

E. SCHLENKER.
Safety-Guard for Hatchways.

No. 162,195.

Patented April 20, 1875.

Fig. 1

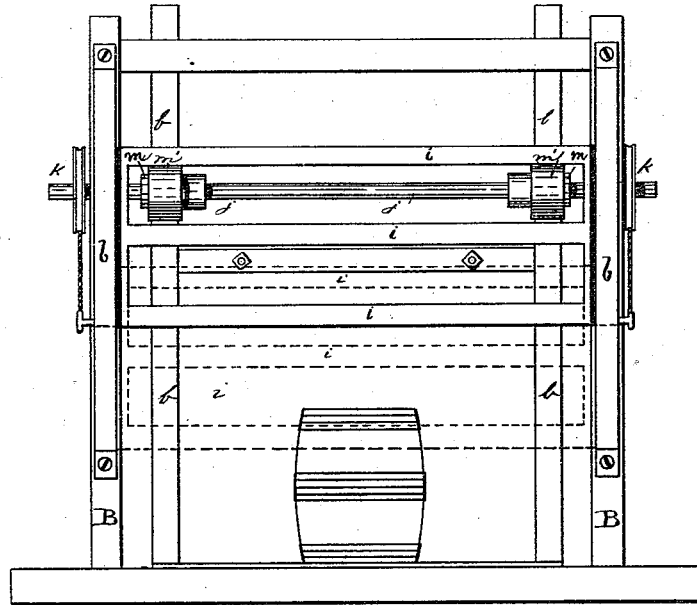


Fig. 2

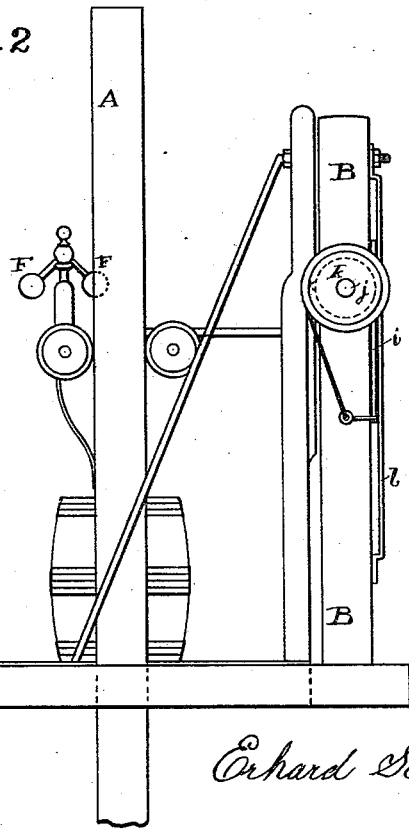
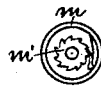


Fig. 3



Witnesses.
J. P. Curtis
S. Finley

Inventor.
Erhard Schlenker

UNITED STATES PATENT OFFICE.

ERHARD SCHLENKER, OF BUFFALO, NEW YORK, ASSIGNOR OF ONE-HALF HIS RIGHT TO RUFUS L. HOWARD AND GIBSON F. HOWARD, OF SAME PLACE.

IMPROVEMENT IN SAFETY-GUARDS FOR HATCHWAYS.

Specification forming part of Letters Patent No. 162,195, dated April 20, 1875; application filed December 15, 1874.

To all whom it may concern:

Be it known that I, ERHARD SCHLENKER, of the city of Buffalo, in the county of Erie and State of New York, have invented an Improved Elevator Safety Attachment, of which the following is a specification:

The object of my invention is to secure greater safety in the operation of hand and power elevators; and for this purpose I have arranged a door or gate which is operated by the elevator, and the entrance to the hatchway is opened when the platform is on a level with the floor, and as it ascends or descends said door or gate closes said entrance. My improvement is illustrated more in detail in the drawings.

Figure 1 is an elevation of an elevator, showing my safety automatic door or gate. Fig. 2 is an end view of same, and Fig. 3 is a detached view of one of the ratchets on said door or gate.

A represents the frame or upright ways in which the elevator is placed. B is the frame which carries the ways, in which the gate slides. Letters *i i* represent the gate or door, which slides up and down in slots or ways *b*, attached to a permanent frame B, arranged on the floor at each hatchway. Letter *j* represents a shaft extending across said frame, having two india-rubber rollers, with right and left ratchets *m*, connected therewith inside of said frame. Letter *m'* represents said rollers. On said shaft, and outside of said frame, are two grooved pulleys, (represented by letter K,) with a cord attached to each, and the other end of

said cord is attached to the lower side of said gate or door, and said cord is long enough to raise said gate to the necessary height by winding upon said grooved pulleys. I arrange upon the platform of the elevator, on the side next to the gate or door described, two upright posts at each corner, letter *l*, and as the platform of the elevator moves up or down the india-rubber rollers *m* are pressed against said upright posts, and said rod or shaft *j* is revolved, and by means of the right and left hand ratchets connected with rollers *m*, and the grooved pulleys and rope attached, the gate or door is moved up or down, so as to leave the entrance to the platform open when the said platform is at the hatchway, and when not there said door or gate is closed to guard against accidents at the hatchway.

I have a patent on an elevator, dated October 20, 1874, and do not make any claims on the elevator, except above described; and

I claim as my invention the following:

1. The door or gate *i*, operated by means of the shaft *j*, rubber rollers and ratchets *m m'*, and pulleys K, substantially as and for the purpose specified.

2. The combination of an elevator-platform, having uprights *l*, with rollers *m m'*, shaft *j*, and pulleys K, and with the sliding door or gate *i*, substantially as and for the purpose specified.

ERHARD SCHLENKER.

Witnesses:

P. P. BURTIS,
S. FINLEY.