

No. 834,536.

PATENTED OCT. 30, 1906.

D. J. RADDICK, JR.
RAILWAY TIE.
APPLICATION FILED NOV. 28, 1905.

Fig. 1.

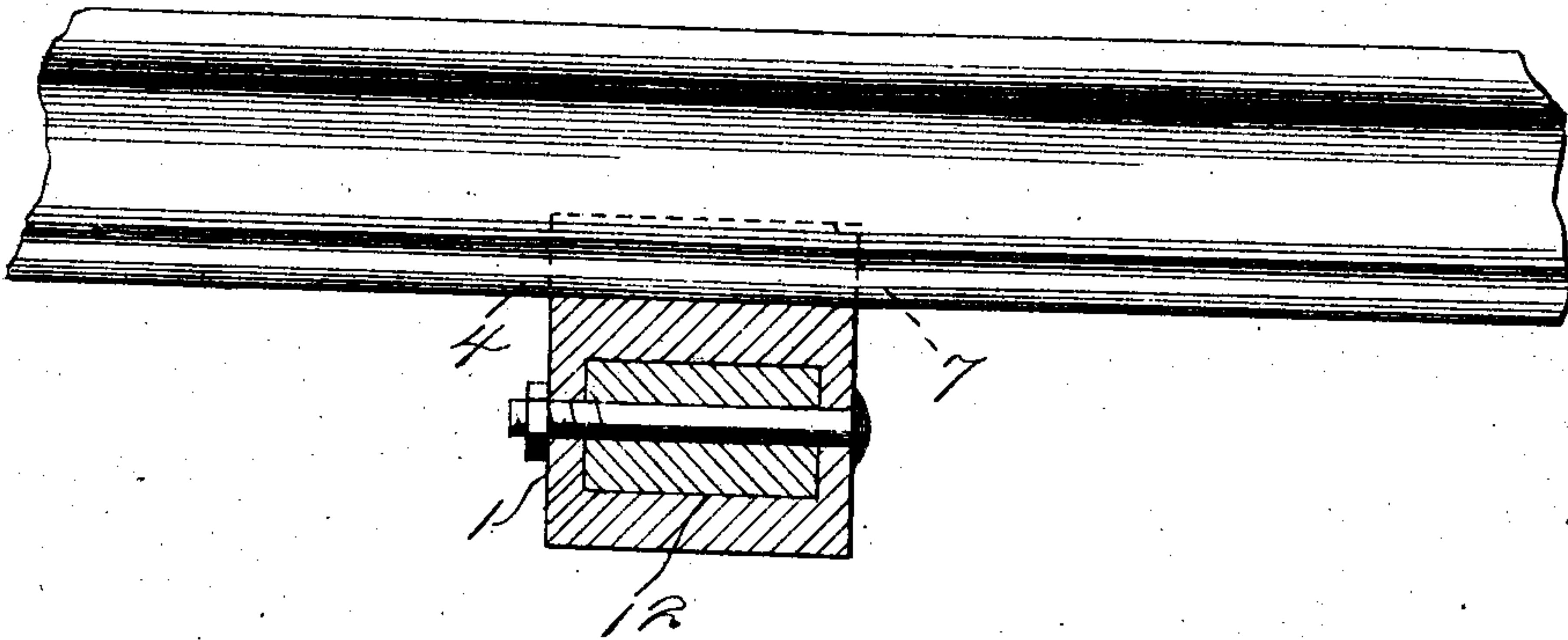
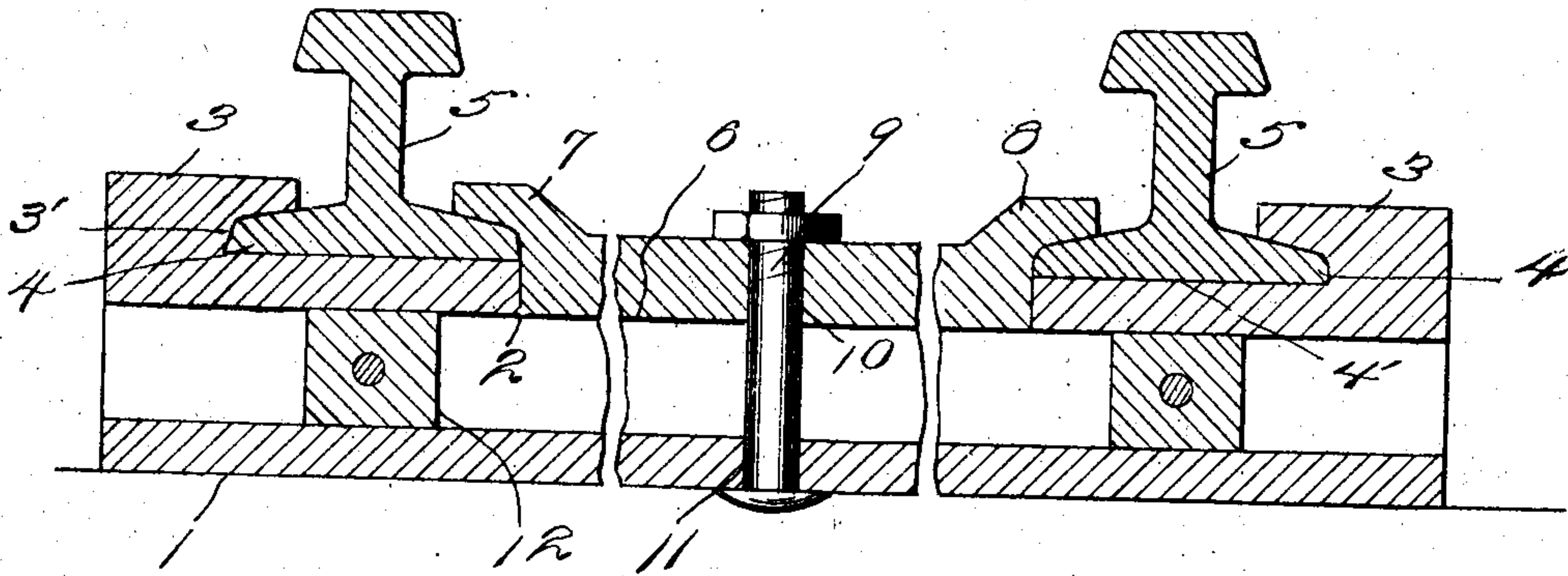


Fig. 2.

Witnesses
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DAVID J. RADDICK, JR., OF NORDHOFF, CALIFORNIA.

RAILWAY-TIE.

No. 834,536.

Specification of Letters Patent.

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To all whom it may concern:

Be it known that I, DAVID J. RADDICK, Jr., a citizen of the United States, residing at Nordhoff, in the county of Ventura, State of California, have invented certain new and useful Improvements in Railway-Ties; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

This invention relates to metallic railway-ties.

One object is to provide an exceedingly simple, inexpensive, durable, and efficient tie.

Another object resides in the provision of a metallic tie embodying such characteristics that lightness will be an essential feature and the rails will be firmly supported upon the ties.

With these and other objects in view the present invention consists in the combination and arrangement of parts hereinafter more fully described, shown in the accompanying drawings, and particularly pointed out in the appended claim, it being understood that changes may be made in the form, proportion, size, and minor details within the scope of the claim without departing from the spirit of the invention or sacrificing any of the advantages thereof.

In the drawings, Figure 1 is a longitudinal sectional view. Fig. 2 is a transverse sectional view.

Referring now more particularly to the accompanying drawings, the reference character 1 indicates a hollow tie, of metal or other suitable material, provided with an opening 2 intermediate its ends, which communicates with the interior of the tie. Formed upon the upper face of the tie at each end thereof is an inwardly-directed lip 3, designed to engage the corresponding side of the base-flange 4 of a rail 5, the inner wall of each lip being undercut to correspond with the usual inclination of the base-flanges of rails.

As shown in Fig. 1, the distance between each end of opening 2 and the inner edge 3' of the undercut portion of the corresponding lip 3 is approximately equal to the width of the base of the rails, thus forming seats 4'

for the latter, the rails resting entirely upon the upper faces of the ties upon such seats.

In order to clamp the rails tightly against the said lips, I provide a clamping-block whose base 6 is of rectangular or other form conforming to the shape of the aforesaid opening in the top of the tie, and provided upon its upper face with raised outwardly-directed lips 7 and 8 at its ends. These lips 7 and 8 have their inner faces inclined to correspond with the inclination of the inner end of the base-flange of the rails, thereby cooperating with the aforesaid lips 3 of the tie, and the clamping-block is designed to fit loosely in the opening 2.

When it is desired to hold rails firmly upon the tie, they are so arranged thereto that the outer edges of the base-flanges of the rails will be engaged with the corresponding lips 3. The clamping-block then has its base 6 disposed in the opening 2 so that the lips of the block will engage the inner edges of the base-flanges of the corresponding rails, the last-named lips resting upon the inner edges of the said flanges to support the clamping-block in said opening 2, although the fingers of the block would prevent its falling through the opening in the event the rail was not between the lips of the tie and block. However, in order to firmly secure the rails in place I provide a suitable bolt 9, which is passed through the perforation 10 of the clamping-block and the alining perforation 11 in the bottom of the tie.

While not absolutely necessary, I arrange two or more blocks within the hollow tie and directly beneath the rails, thereby positively preventing sagging of the upper wall of the tie. If these blocks, which are indicated by the character 12, are used for the purpose stated, they are held in place by means of bolts passed therethrough and the sides of the tie.

What is claimed is—

A railway-tie comprising a hollow member provided with an opening in its upper face intermediate its ends communicating with the interior of the tie, and an inwardly-directed rail-engaging lip at each end; a clamping-block mounted loosely in said opening and provided at each end with an outwardly-directed raised rail-engaging lip for

coöperation with the aforesaid tie-lips, the
portion of the upper face of said tie between
each end of said opening and the lower edge
of the corresponding tie-lip forming a rail-
5 seat; and means passing through the block
and the bottom of the hollow member to pre-
vent accidental displacement of the block.

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

DAVID J. RADDICK, JR.

Witnesses:

M. M. SMITH,
C. B. STEVENS.