

No. 797,939.

PATENTED AUG. 22, 1905.

S. CLARY.
GUARD RAIL.

APPLICATION FILED JAN. 2, 1904.

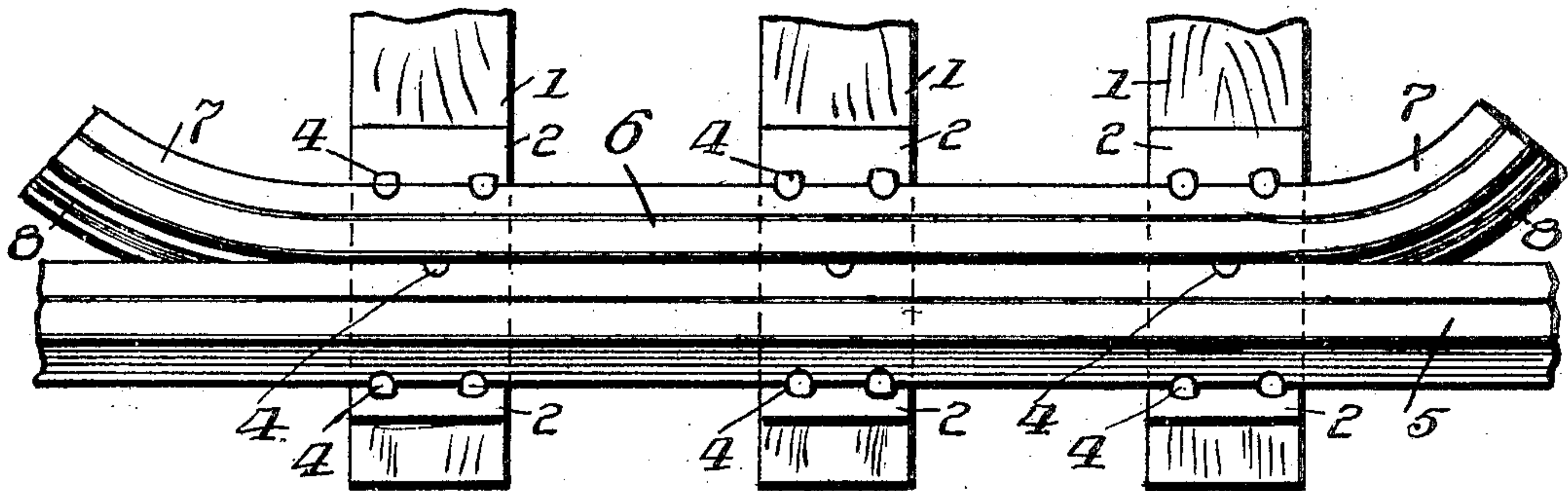


Fig. 1.

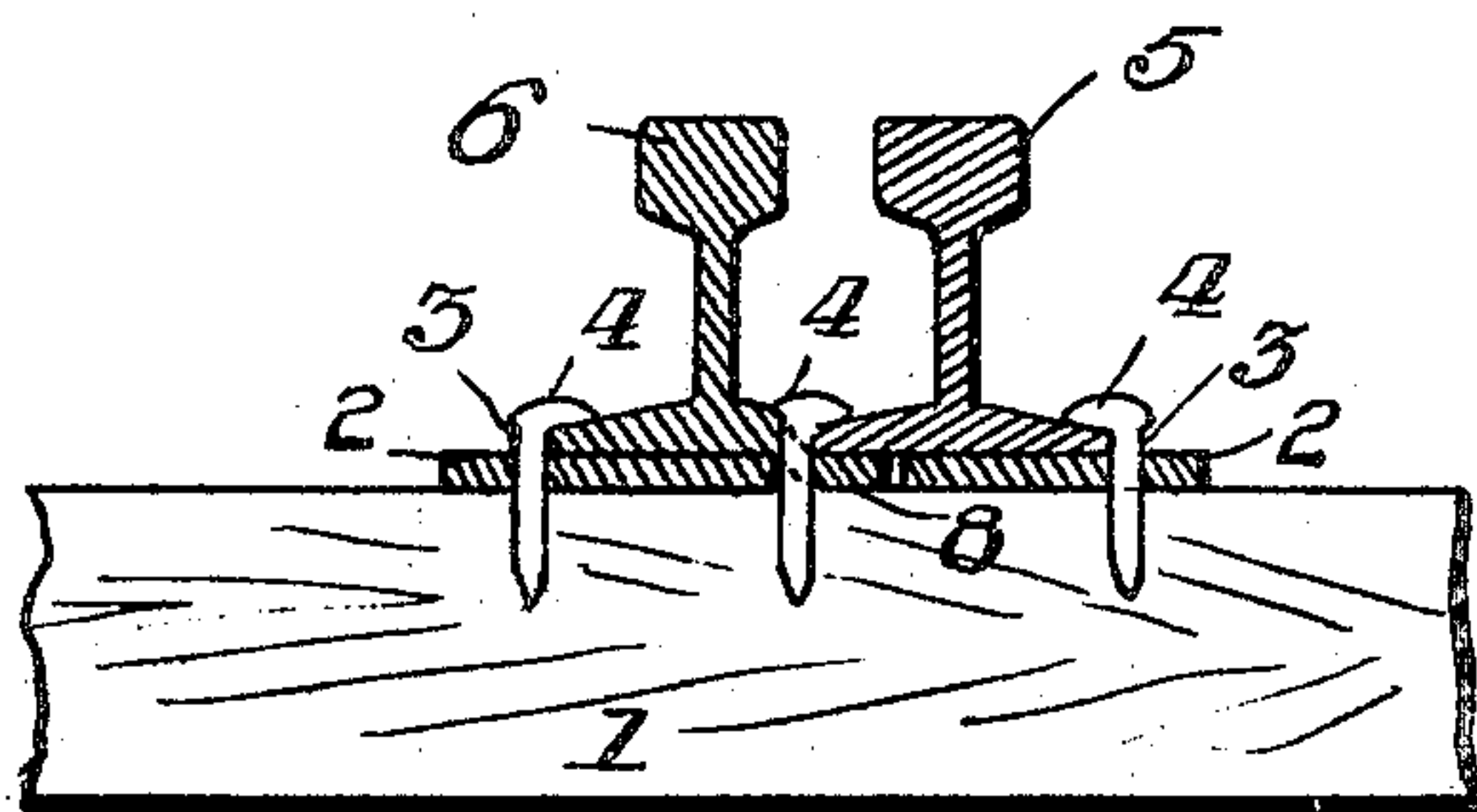


Fig. 2.

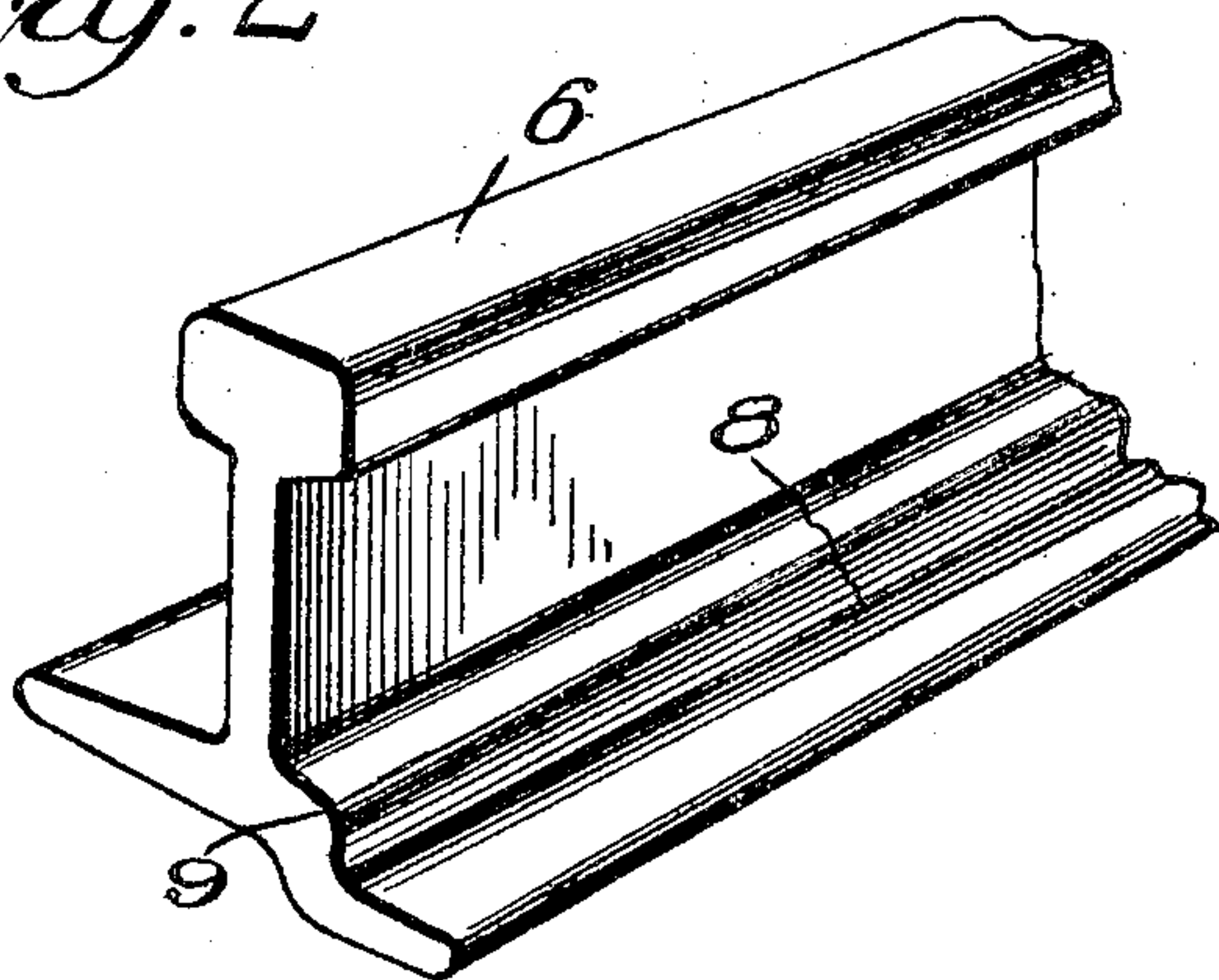


Fig. 3.

Witnesses:
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UNITED STATES PATENT OFFICE.

SIMON CLARY, OF CARNEGIE, PENNSYLVANIA.

GUARD-RAIL.

No. 797,939.

Specification of Letters Patent.

Patented Aug. 22, 1905.

Application filed January 2, 1904. Serial No. 187,398.

To all whom it may concern:

Be it known that I, SIMON CLARY, a citizen of the United States of America, residing at Carnegie, in the county of Allegheny and State of Pennsylvania, have invented certain new and useful Improvements in Guard-Rails, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to certain new and useful improvements in guard-rails, and has for its object the provision of novel means whereby the guard-rail may be securely fastened in a manner that will prevent the same from tilting or tipping.

It is a well-known fact that in railroad construction great difficulties have been experienced in effectually securing the guard-rail in position and that owing to the strain exerted upon the guard-rail the same would become loose, and often accidents result from the inefficient manner in which the guard-rails are applied adjacent to the main rails.

My invention has for its object to overcome all such difficulties; furthermore, to obviate the necessity of shearing the base-flange of the inner side of the rail, as is now the case.

My present invention, briefly described, consists in securing the main rail and guard-rail together by either overlapping or underlapping the treads thereof and retaining the same in a rigid and firm position; furthermore, to provide a seat upon the guard-rail for the reception of the main rail that will permit the treads of these rails to be brought in close proximity to one another for the purpose of obtaining the desired result.

The present invention further consists in the novel construction, combination, and arrangement of parts to be hereinafter more fully described, and specifically pointed out in the claims.

In describing the invention in detail reference is had to the accompanying drawings, forming a part of this application, and wherein like numerals of reference indicate like parts throughout the several views, in which—

Figure 1 is a top plan view of the main rail, partly broken away, and the guard-rail constructed in accordance with my improvements secured thereto. Fig. 2 is a transverse vertical sectional view thereof. Fig. 3 is an enlarged detail fragmentary perspective view of the guard-rail.

In the drawings the reference-numerals 1 represent cross-ties, and 2 represents the tie-plates, having suitable openings 3 formed therein for the reception of spikes 4 or other suitable fastening means.

The main rail is represented by the numeral 5, which is of the ordinary and well-known construction, and 6 is a guard-rail having the usual outturned ends 7. This guard-rail is formed with a peculiar base-flange, which forms a seat 8. This inner flange is provided with a shoulder 9, against which the outer edge of the base-flange carried by the main rail abuts. This seat 8 of the base-flange has also formed therein suitable openings to receive spikes or other fastening means, and I prefer to arrange the spikes as shown in Figs. 1 and 2 of the drawings, the same passing through the seat portion 8 of the guard-rail and thence through the tie-plate into the tie, the heads of the spikes extending over and engaging the upper face of the outer flange of the main rail. It will also be noted that a larger guard-rail could be employed, which will underlap the base-flange of the main rail, if desired.

The many other advantages presented by my improved guard-rail will be readily apparent from the foregoing description, taken in connection with the accompanying drawings.

It will be obvious that various slight changes may be made in the details of construction without departing from the general spirit of my invention.

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

1. A main rail, a guard-rail having a seat formed in its base-flange, the base of said main rail being secured in said seat.

2. A main rail, a guard-rail having a seat formed therein at its base, tie-plates, and fastening means extending through said seat and said tie-plate, substantially as described.

3. A guard-rail having its inner base-flange provided with a seat extending below the line of its outer flange, substantially as described.

4. In combination with a main rail, a guard-rail located adjacent the main rail and having a portion of its base-flange overlapped by the base-flange of the main rail.

5. In combination, a main rail and a guard-rail placed side by side, with the base-flange

of one of the rails overlapping on the base-flange of the other rail.

6. In combination, a main rail and a guard-rail placed side by side, with the base-flange of one of the rails overlapping the base-flange of the other rail, and securing means common to both overlapping and underlapping flanges.

In testimony whereof I affix my signature in the presence of two witnesses.

SIMON CLARY.

Witnesses:

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