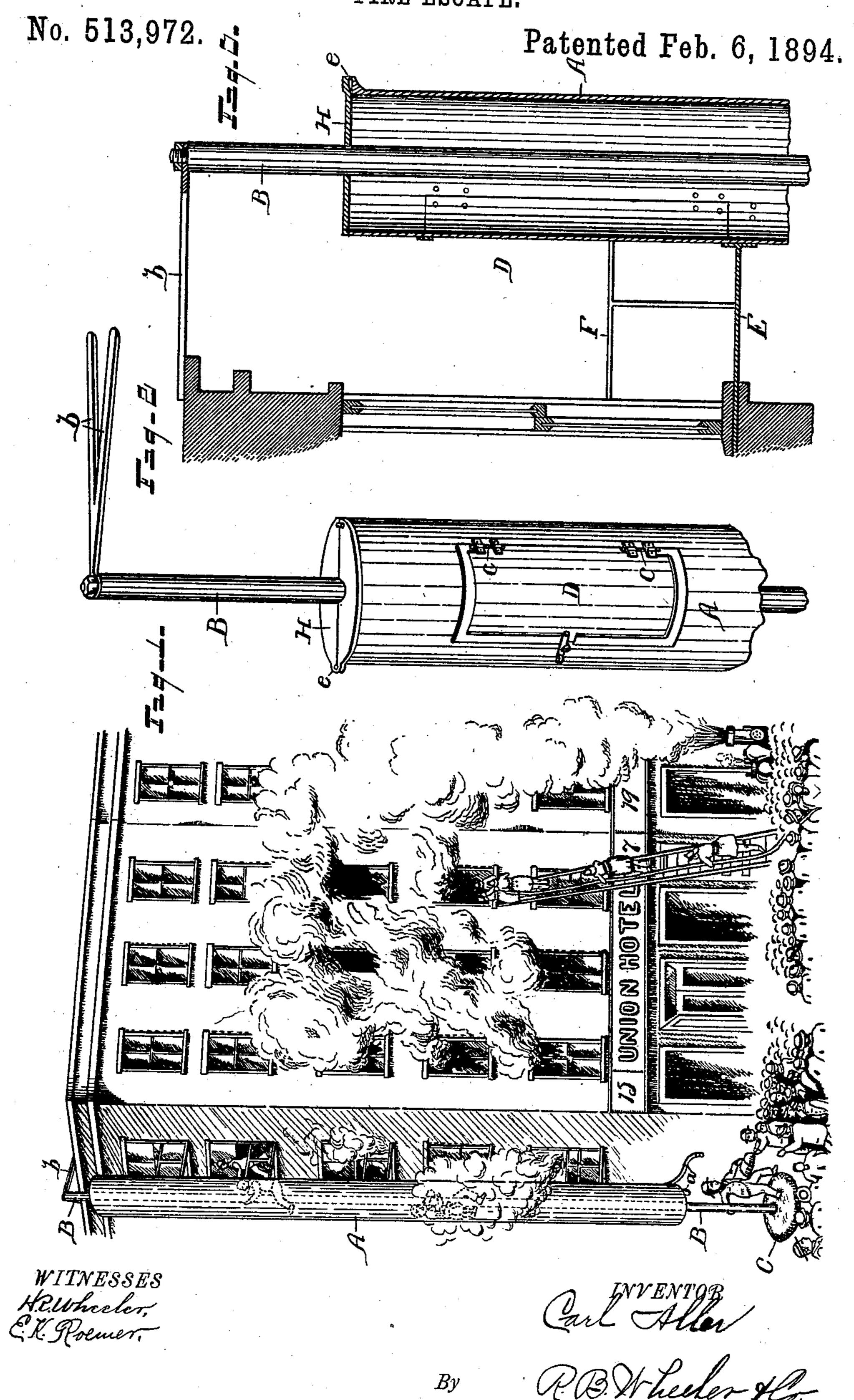
C. ALLER. FIRE ESCAPE.



WASHINGTON, D. C.

## United States Patent Office.

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## FIRE-ESCAPE.

SPECIFICATION forming part of Letters Patent No. 513,972, dated February 6, 1894.

Application filed February 23, 1893. Serial No. 463,514. (No model.)

To all whom it may concern:

Be it known that I, CARL ALLER, a subject of the Emperor of Germany, residing at Detroit, in the county of Wayne, State of Michigan, have invented certain new and useful Improvements in Fire-Escapes; and I do 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, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification.

This invention relates to new and useful improvements in fire escapes, and consists in a certain construction and arrangement of parts as fully hereinafter set forth, the essential features of which being pointed out par-

ticularly in the claims.

The object of the invention is to provide simple, safe and effective means of escape from a building in case of fire, the arrangement being such that the exit from the building may be speedily accomplished. This object is attained by the mechanism illustrated in the accompanying drawings, in which—

Figure 1 is a perspective view of a building on fire, provided with my improved fire escape, showing the application thereof. Fig. 30 2 is an enlarged perspective view of a portion of the device, showing one of the doors which communicate with the escape cylinder. Fig. 3 is an enlarged vertical section of a portion of the cylinder and a building to which it is attached, showing the platform communicating with the window of the building and the door of said cylinder.

Referring to the letters of reference, A designates a continuous hollow cylinder of suitable diameter, which may be placed either inside or outside of the building and which extends from the top of the building to within a few feet of the ground, where it is placed upon the outside. This cylinder is made of non-combustible material, preferably of metal, is provided with a perfectly smooth interior, and is supported by braces a from the side of the building, as shown in Fig. 1, or in any suitable manner. Passing vertically through the center of said cylinder, is a pole or shaft B, the lower end of which rests upon

the ground, and the upper end is supported by braces b. This pole will be smooth to obviate undue friction, and of such size as to be conveniently grasped by a person in 55 descending thereby, the space between the pole and inner wall of the cylinder being such as to permit people to slide freely down on the pole, but not sufficient to permit them to fall away from the pole and lose their 60 hold thereof. At the base of the pole may be placed a cushion C to prevent injury by too rapid a descent. The cylinder is placed adjacent to the building in line with a row of windows, and is provided with a door D op- 65 posite each window that swings outward, and which communicates with said window by means of a platform E extending from the building to the cylinder, as shown in Fig. 3, said platform having a railing F on each 70 side to prevent falling therefrom. The doors D in the cylinder open outward, and are provided with spring hinges c whereby they are made self closing, so that when entrance is made to the cylinder through any of the 75 doors they will close and lock, thus preventing a person in descent from falling outward through an open door. The top of the cylinder is provided with a cover H which is divided through the center, and each part 80 hinged at e so as to enable them to be swung outward, to afford access to the cylinder from the roof of the building and when closed exclude water from entering the top of the cylinder. The cylinder inclosing the pole B pro- 85 tects it from the fire, and enables a safe descent even when the cylinder is surrounded by fire.

If desired, the cylinder and pole may be placed within the building and communica- 90 tion had therewith through the doors D from the various floors of the building, as will be readily understood.

Having thus fully set forth my invention, what I claim as new, and desire to secure by 95 Letters Patent, is—

1. In a fire-escape, the combination of the hollow cylinder extending to the top of the building, the pole supported centrally within said cylinder and passing therethrough, being entirely free therefrom and extending beyond each end of said cylinder and means

for communicating with the interior of said cylinder from the various floors of the build-

ing, substantially as specified.

2. In a fire-escape, the combination of the hollow cylinder having a series of doors communicating with the interior thereof arranged in vertical order, and the pole passing through the vertical center of said cylinder and supported free therefrom, the ends of said pole extending through and beyond the ends of said cylinder substantially as set forth.

3. In a fire escape, the combination of the hollow vertical cylinder, its upper end being provided with a hinged cover and its lower

end terminating some distance above the 15 ground, the pole passing centrally through said cylinder and through the hinged cover on its upper end and supported entirely free from said cylinder, and means for communicating with the interior of said cylinder 20 throughout the entire length thereof.

In testimony whereof I affix my signature in

presence of two witnesses.

CARL ALLER.

Witnesses:

B. F. WHEELER, CASSIUS HOLLENBECK.