

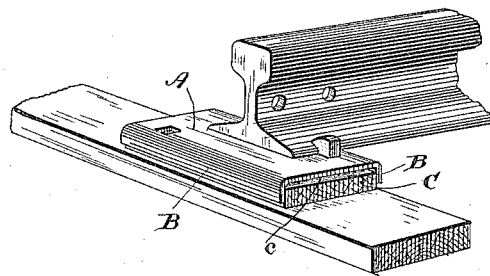
(No Model.)

M. R. PERKINS.  
RAILROAD RAIL CHAIR.

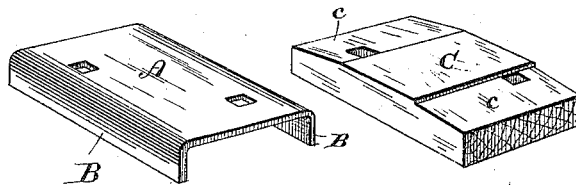
No. 344,920.

Patented July 6, 1886.

*Fig. 1.*



*Fig. 2.*



Witnesses.  
Chas. R. Burr.  
A. J. Stewart.

Inventor.  
Michael R. Perkins.  
by Frank D. Jones.  
his Attorney.

# UNITED STATES PATENT OFFICE.

MICHAEL R. PERKINS, OF PORTSMOUTH, NEW HAMPSHIRE.

## RAILROAD-RAIL CHAIR.

SPECIFICATION forming part of Letters Patent No. 344,920, dated July 6, 1886.

Application filed February 19, 1886. Serial No. 192,516. (No model.)

*To all whom it may concern:*

Be it known that I, MICHAEL R. PERKINS, a citizen of the United States, residing at Portsmouth, in the county of Rockingham and State of New Hampshire, have invented certain new and useful Improvements in Railroad-Rail Chairs; 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.

My invention relates to improvements in railroad-rail chairs, and is more particularly an improvement upon Patent No. 236,354, granted to me January 4, 1881. In the chair described in said patent a block or plate of wood or other suitable material is interposed between a metal plate and the tie, the metal plate bearing upon the entire upper surface of the wooden plate. After a practical test of this chair I find that the compression of the wooden plate is greater directly under the rail than it is on the parts of said plate which project beyond the bottom of the rail, and unless very heavy metal is used the tendency of the upper plate is to turn up at its ends.

The object of my present invention is to prevent the ends of the metal plate from so turning up. This I accomplish by scarfing or beveling the upper surface of the portions of the interposed wooden plate which project beyond the bottom of the rail.

This improvement I will now more particularly point out and describe, reference being had to the accompanying drawings, in which—

Figure 1 is a perspective showing my invention in use, and Fig. 2 a perspective of the two parts forming my invention.

Referring to said drawings, A represents a metal plate provided with openings for spikes, and having downwardly-projecting side flanges, B B, of any required length.

C represents a block or plate of wood or other suitable material, made to fit snugly between the flanges B B and extend below said flanges a suitable distance. This plate C is provided with openings corresponding to those in the metal plate A to receive the spikes.

In using the chair the plate C is placed upon a tie, as shown in Fig. 1, the length of the plate being parallel to the length of the tie.

The plate A fits over the plate C, and the rail rests on the plate A between the spike-holes. Spikes are then driven through the openings in both plates, and hold both the rail and chair on the tie. It will be seen that the ends of both plates project on either side beyond the bottom of the rail.

So far as described the chair is substantially the same as that covered by Patent No. 234,356.

My improvement consists in scarfing or beveling the upper surface of the ends of the plate C at *c c*, being the parts of the upper surface of said plates which project beyond the bottom of the rail, the depth of the bevel or scarf varying with the different kinds of material used. Thus the ends of a hard-wood plate are beveled less than a soft-wood plate, as the compression of the center of the plate is not so great when made of hard wood as when made of soft wood, my object being to scarf or bevel the ends of the plate C to such a depth that when the center of said plate has been compressed to its full extent the ends of the plate A will rest on the beveled or scarfed ends of said plate C, and will not be turned up.

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

1. A chair for railroad-rails, consisting of a metal plate covering and partially inclosing a plate of wood or other suitable material, having the upper surface of its ends scarfed or beveled and intervening between the metal plate and the cross-tie, substantially as shown and described.

2. A chair for railroad-rails, consisting of a metal plate provided with a wooden plate intervening between the metal plate and cross-tie, and having the upper surface of its ends scarfed or beveled, substantially as shown and described.

3. The combination of the plate A, having flanges B B, plate C, having scarfed or beveled ends *c c*, and the spikes and cross-tie, substantially as shown and described.

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

MICHAEL R. PERKINS.

Witnesses:

SAMUEL W. EMERY,  
HORACE B. RAND.

Correction in Letters Patent No. 344,920.

It is hereby certified that in Letters Patent No. 344,920, granted July 6, 1886, upon the application of Michael R. Perkins, of Portsmouth, New Hampshire, for an improvement in "Railroad-Rail Chairs," an error appears in the printed specification requiring the following correction, viz: In line 63, page 1, the number of the patent referred to therein should read *236,354* instead of "234,356;" and that the Letters Patent should be read with this correction therein to make it conform to the record of the case in the Patent Office.

Signed, countersigned, and sealed this 27th day of July, A. D. 1886.

[SEAL.]

H. L. MULDROW,  
*Acting Secretary of the Interior.*

Countersigned:

M. V. MONTGOMERY,  
*Commissioner of Patents.*