and a filling-piece on the screw-eye between the eye and the jamb.

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

ROBT. A. LACKEY.

Witnesses:
H. N. LEADAMAN,
ADOLPH DRUKSLER,
HERMON F. SCHULTZ.