F. A. BARRETT.

DETACHABLE DOOR HINGE.

APPLICATION FILED AUG. 13, 1912.

1,071,982. Patented Sept. 2, 1913.

Fig. 1.

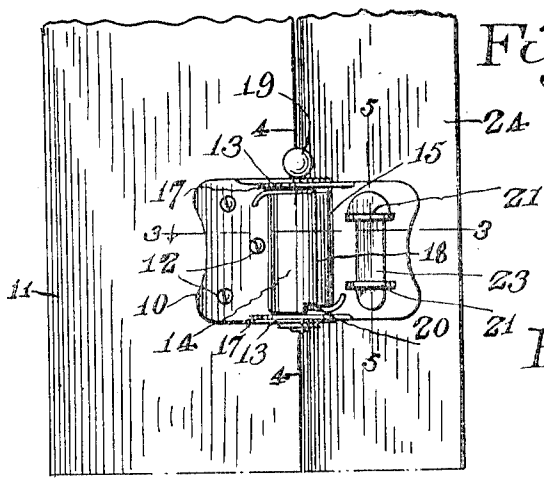


Fig. 2.

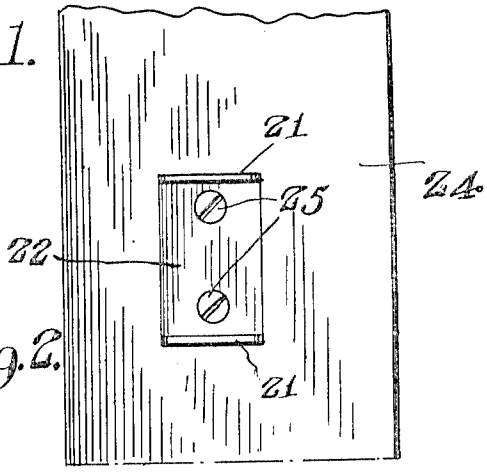


Fig. 3.

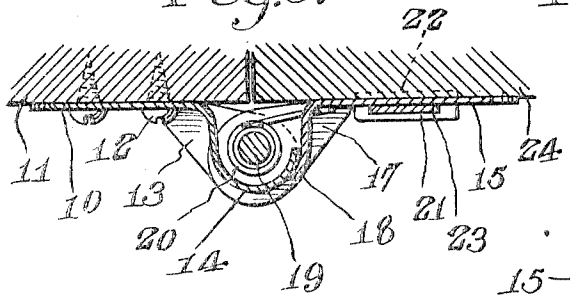


Fig. 4.

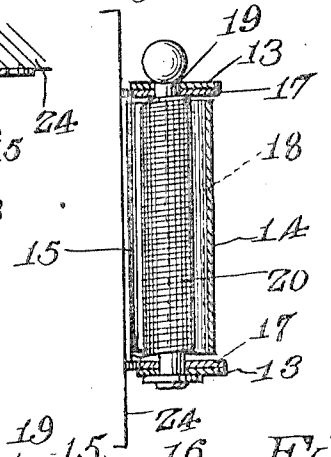


Fig. 5

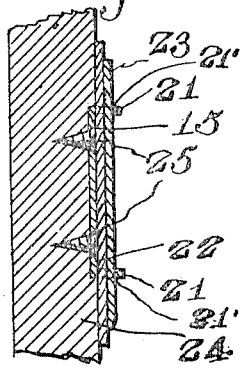


Fig. 6.

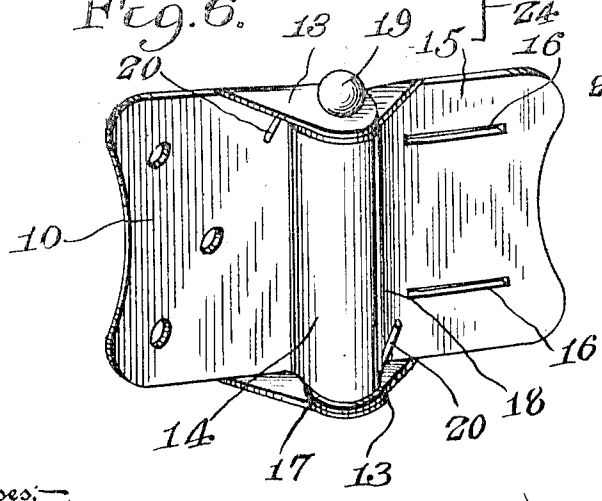


Fig. 7.

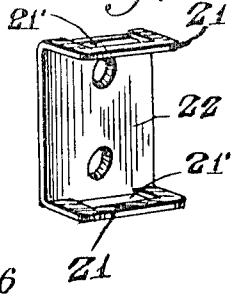
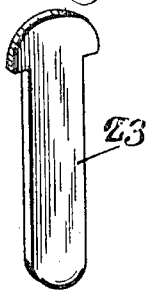


Fig. 8.



Witnesses:
J. P. Wahler.
Wm. S. Fowler.

Inventor,
F. A. Barrett.

By Lyon & Lyon

Attorneys.

UNITED STATES PATENT OFFICE.

FLORA A. BARRETT, OF COLUMBUS GROVE, OHIO.

DETACHABLE DOOR-HINGE.

1,071,982. Specification of Letters Patent. Patented Sept. 2, 1913.

Application filed August 13, 1912. Serial No. 714,894.

To all whom it may concern:

Be it known that I, FLORA A. BARRETT, a citizen of the United States, residing at Columbus Grove, in the county of Putnam, State of Ohio, have invented certain new and useful Improvements in Detachable Door-Hinges; 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 appertains to make and use the same.

This invention relates to hinges and more particularly to detachable spring hinges specially adapted for screen doors.

Another object is to provide a hinge of this character which may be readily attached to a door casing or detached therefrom.

Another object is to provide a sectional spring hinge carried by the door and adapted to have one portion thereof detachably connected with a securing member permanently carried by the door casing.

Another object is to generally improve and simplify the construction of hinges of this type and increase the efficiency and durability thereof.

With these and other objects in view my invention will be more fully described and illustrated in the accompanying drawings which show preferred embodiments of my device and then specifically pointed out in the appended claim which is attached to and forms a part of this application.

In the drawings:—Figure 1 is a front elevation of the upper right hand corner of a door casing and screen door, showing one hinge and part being broken away. Fig. 2 is a front elevation of a portion of a door casing with a securing member in place, the hinge being removed. Fig. 3 is a sectional view of the line 3—3 Fig. 1. Fig. 4 is a vertical section on the line 4—4 Fig. 1. Fig. 5 is a similar view on the line 5—5 Fig. 1. Fig. 6 is a detail view of the hinge removed. Fig. 7 is a similar view of the securing member removed. Fig. 8 is a detail view of the locking key removed.

Referring more specifically to the drawings in which similar reference characters designate corresponding parts throughout, 10 designates one section of the hinge permanently secured along the edge of the door 11 by means of suitable screws 12 or other securing members. The hinge section 10 has the upper and lower perforated ears 13 and the vertical rolled portion 14 extending between said ears and slightly spaced therefrom, the purpose of which will presently appear. The opposite hinge section 15 has the spaced hingable slots 16 in its main portion while the upper and lower spaced ears 17 are provided near its rolled vertical edge 18 which engages against and rides around the vertical rolled portion 14 of the first section when the two sections are properly connected. When said sections are connected, the ears 17 of the second section are positioned between the ears 13 and the ends of the vertical rolled portion 14 of the first section; the connecting pin 19 is positioned through the ears of the two sections.

The coiled spring 20 is positioned in the rolled vertical portions of the hinge sections and has one end bent to rest upon the main or flat portion of the first section while its opposite end is similarly bent to rest upon the main or flat portion of the second section, it being understood that the spring is under tension thus acting upon the hinge sections to resiliently retain the same in their proper positions.

When it is desired to hang the door the second section of the hinge presses against the door frame until the parallel arms 21 of the U shaped securing member 22 project through the hinge openings 16 of said section. The flat locking key is then passed through the elongated openings 21′ in said arms thus properly securing said second section against the door frame 24. It will be understood that the main portion of the U shaped securing member 22 is countersunk in the casing in vertical position and fastened in position by means of the countersunk screws 25, as clearly shown in Fig. 2.

From the foregoing it will be apparent that to remove the door, all that is necessary is to force the securing keys 23 out of the arms, after which the second section of the hinge may be readily withdrawn, leaving only the U shaped members 22 upon the casing.

It will be apparent that that hinge is of such simple construction that it may be readily and cheaply manufactured and will be highly efficient and effective in use. It will be further evident that minor changes may be made in the details of construction within the scope of the appended claim without departing from the spirit of my invention.

What is claimed is:—

A hinge of the character described comprising a pair of leaves hingedly connected together, one of said leaves being provided with parallel transverse slots, a securing member comprising a U-shaped member having its plate portion provided with means for attachment to a fixed part and its arms provided with alining openings, said arms being engaged through the slots in said leaf respectively, and a locking pin engaged through the slots in said arms to detachably lock the hinge and securing member together.

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

FLORA A. BARRETT.

Witnesses:

C. B. STERLING,

HOMER R. DAY.