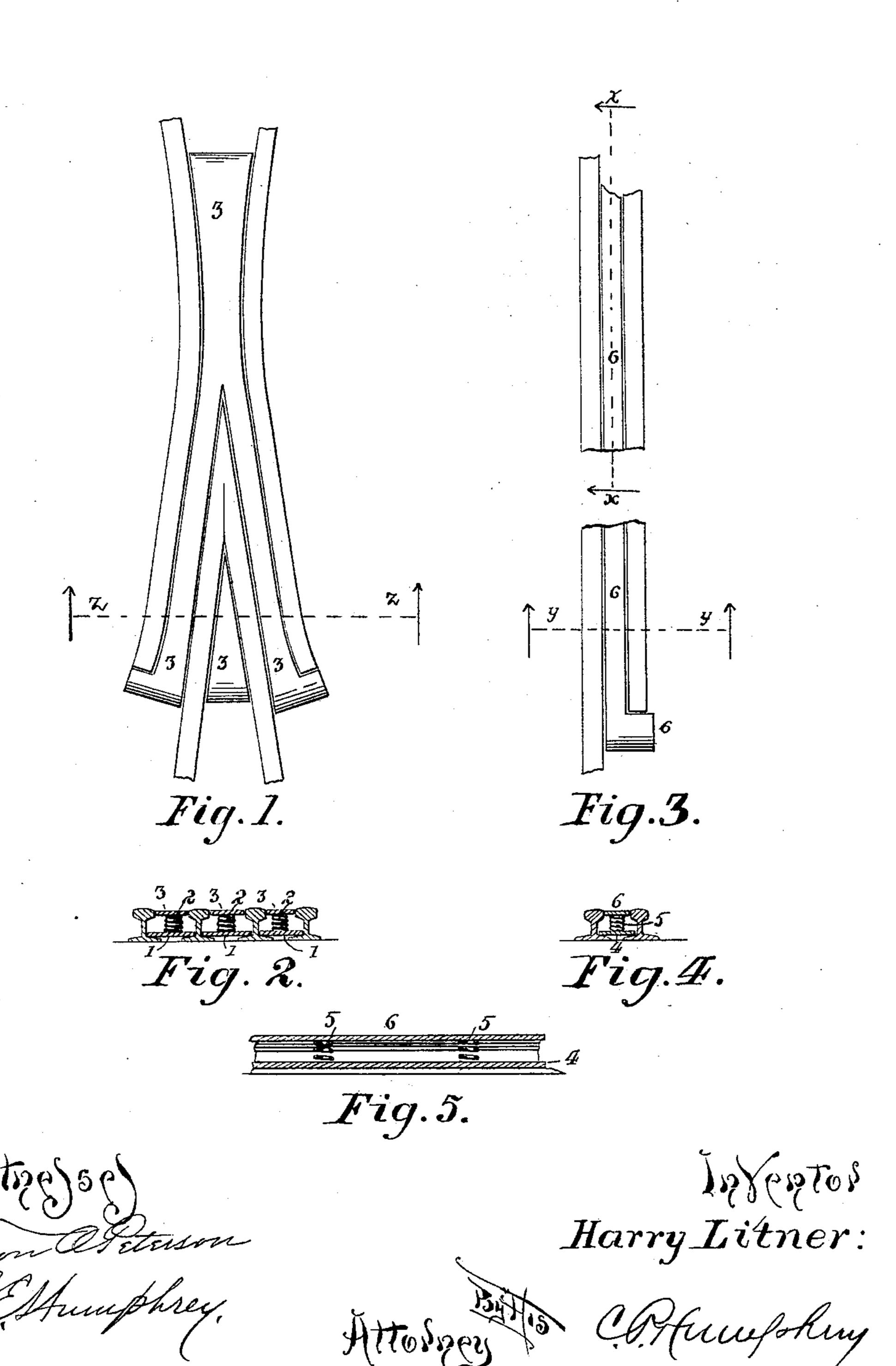
(No Model.)

## H. LITNER. GUARD FOR ADJACENT RAILWAY RAILS.

No. 495,943.

Patented Apr. 18, 1893.



THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

## United States Patent Office.

HARRY LITNER, OF AKRON, OHIO, ASSIGNOR OF ONE-HALF TO MILTON M. ZEIGLER, OF SAME PLACE.

## GUARD FOR ADJACENT RAILWAY-RAILS.

SPECIFICATION forming part of Letters Patent No. 495,943, dated April 18, 1893.

Application filed April 8, 1892. Serial No. 428,290. (No model.)

To all whom it may concern:

Be it known that I, HARRY LITNER, a citizen of the United States, residing at Akron, in the county of Summit and State of Ohio, have invented a certain new and useful Improvement in Guards for Adjacent Railway-Rails, of which the following is a specification.

My invention has for its objects; first, preventing persons from imprisoning or accidentally catching their feet in the space between adjacent railroad rails, frogs, &c., and second, to keep said space free from accumulations of snow, ice and dirt.

To the aforesaid objects my invention consists in the novel construction, combination and arrangements of parts hereinafter described and then specifically claimed, reference being had to the accompanying drawings forming a part of this specification.

In the accompanying drawings in which similar reference numerals indicate like parts in the different figures, Figure 1, is a plan of my improvement applied to a railroad "frog."

Fig. 2, is a section at the line Z—Z of Fig. 1. Fig. 3, is a plan of my improvement applied to an ordinary guard rail. Fig. 4, is a section of Fig. 3, at the line Y—Y. Fig. 5, is a section of Fig. 3, at the line X—X.

Referring to these figures, Fig. 1, represents an ordinary railroad frog, between the rails of which and resting on the lower flange thereof are plates 1, 1, of metal, as boiler iron. On these plates 1, are placed at determined distances a number of heavy coiled wire springs 2, 2. Mounted on top of these springs are heavy sheets of metal, 3, 3, as boiler plate shaped to conform to the space

between the rails, and free to enter vertically therein. These plates are so placed that when in their normal position they will be substantially flush with, or a trifle below, the upper faces of the rails of the frog. The springs 2, 2, are sufficiently strong to sustain the

plates 3, 3, and also the weight of a person 45 stepping thereon, but sufficiently weak to be pressed down by the flange of a car wheel passing over the frog. The plates 3, being held up by the springs 2, prevent all snow, ice and dirt from working between the rails. 50 Whatever snow, &c., falls on the plates 3, and top of the rails, can be readily brushed off. The ends of the plates 3, are turned down as shown in Fig. 1, so that a person walking backward, as a brakeman for instance 55 in the act of coupling two cars, cannot catch his foot between the rails of the frog, but will slip up the incline onto the top of the plates 3.

The modification shown in Fig. 3, is so simi- 60 lar, the only difference being its application to a guard rail, that it will readily be understood from the preceding description of Figs. 1 and 2.

In Figs. 3, 4 and 5, the lower plates are 65 numbered 4, the springs 5, and the upper plates 6. These plates are extended laterally at the ends of the rails to prevent the foot catching on the end of the rail.

or catening on the end of the rail.

I claim as my invention—

In a guard for the space between adjacent

In a guard for the space between adjacent railroad rails the combination of upper and lower plates adapted to enter and fit in said space; the upper plate arranged to be sustained normally flush with the tops of said 75 rails, by coiled springs, resting on said lower plates and having their ends turned down and provided with inclines and extending laterally to cover the ends of said rails substantially as shown and described and for the 80 purposes set forth.

In testimony that I claim the above I hereunto set my hand.

HARRY LITNER.

In presence of—

C. P. HUMPHREY,

C. E. HUMPHREY.