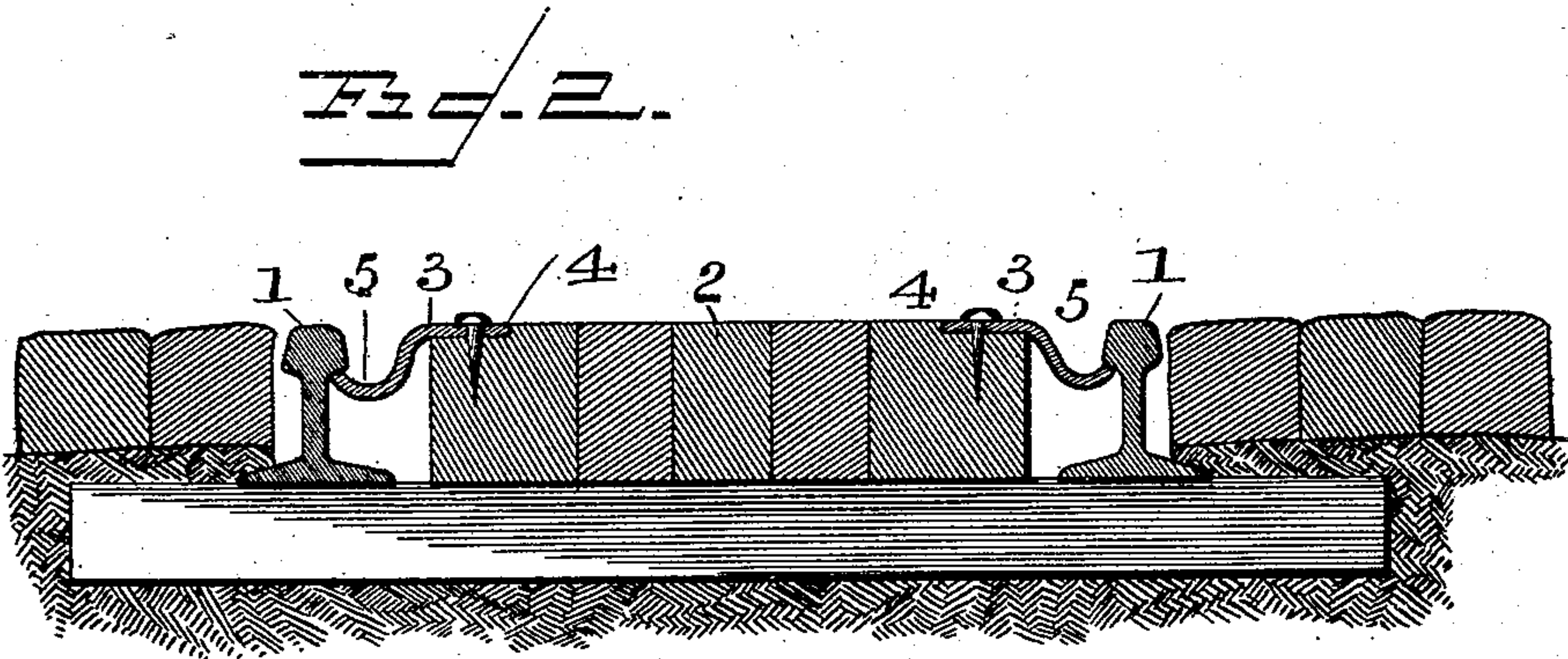
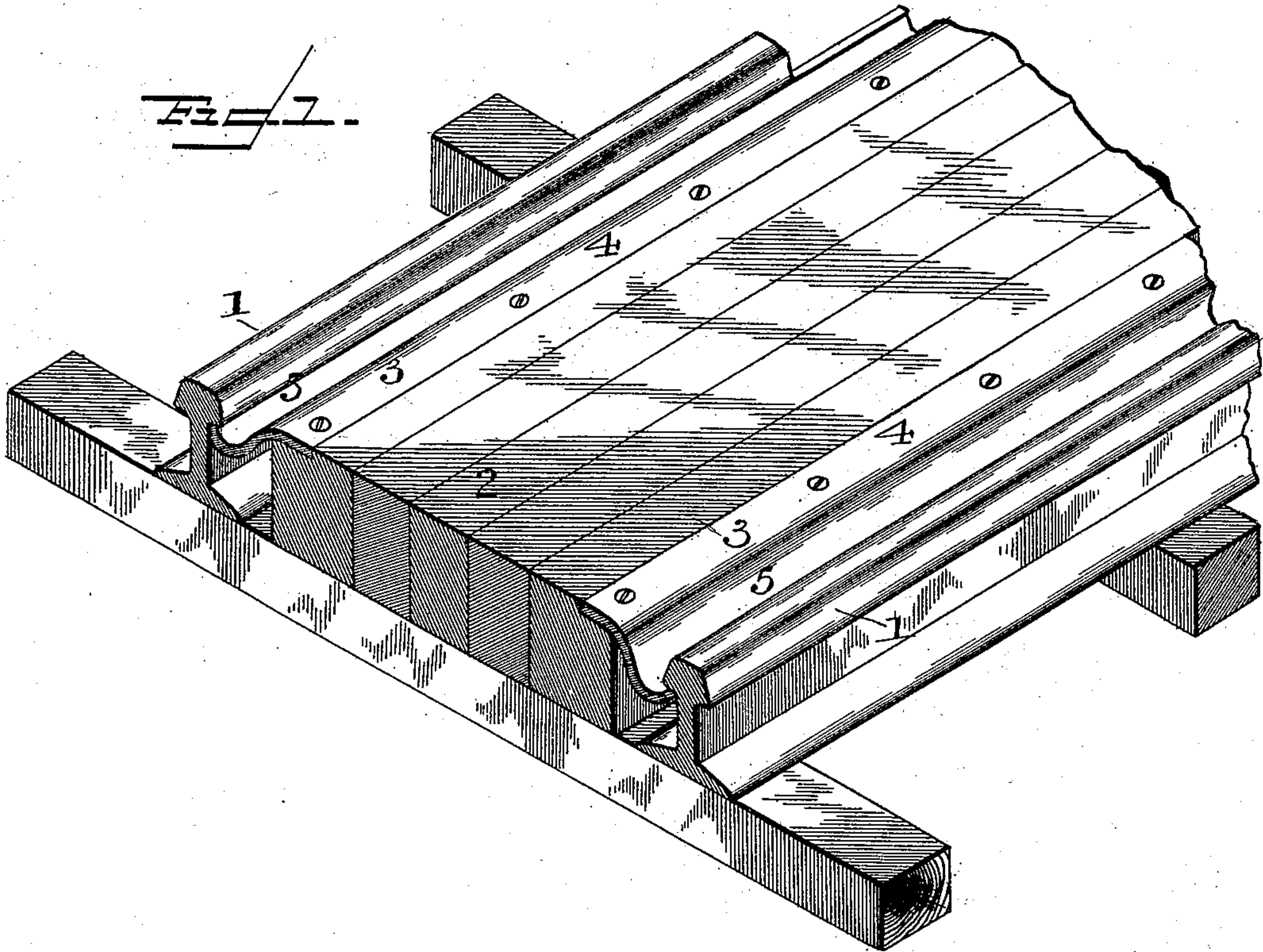


(No Model.)

W. BROWN.  
HORSE HOOF GUARD.

No. 492,621.

Patented Feb. 28, 1893.



WITNESSES  
Frank L. Ourand  
J. B. Bloomer

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Attorneys



# UNITED STATES PATENT OFFICE.

WARREN BROWN, OF EATON, MAINE.

## HORSE-HOOF GUARD.

SPECIFICATION forming part of Letters Patent No. 492,621, dated February 28, 1893.

Application filed November 8, 1892. Serial No. 451,329. (No model.)

*To all whom it may concern:*

Be it known that I, WARREN BROWN, a citizen of the United States, and a resident of Eaton, in the county of Washington and State of Maine, have invented certain new and useful Improvements in Horse-Hoof Guards; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification.

My invention relates to improvements in railroad street crossings, the object being to provide such a construction that there will be no liability of a horse catching his hoof between the rail and the boards laid between the tracks.

In railway street crossings as ordinarily constructed, there is a series of boards laid between the rails, with their surfaces flush with the top of the rails so as to prevent jolting of vehicles crossing the track. These boards extend almost entirely across the track, a space being left between the outer edges of the boards and the inner sides of the rails for the flange of the car wheel to travel in. It frequently happens that the toe of a horse's hoof or shoe, is caught in such space, and before it can be extricated serious injury and damage sometimes result.

The object of my invention is to obviate such objections and provide a construction by which such accidents are impossible, and it consists in the novel construction and combination of parts hereinafter fully described and claimed.

In the accompanying drawings: Figure 1 is a view showing a railway street crossing constructed in accordance with my invention. Fig. 2 is a cross section of the same.

In the said drawings the reference numeral 1 designates the rails, and 2 the boards or planks laid therebetween, their outer edges not extending quite so near to the inner sides of the rails, as in the ordinary construction. Connected with the outer edges of the planks are guard plates 3 of metal each having a flange 4, provided with apertures by which it is bolted or spiked to said boards near the ends, and also intermediate to the ends, and a concavo-convex portion 5, the outer edge of which is adapted to bear against the underside of the rail cap at the inner side thereof. Owing to the peculiar construction of these guard plates, it will be impossible for a horse's hoof or shoe to be caught and held, while it furnishes a space for the flanges of the car wheels.

Having thus described my invention, what I claim is—

In a railway street crossing, the combination with the rails and the intermediate planks or boards, of the horizontal guard plates having flanges secured to said planks and concavo-convex portions adapted to abut against the underside of the rail caps, substantially as and for the purpose described.

In testimony that I claim the foregoing as my own I have hereunto affixed my signature in presence of two witnesses.

WARREN BROWN.

Witnesses:

ERNEST A. DAMON,  
WILLIAM S. NEAL.