No. 728,145. PATENTED MAY 12, 1903.

J. TRIPLETT.

FIRE ESCAPE.

APPLICATION FILED MAR. 20, 1903.

NO MODEL.

Fig. 1

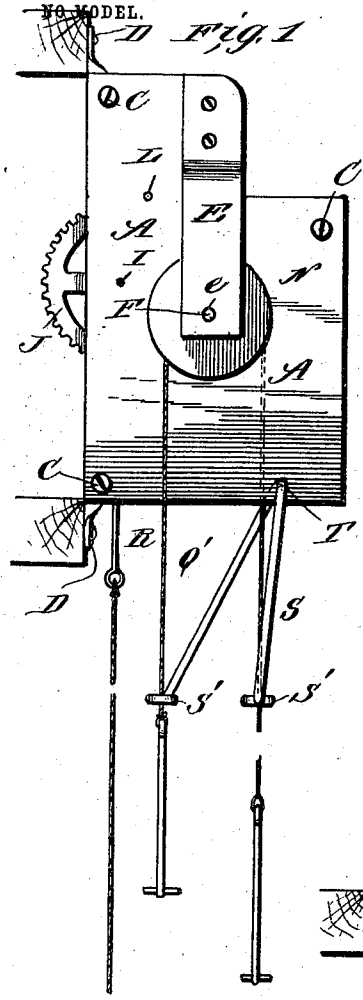


Fig. 2.

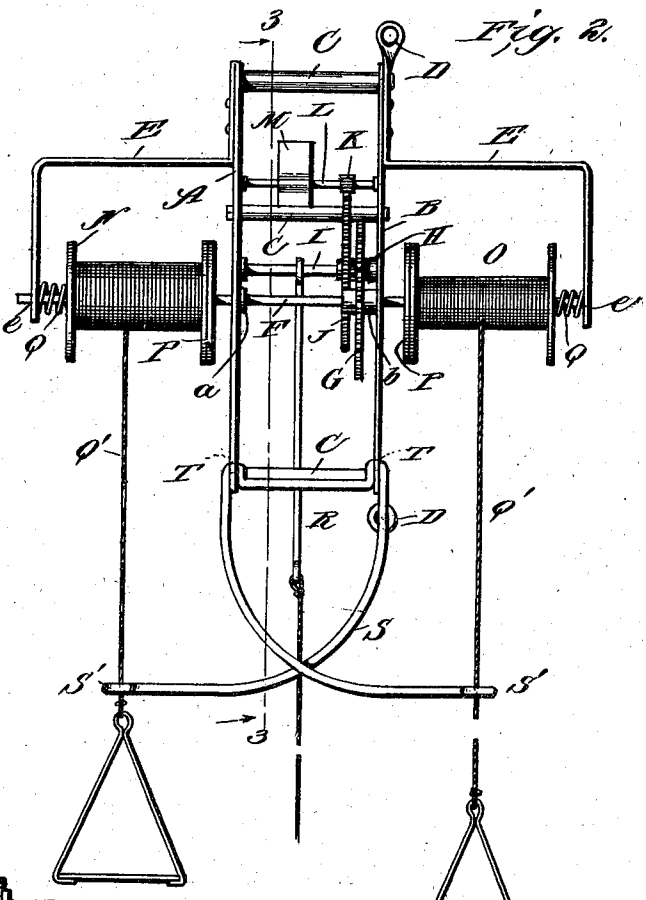


Fig. 3.

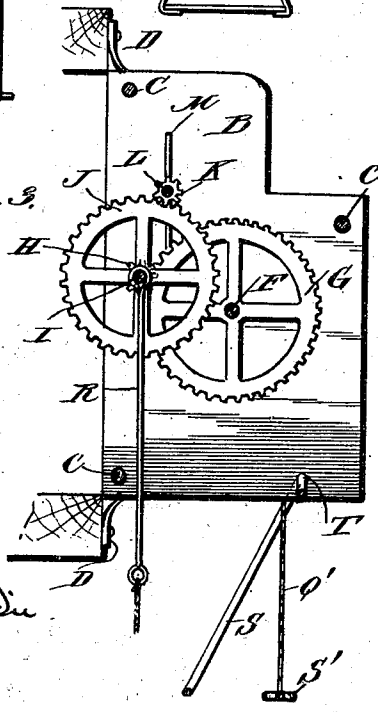
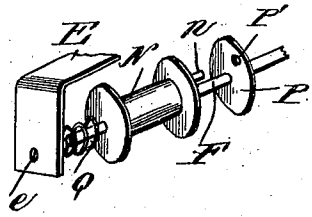


Fig. 4.



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No. 728,145. Patented May 12, 1903.

# UNITED STATES PATENT OFFICE.

JAMES TRIPLETT, OF CAMPBELLSVILLE, KENTUCKY.

## FIRE-ESCAPE.

SPECIFICATION forming part of Letters Patent No. 728,145, dated May 12, 1903.

Application filed March 20, 1903. Serial No. 148,711. (No model.)

*To all whom it may concern:*

Be it known that I, JAMES TRIPLETT, a citizen of the United States, residing at Campbellsville, in the county of Taylor and State of Kentucky, have made certain new and useful Improvements in Fire-Escapes, of which the following is a specification.

My invention is an improvement in fire-escapes, and has for an object to provide a simple construction which can be readily applied to a door, window, or other support in or adjacent to a room and by which a person can safely descend to the ground by means of a rope or cable and in doing so will elevate another rope or cable, so a second person can descend, who in turn will raise the first rope, so that an unlimited number of persons can escape by alternately using the two ropes with which the apparatus is supplied; and the invention consists in certain novel constructions and combinations of parts, as will be hereinafter described and claimed.

In the drawings, Figure 1 is an elevation of the fire-escape apparatus as in use. Fig. 2 is a detail front elevation of the fire-escape. Fig. 3 is a detail cross-section on about the line 3 3 of Fig. 2, showing the gearing and the brake mechanism; and Fig. 4 is a detail perspective view illustrating the means for adjusting the drums on the shafts to adapt the escape for use at different heights.

In carrying out my invention I provide a suitable frame consisting of the parallel plates A and B, suitably braced in position by the connecting-bolts C and provided with the eyes D for receiving screws or with other suitable devices to facilitate securing the frame to a door, window, or other suitable support in or adjacent to the room whose occupants it is desired to protect by the fire-escape. The frame also includes the brackets E, extending outwardly from the plates A and B and provided at their outer ends with bearings at *e* for the main shaft F of the apparatus. This shaft F journals near its ends in the bearings *e* and is also journaled in bearings *a* and *b* in the frame-plates A and B and is provided adjacent to the inner side of the plate B with a gear-wheel G, which meshes with the pinion H on the counter-shaft I, which counter-shaft I is also provided with a gear-wheel J, meshing with the pinion K on the fan-shaft L, which is provided with a fan-plate M to operate as a brake, as its shaft is rapidly revolved as the person descends.

The shaft F is provided between the plates A and B and their respective brackets E with the drums N and O, which are alike and loose on the shaft and which have their inner heads provided with the studs *n* to enter seats P′ in disks P, secured on the shaft F close to the outer sides of the plates A and B, springs Q being arranged to press the drums into engagement with their respective disks P, so as to hold the drums normally in engagement with the said disks P and at the same time permit the disengagement of said drums from their disks in order to let out more or less rope from the drums to adapt the escape to buildings of different heights. The operation of this construction will be readily understood from the drawings, Fig. 4, and the foregoing description.

The ropes Q′ are wound on their respective drums N and O in reverse directions, so that as one rope descends the other will ascend, carrying with it the loop-belt, basket, car, or other appliance, which may be applied to the ropes or cables to receive the escaping persons. By this means as one person descends in escaping on one cable the other cable will be raised to the others in danger, so they can escape one by one.

By means of the device for adjusting the lengths of the cables, as before described, they can be caused to raise the cables to the proper height to receive the escaping persons.

A bar R is looped around the counter-shaft I and is provided with a depending rope or cable, so it can be operated from the ground to serve as a brake while the escaping person is getting out of the window.

The cables are guided below the plates A and B by means of a metal guide-frame S, consisting of a length of metal rod passed through openings at T in the plates A and B, so the frame can swing at its lower end and having its depending portions crossed below the plates A and B and provided at their free ends with guide-loops S′ for the ropes or cables.

It will be understood that the apparatus, except the cables, may be made of metal and that the cables may be made of fireproof ma-

terial or may be coated with fireproof material, so that they will not be destroyed by flames escaping from the window or other opening in the path of the cables.

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

1. The improved fire-escape herein described comprising the framing having the main plates provided with bearings for the main shaft, devices connecting said plates and holding same properly apart, the laterally-projecting brackets on the main plates provided at their outer ends with bearings for the main shaft, the main shaft journaled in the plates and brackets and provided between the plates with a gear-wheel and between the plates and brackets, and adjacent to the plates, with the disks having openings for the studs on the drums, the drums loose on the shafts and having their inner heads provided with studs to enter the openings in the disks on the shaft, the springs for forcing the drums into engagement with their respective disks, the counter-shaft having a pinion meshing with the pinion on the main shaft, the gear on the counter-shaft, the brake-shaft having the pinion meshing with the gear on the counter-shaft, the fan-plate on the brake-shaft, the brake-rod looped around the counter-shaft, and the guide-frame in the form of a rod swinging from the main plates and crossing below the same and provided with guide-loops adapted to receive the cables depending from the drums, all substantially as and for the purpose set forth.

2. The combination in a fire-escape of the framing having the main plates and the outlying brackets, said brackets and plates having bearings for the main shaft, the drums loose on the main shaft between the plates and the brackets, the disks fixed on the shaft between the drums and plates and arranged for engagement with the drums, the springs for holding the drums normally in engagement with the disks, the cables wound in reverse directions on the drums, and guide devices suspended from the plates for said cables, substantially as set forth.

JAMES TRIPLETT.

Witnesses:
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