

(No Model.)

G. E. WILSON.
HOUSE LETTER BOX.

No. 511,480.

Patented Dec. 26, 1893.

Fig. 1.

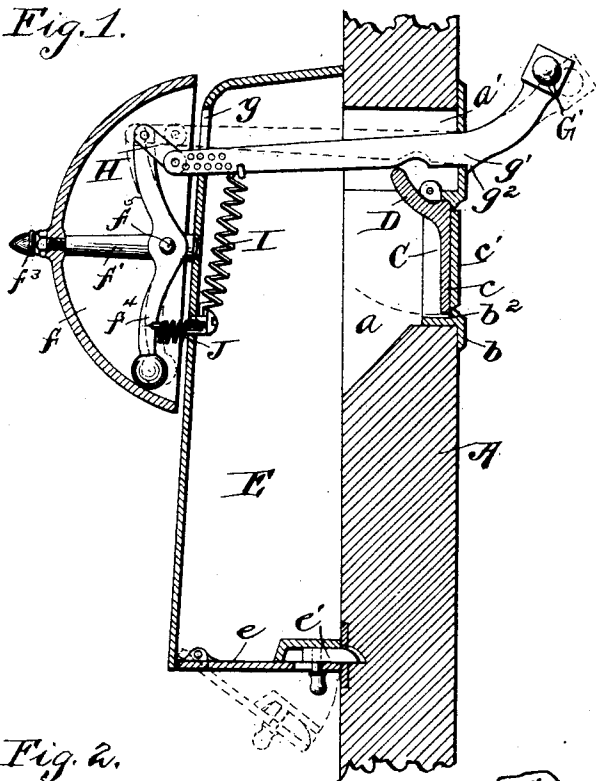


Fig. 3.

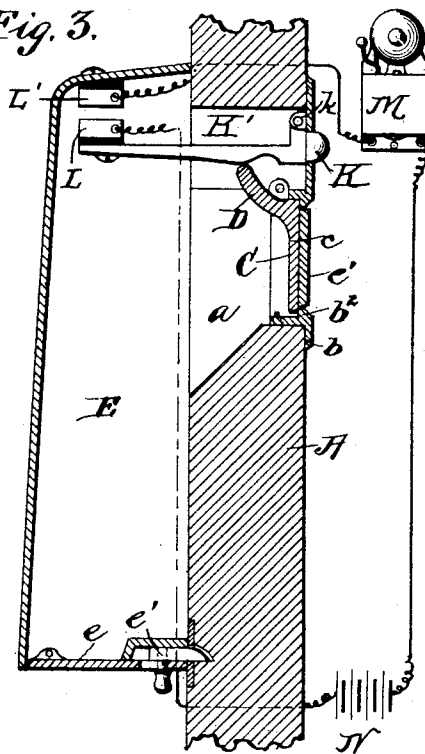
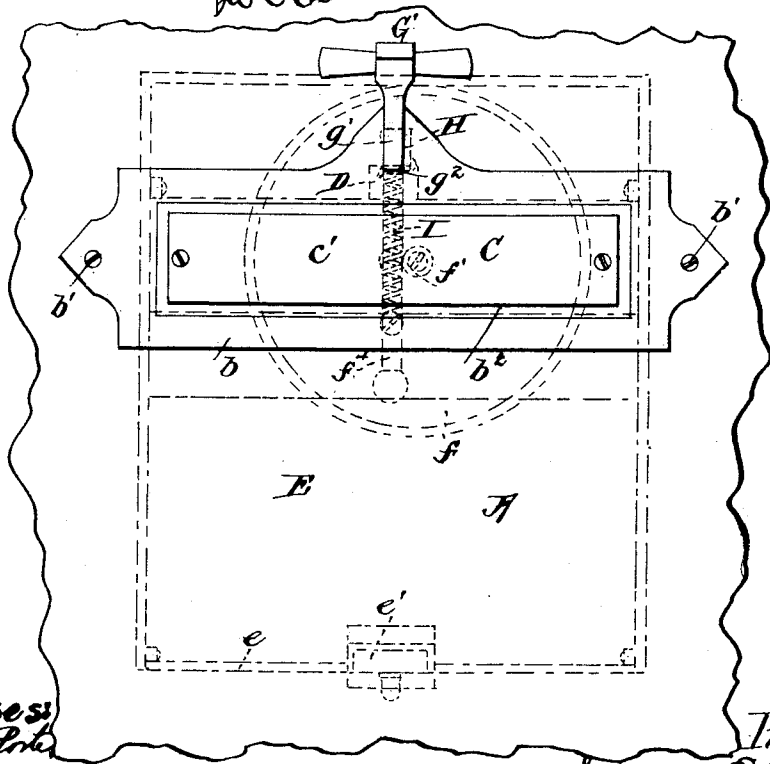


Fig. 2.



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UNITED STATES PATENT OFFICE.

GEORGE E. WILSON, OF STILLWATER, MINNESOTA, ASSIGNOR OF ONE-HALF
TO H. C. FOGLE, OF SAME PLACE.

HOUSE LETTER-BOX.

SPECIFICATION forming part of Letters Patent No. 511,480, dated December 26, 1893.

Application filed April 8, 1893. Serial No. 469,598. (No model.)

To all whom it may concern:

Be it known that I, GEORGE E. WILSON, a citizen of the United States, residing at Stillwater, in the county of Washington and State of Minnesota, have invented certain new and useful Improvements in House Letter-Boxes, of which the following is a specification, reference being had therein to the accompanying drawings.

Figure 1 is a vertical section of a portion of a door, and of my improvements applied thereto. Fig. 2 is a face view of the same. Fig. 3 is a vertical section of a slightly modified box, in which an electrical bell is used.

In the drawings A, represents a part of a door of the sort to which it is desired to apply my invention. An aperture is formed through it as is indicated at *a*, of such dimensions as will permit the passage of letters, papers, and similar articles which are transported by mail. This aperture communicates with a slot *a'*, at the upper edge formed for a purpose to be described. The aperture can be tightly closed upon the outer face of the door by the following devices:

b, represents a frame piece having vertical and horizontal flange plates adapted to provide a tight fitting at the edges of the aperture *a*, and having extensions of suitable number and arrangement for receiving screws or bolts as at *b'*. In the frame thus provided there is mounted a part which serves the purposes of a movable door for the passage *a*, and also for name plate. It is indicated as a whole by C, it having the inner plate or flange *c*, adapted to fit behind the flanges or beads *b²* on the frame plate, and having the outward projecting plate *c'*, upon which are placed letters or characters to indicate the owner or occupant of the premises. This door C, is provided with an upwardly projecting arm D, for a purpose to be set forth.

Upon the inner side of the door there is a box or receptacle E, preferably having top, bottom, side and back walls with suitable flanges or ears for securing it to the door. It is placed so as to cover the passage way *a*, and so that any articles passing through the latter will be received immediately in the box. More or less of the bottom is movable, it pref-

erably being provided with a hinged door *e*, having a catch or latch at *e'*.

With the parts above described I combine a bell or gong which can be utilized both as a door-bell in the ordinary way, and as an alarm to indicate that the closing device C, has been opened. This bell or gong may be of any suitable construction. The one illustrated has the sounding cup or dome *f*, the center stud, *f'*, adapted to be secured directly to the wall of the mail box E, as by passing a screw through the latter and through the stud and binding it with a nut at *f³*; or, the stud, *f'*, may be permanently fastened to the mail box and the bell cup may be fastened against a shoulder at its outer end. The center stud *f'*, also supports the tongue arm *f⁴* by a pivot *f⁵*. The striker knob is at one end of this part, and the other end is connected with the pull bar G, by a link H. The bar G, extends inward from the outside of the door through the above described slot *a'*, across the mail box E, and through a slot *g*, in the latter. It has a handle of any preferred sort at *G'* and is fulcrumed at *g'*, upon the lower edge of the aperture to the casing frame, there being a shoulder or lug at *g²*, bearing against the outside of the latter. It will be seen that when the bar G is rocked from the outside of the door it and the link H, will be thrown into the position indicated by the dotted lines and in doing so the tongue-bar *f⁴* will be moved in such way as to strike the bell dome and cause the ringing of the latter. A spring I, normally tends to hold the inner end of the arm G, down, and a spring J, tends to hold the lower end of the tongue-bar *f⁴* outward. The arm D, of the closing device C, projects inward to the lines behind the line of the pivot at C', and preferably to points somewhat above that pivot, and normally lies in contact with the lower edge of the bar G. When the door closing device C, is moved inward around its pivot C', the bar D, is moved upward and lifts with it the pull-arm G, and a slight motion, only, of this sort is necessary to cause the ringing of the bell. The arm D, however, is so situated as not to interfere at all with the ringing of the bell, when desired, by means of a

handle at G'. Thus, whenever the name plate or closing device C, is moved by a proper person, as by a mail-carrier depositing letters in box E, it will be instantly announced to the occupants of the house by the ringing of the bell; and, likewise, an announcement that the name plate or closing device is being moved will be made if it is improperly tampered with at any time.

The device shown in Fig. 3 is but slightly different from that shown in Fig. 1. Instead of mounting a gong or bell upon the rear plate of the box, to be struck by pulling upon the handle, I use an electric bell M which may be located in some other part of the house. An electric generator is shown conveniently at N, and is connected by wires with the electric magnet in the bell M, and the two contacts L, L' in the letter box. One contact is mounted on, and insulated from, the end of a lever K', pivoted at k and having a push button K. It will be readily seen that when the lever is lifted, either by means of the push button K, or by the lever D on the swinging plate C, the electric circuit is closed thereby causing the bell to ring.

All of the parts which have been described are initially manufactured as parts of one complete device ready for sale and application to the door.

While I have herein shown and described the part A, as being part of an ordinary door, and prefer to apply my device thereto, yet I do not wish to be limited to placing it in such location, as under some circumstances I propose to secure it to a wall or other stationary support; and, too, with respect to the parts themselves, there can be more or less variation without departing from the essential features of the invention.

I am aware of the fact that use has been heretofore made of a bell or sounder in connection with a money drawer, and with other receptacles for various purposes. But I believe myself to be the first to have devised a mechanism by which can be accomplished all of the ends that can be reached with the present one, particularly a sounding bell or gong for a mail box, having means which can be actuated for sounding it either when the closing device or lid for the box is opened, or actuated independently thereof, so that the same bell or gong can be utilized for either of several purposes.

The passage through the door or wall for the letters to the box E, can be varied in shape and dimensions, as it will be seen that the essential feature lies in having an opening into the letter box itself which shall be controlled by the closing lid or door as at C, irrespectively of the particular form of the passage.

I am aware that combined letter boxes and door bells have been heretofore made or proposed, in which the ringing of the bell was accomplished by lifting or swinging the closing plate for the letter passage, and that also in one

case, a supplemental ringing device was added, whereby the bell could be rung without moving the said closing plate. I do not claim broadly such a construction as of my invention.

In my device, the parts are few and the mechanism simple. The bell sounder is operated by a bar which extends to the front surface of the door, so that the bell may be rung directly by said bar. The closing plate for the letter passage is hung directly under said bar and has, as said, an arm, which, when the plate is swung backward to permit the insertion of a letter in the said passage, engages the said bar and the bell is rung. Thus it will be seen that the bell is rung by the said bar, either when the said bar itself is moved by the hand of a person, or when a letter is inserted in the passage. In the aforesaid earlier device, two independent bell sounding mechanisms had to be employed, thereby increasing the number of parts, detracting from the simplicity of the mechanism, and adding very materially to its cost.

I believe that I am the first to have invented a combined letter box and door bell, in which a bell may be sounded by a single mechanism adapted to be operated either by the hand, or by the plate which closes the letter passage.

What I claim is—

1. In a combined letter box and door bell, the combination with the door having a letter passage, and the letter box secured to the inner side thereof opposite the said letter passage, of the bell, the bell sounder, the inwardly swinging closing plate for the letter passage, the single means extending from the bell sounder to points near the outer surface of the door for operating said sounder, and loosely connected to the said closing plate, and a handle or equivalent connected with said means whereby it can be operated by the hand directly or by the said closing plate, substantially as set forth.

2. In a combined letter box and door bell, the combination with the door having a letter passage, and the letter box secured to the inner side thereof opposite the said letter passage, of the bell, the bell sounder, the single operating bar, located inside said letter box the closing device for the letter passage connected with said bar, and a handle connected to said bar, and extending to the surface of the door whereby the said bar can be operated either by said closing device or by said handle independently of the closing device, substantially as set forth.

3. The combination with the letter box having a receiving opening, and the inwardly swinging closing plate therefor having an upwardly extending arm, of the bell, the bell sounder, and an independently operable bar, located within the top and bottom walls of the letter box engaging with said arm and movable thereby, substantially as set forth.

4. The combination with the letter box, hav-

ing a receiving opening, of the closing plate therefor having an inwardly swinging arm integral therewith, a bell, a bell sounder, and a bar extending to points adjacent the outer surface of the door and loosely connected with said plate, whereby it can be operated by the plate or independently thereof, substantially as set forth.

5. The combination with the door having a letter passage, and a letter box secured to the door in the rear thereof and opposite the letter passage, of a bell, a bell sounding mechanism, a closing plate for said letter passage pivoted to the door, and a lever for causing the bell sounding mechanism to operate, loosely engaging with said closing plate whereby it is operated thereby, and extending to the front surface of the door whereby it can be operated independently of the said closing device, substantially as set forth.

6. The combination with the door having a letter receiving aperture and a letter box secured to said door in the rear thereof and opposite said aperture, of a closing plate for said aperture, a lever pivoted to said door and loosely engaging with said closing device and having a portion extended to the surface of the door whereby said lever may be moved by said closing device or independently thereof, a stationary contact, a contact mounted on said lever, an electric bell, and an electric circuit including said contacts and said bell and adapted to be closed by the movement of said lever, substantially as set forth.

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

GEORGE E. WILSON.

Witnesses:

E. D. BUFFINGTON,
W. E. FOGLE.