

(No Model.)

W. M. BROWN.  
BRACE CHAIR FOR RAILROAD RAILS.

No. 477,641.

Patented June 28, 1892.

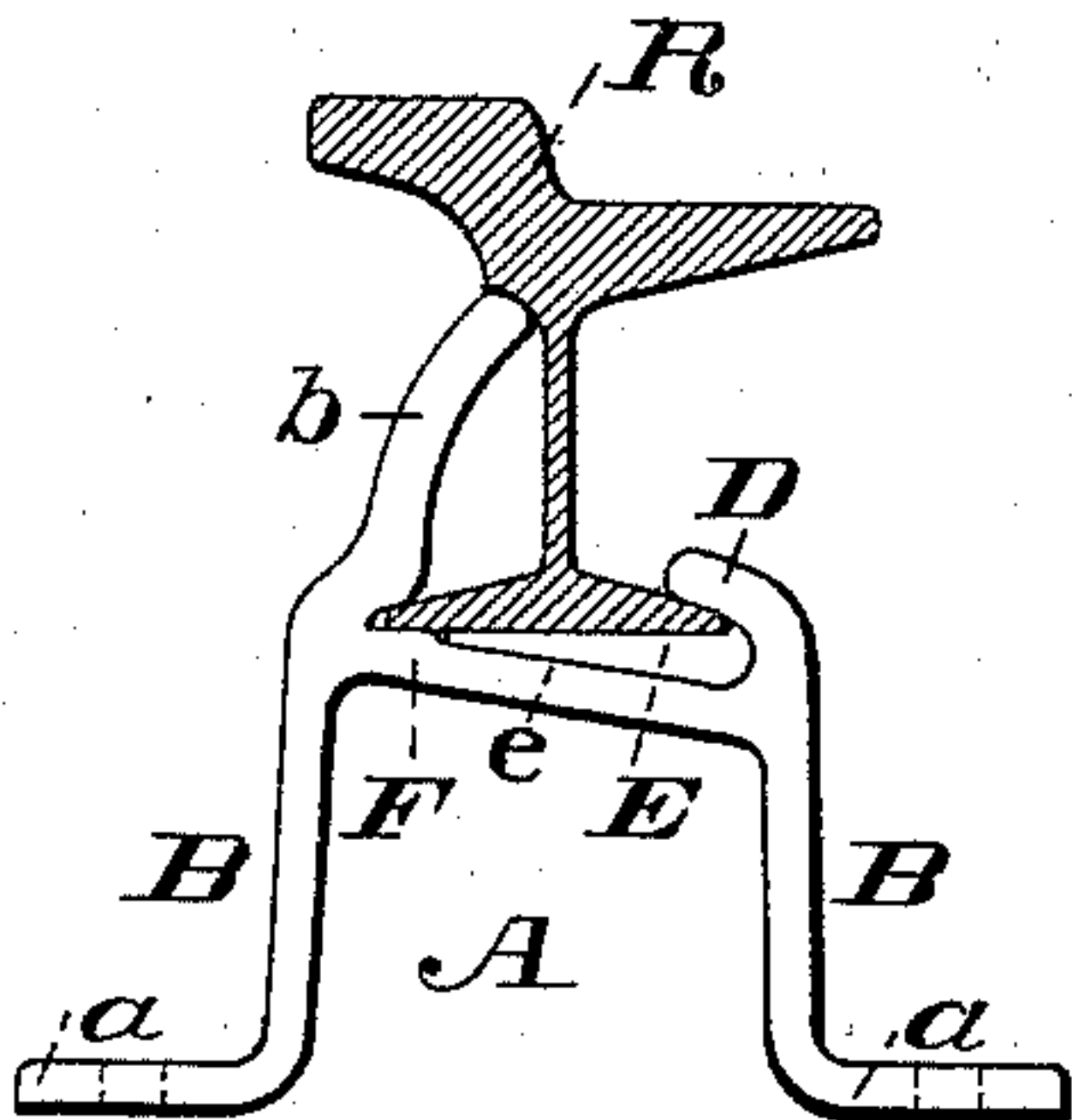


Fig. 1.

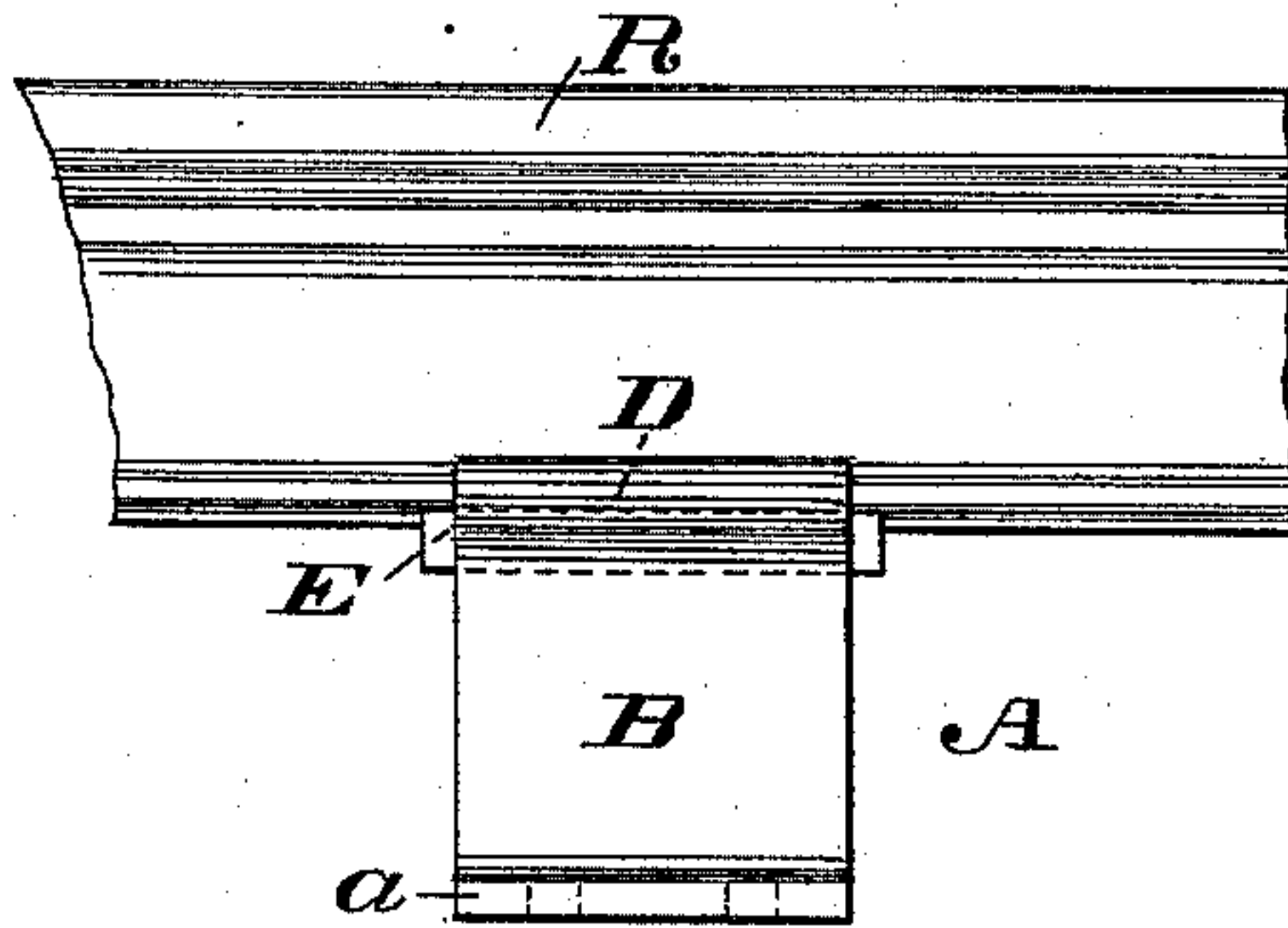


Fig. 2.

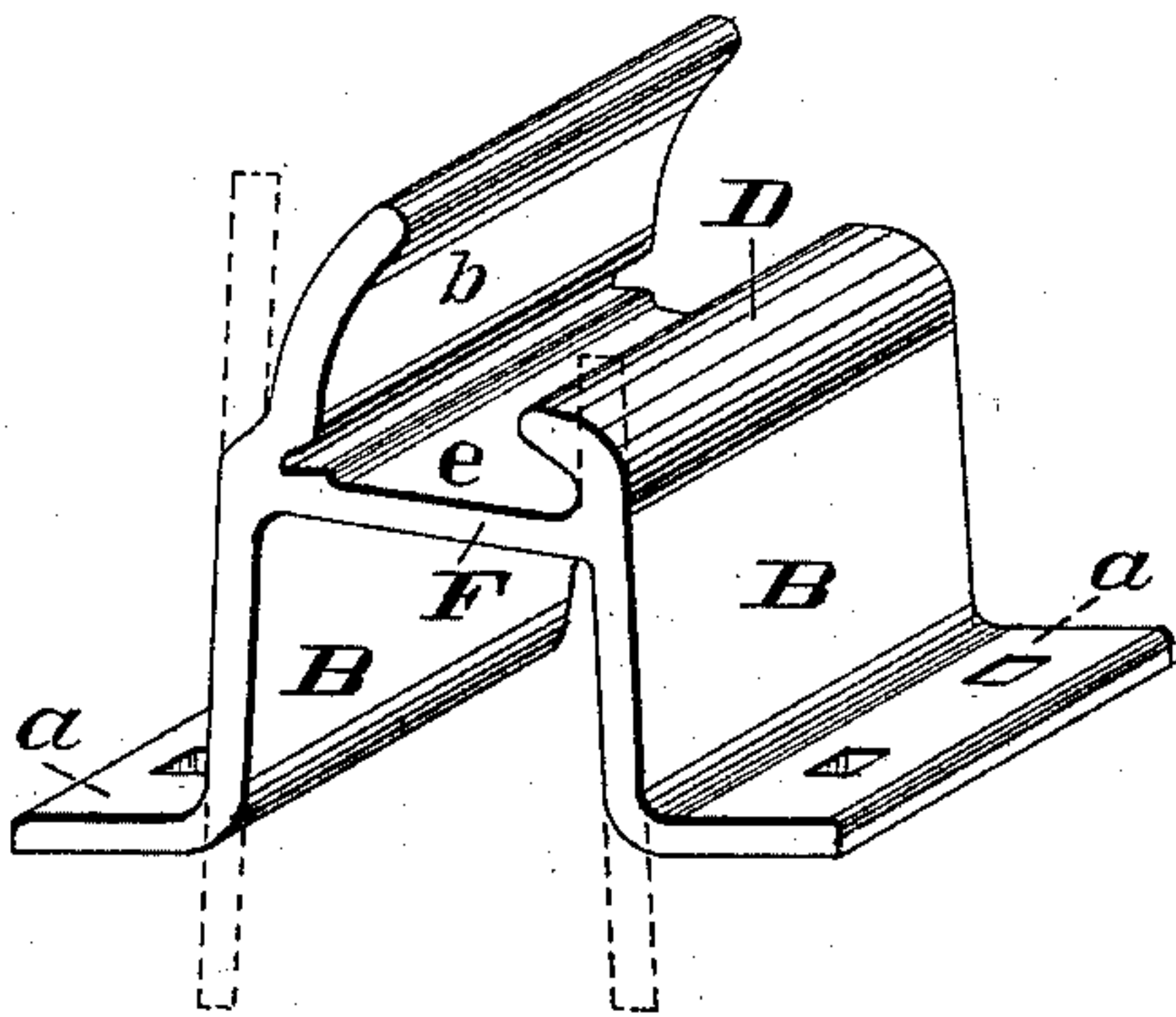


Fig. 4.

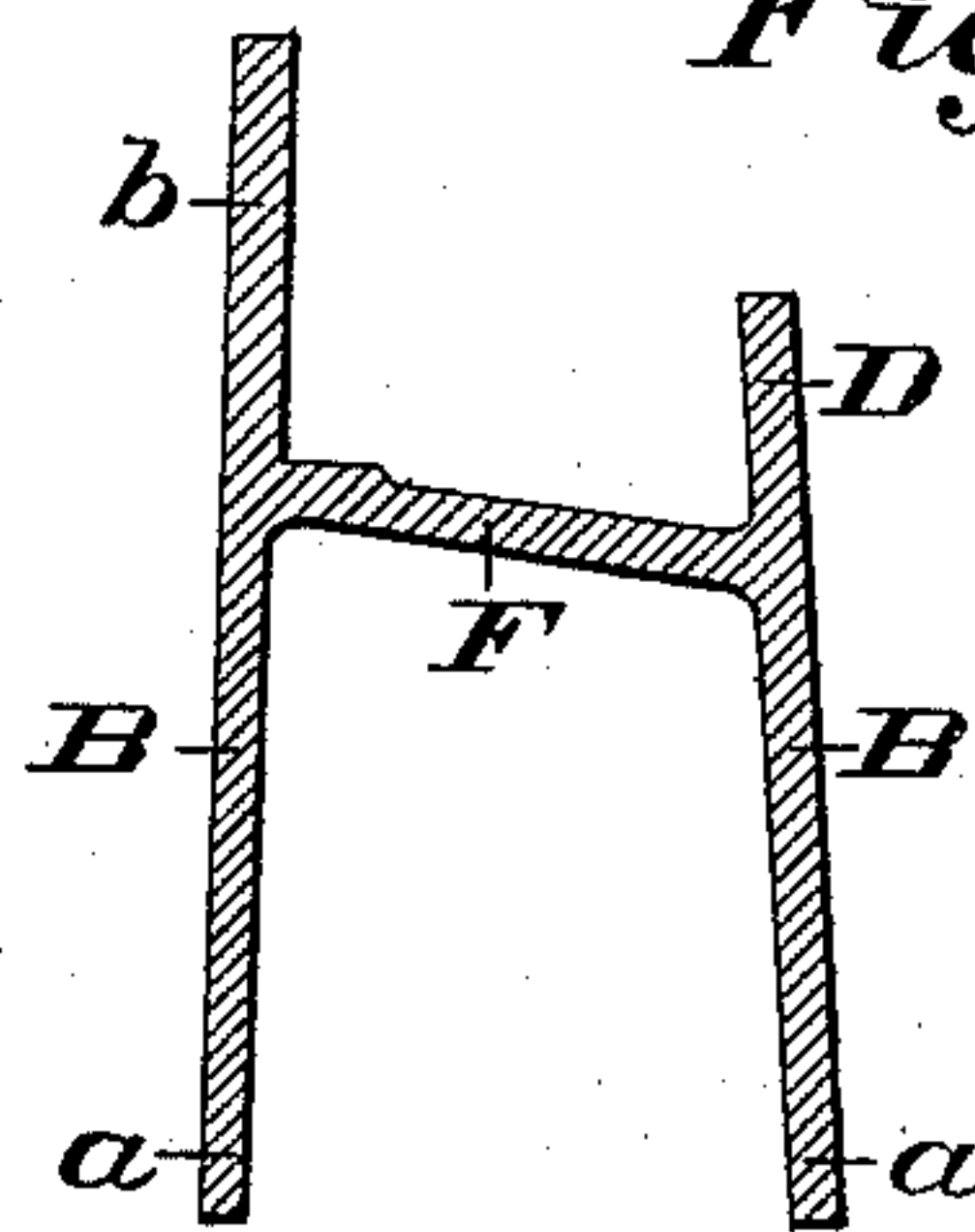


Fig. 5.

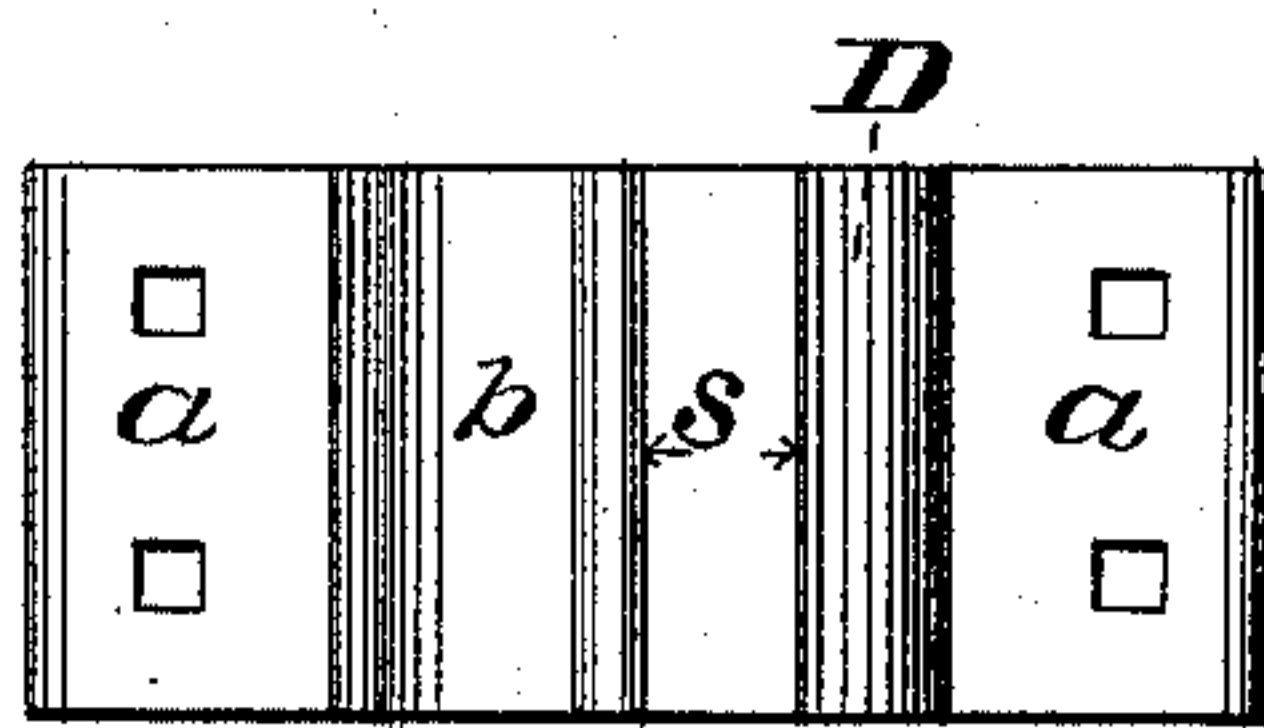


Fig. 3.

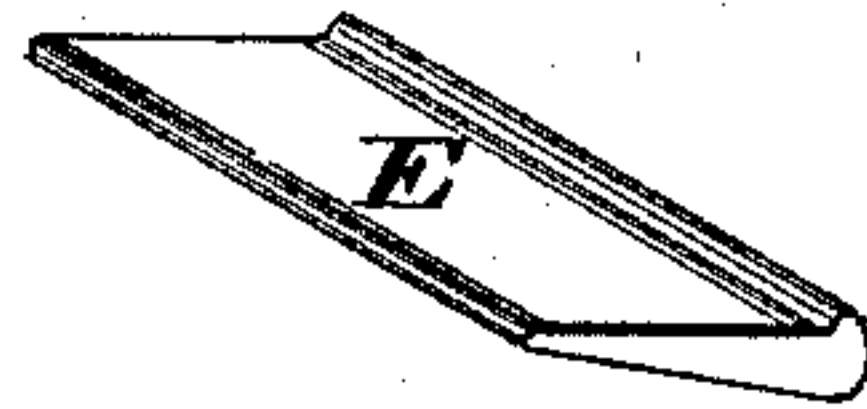


Fig. 6.

WITNESSES:

Francis P. Reilly,  
J. H. Davis.

INVENTOR

W. M. Brown

BY

R. M. Woodhull

ATTORNEY

# UNITED STATES PATENT OFFICE.

WILLIAM MILTON BROWN, OF JOHNSTOWN, PENNSYLVANIA, ASSIGNOR TO  
THE JOHNSON COMPANY, OF SAME PLACE.

## BRACE-CHAIR FOR RAILROAD-RAILS.

SPECIFICATION forming part of Letters Patent No. 477,641, dated June 28, 1892.

Application filed February 20, 1890. Serial No. 341,122. (No model.)

*To all whom it may concern:*

Be it known that I, WILLIAM MILTON BROWN, of Johnstown, in the county of Cambria and State of Pennsylvania, have invented  
5 a new and useful Brace-Chair for Railroad-Rails, which invention is fully set forth and illustrated in the following description and accompanying drawings.

The object of this invention is sufficiently  
10 indicated by its title.

The invention will first be described in detail, and then particularly set forth in the claims.

In the accompanying drawings, Figure 1  
15 illustrates the chair in end elevation with a rail shown in cross-section in place thereon. Fig. 2 illustrates the parts shown in Fig. 1 in side elevation. Fig. 3 is a view in plan of the chair. Fig. 4 is a perspective view of the  
20 chair, showing in dotted lines the shape or form of the metal blank out of which the chair is preferably made. Fig. 5 shows said metal blank in cross-section geometrically. Fig. 6 illustrates in perspective the wedge or  
25 key, which is used to secure the rail and chair together, as the same are used when laid in track.

In said figures the several parts are indicated by reference-letters, as follows:

30 The letter A indicates the chair proper; *a*, the feet of the chair; B B, the vertical sides of the chair; *b*, the rail-supporting brace; D, a side clip for the rail; *e*, the space left between the lower flange of the rail and the  
35 chair when the rail R, Fig. 1, is in place, which space is filled by the wedge or key E.

The letter *s* in Fig. 3 shows the space in plan between the inner edges of the brace *b* and the clip D.

In Fig. 5 the parts lettered to show the parts 40 of the metal blank are correspondingly shown by similar letters in the places which they respectively occupy in the other figures of the finished chair.

This chair and the rail R are firmly clamped 45 together by the driving in of the wedge or key E, as seen in Fig. 1, which operation brings the brace *b* to a bearing under the head of the rail and the lower flange of the rail up to a tight fit under the clip D and in the bend 50 at the base of the brace *b*.

It is evident that the brace *b* may fit snugly against the outside upper portion of the rail, if so desired, or it may be of any shape that does not interfere with the proper entry of 55 the chair upon the rail. I do not, therefore, limit myself to the exact shape of brace shown. It is also evident that the angular floor portion F of the chairs could be rolled square or horizontal, instead of inclined, as shown, and 60 then made oblique or inclined by a subsequent shaping process.

Having thus fully described my said improved rail-chair, as of my invention I claim—

1. A box-chair for girder-rails, provided with 65 a side rail-brace, an inclined floor, and a wedge-shaped piece, as E.

2. A box-chair for girder-rails, provided with a side brace, as *b*, a side clip, as D, an inclined floor, as F, and a wedge-shaped piece, as E, 70 as and for the purposes set forth.

W. MILTON BROWN.

Witnesses:

W. F. SALTMARSH,  
S. H. BELL.