

(No Model.)

F. S. GUERBER.

BRACE AND SLIDE PLATE FOR RAILWAY SWITCHES.

No. 477,535.

Patented June 21, 1892.

FIG. 1.

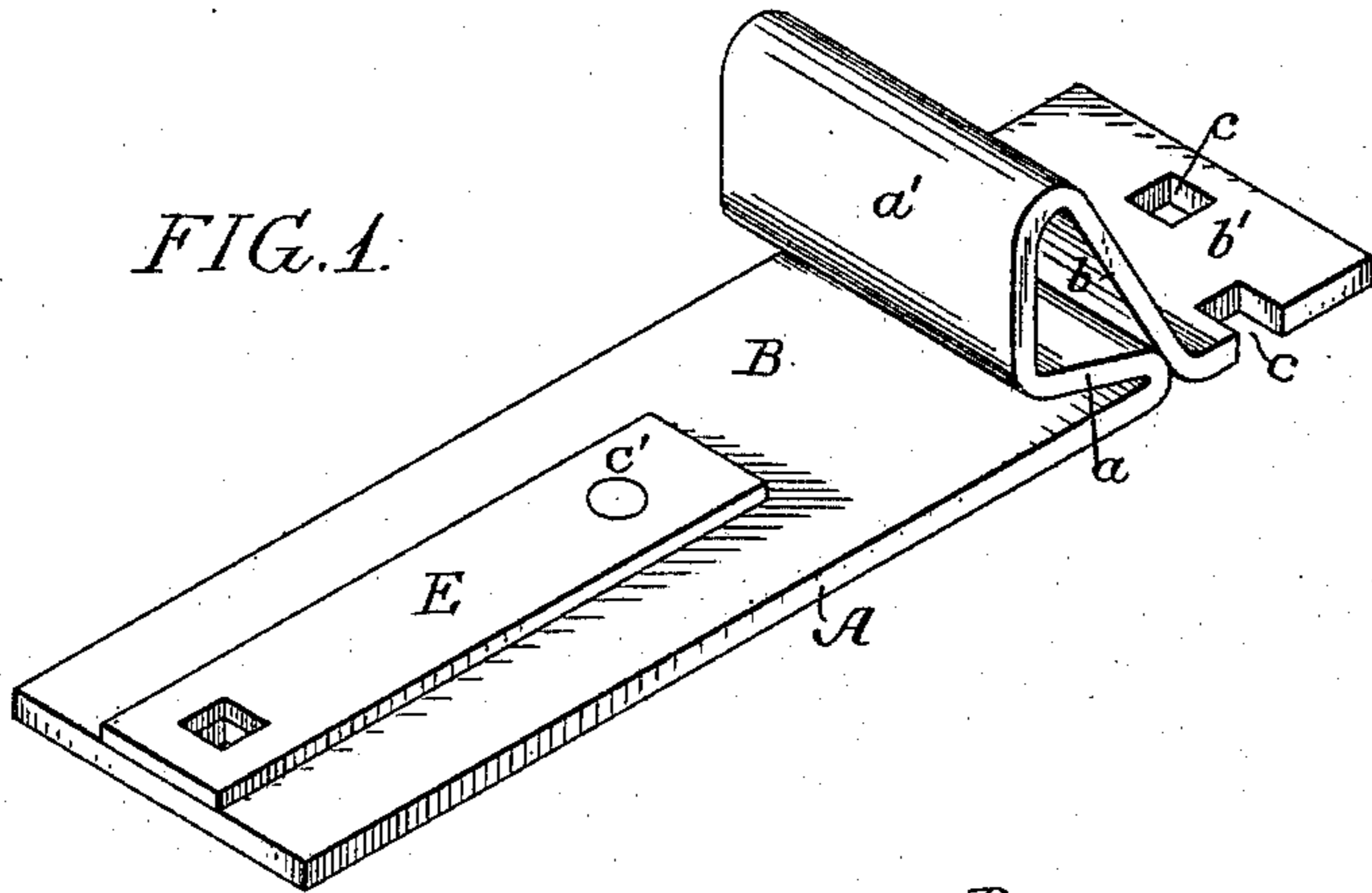


FIG. 2.

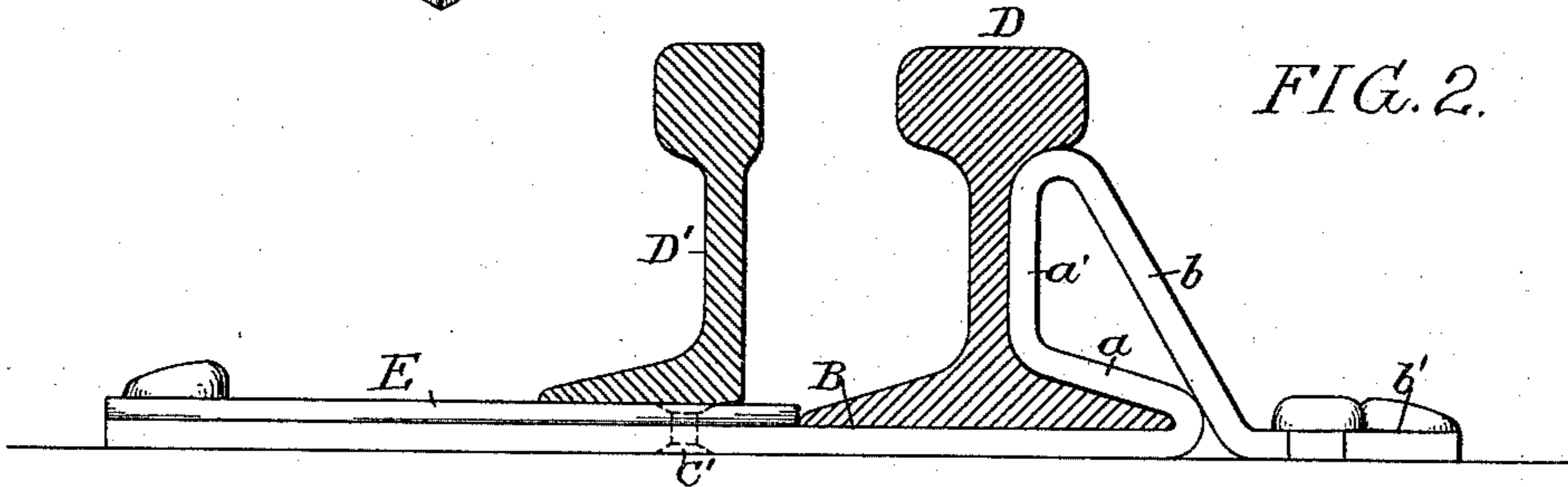


FIG. 3.

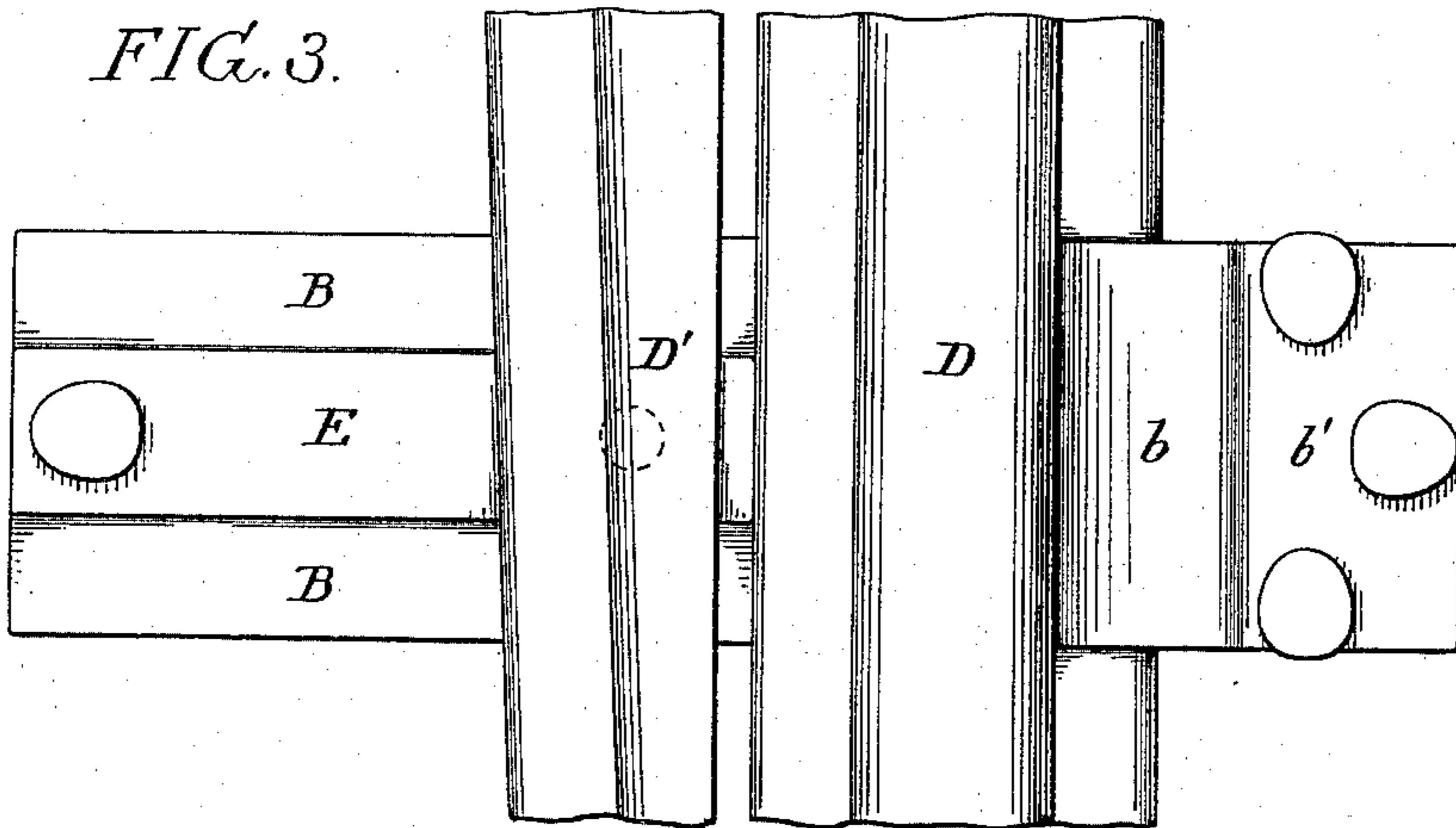


FIG. 5.

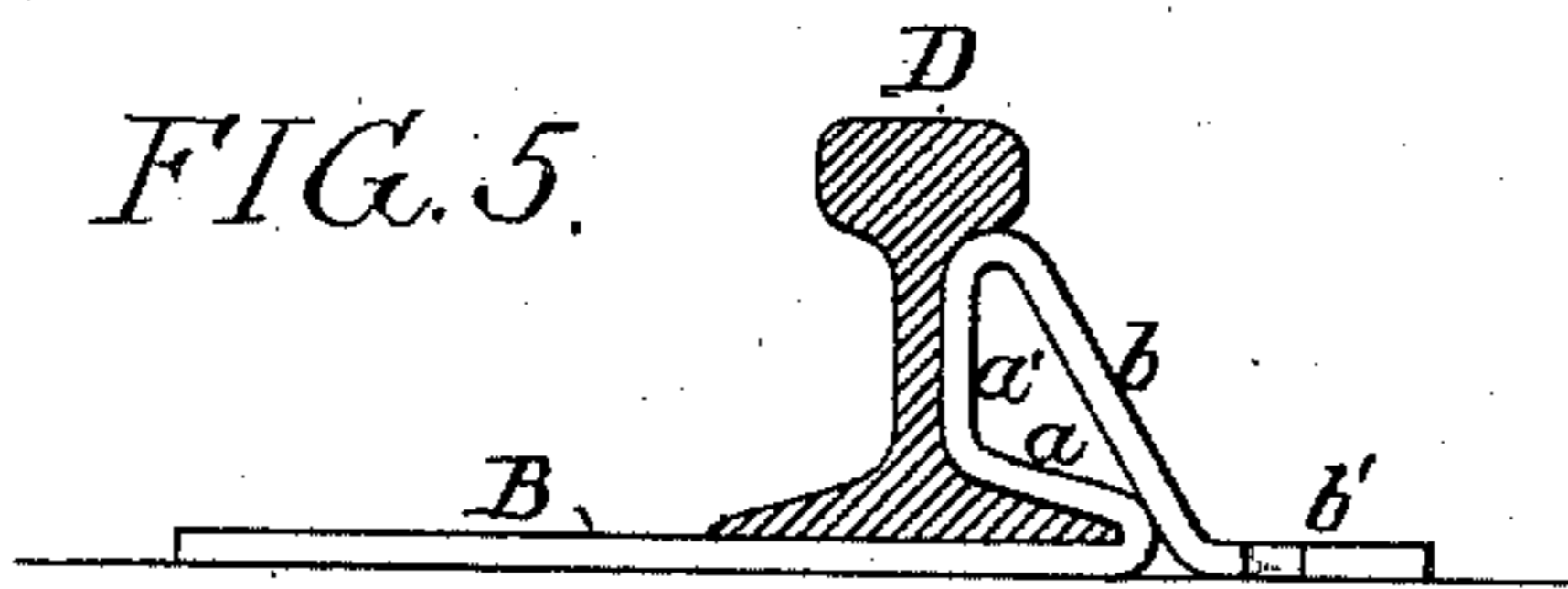
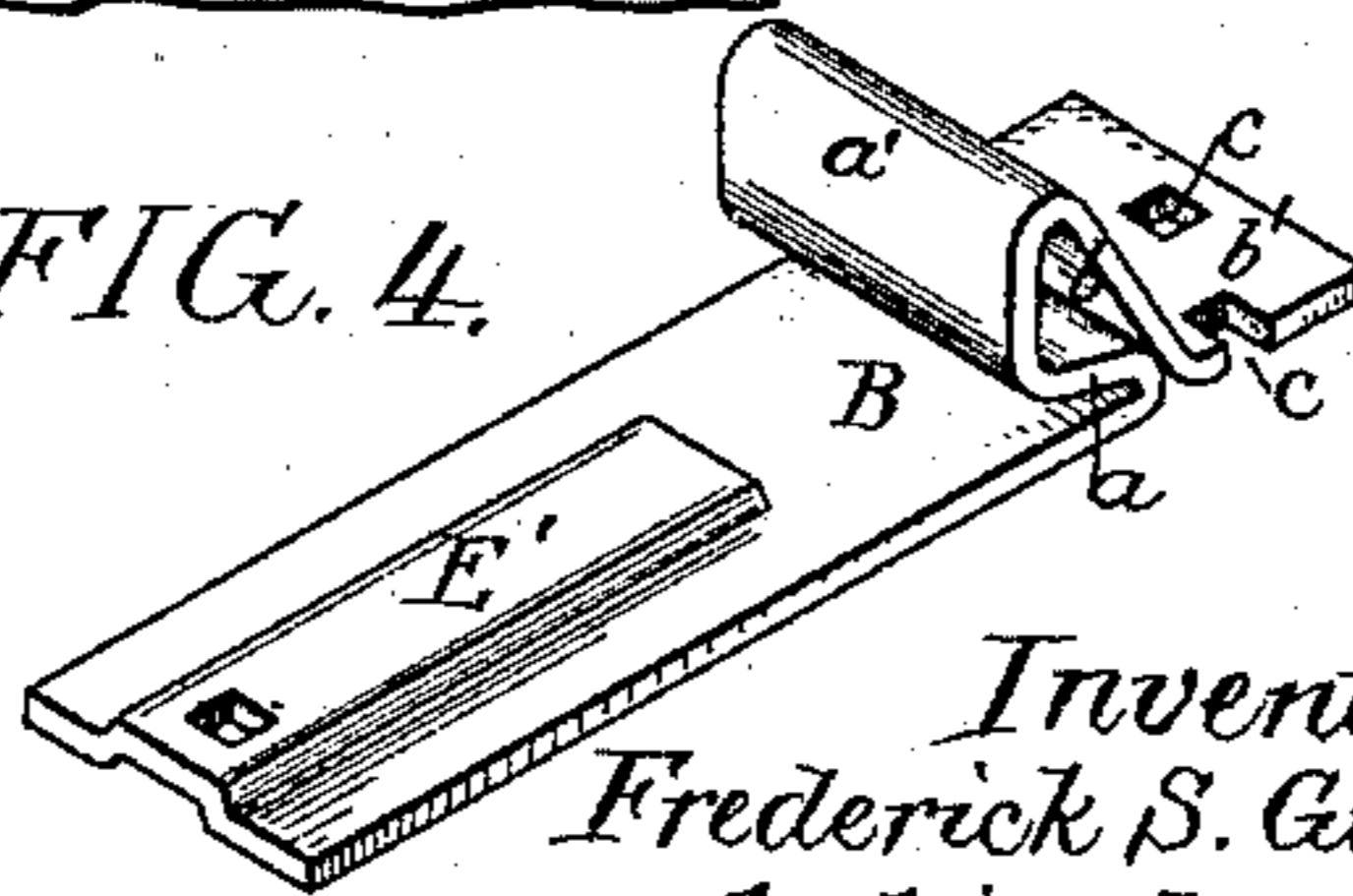


FIG. 4.

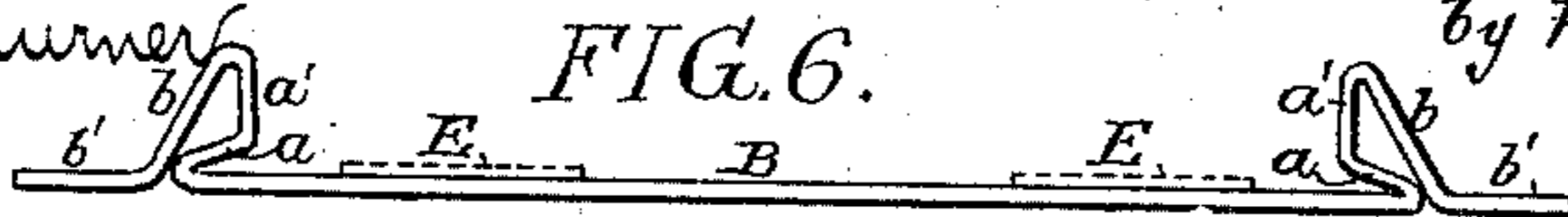


Witnesses:

Hamilton D. Turner

Wm. D. Bonner

FIG. 6.



Inventor:
Frederick S. Guerber
by his Attorneys

Howe & Howe

UNITED STATES PATENT OFFICE.

FREDERICK S. GUERBER, OF ALLENTOWN, PENNSYLVANIA.

BRACE AND SLIDE PLATE FOR RAILWAY-SWITCHES.

SPECIFICATION forming part of Letters Patent No. 477,535, dated June 21, 1892.

Application filed November 17, 1891. Serial No. 412,183. (No model.)

To all whom it may concern:

Be it known that I, FREDERICK S. GUERBER, a citizen of the United States, and a resident of Allentown, Lehigh county, Pennsylvania, have invented certain Improvements in Brace and Slide Plates for Rails of Switches, &c., of which the following is a specification.

The object of my invention is to make a combined slide-plate and rail-brace for switches, &c., which can be economically manufactured and which will fit the rail to which it is applied.

In the accompanying drawings, Figure 1 is a perspective view of my improved slide-plate and rail-brace. Fig. 2 is a sectional view showing the application of my improvement to switch-rails. Fig. 3 is a plan view of Fig. 2. Fig. 4 is a perspective view of a modification. Fig. 5 is a sectional view of another modification, and Fig. 6 is a side view of a double brace-plate.

Heretofore in the manufacture of slide-plates and rail-braces the two parts have been made independently of each other and locked together in any suitable manner.

Referring to the drawings, A is a plate of sheet metal, which has a base portion B, on which rests the main rail D. The plate is bent to form portions *a a'*, the portion *a* hugging one base-flange of the rail and the portion *a'* extending up along the web of the rail, terminating at the head. The plate is then bent so as to form an incline-brace *b*, and again bent to form a foot *b'*, in which are the spike-holes *c* for the spikes which secure the brace-plate to the tie. The base B extends inward beyond the rail D, and has a plate E secured thereto by a rivet *c'* and by the inner securing-spike. On the plate E slides the

point-rail D' of the switch, and this plate also abuts the inner flange of the rail D and prevents it from moving transversely.

In Fig. 4 I have shown a projection E', struck up from the body B of the slide-plate A, which is for the same purpose as the plate E. In Fig. 5 I have shown my invention used simply as a brace and rail plate for supporting the rail on the ties and preventing the rail from spreading. This device is used mostly at turn-outs or at curves where the transverse strains are increased.

In Fig. 6 I have shown a double brace-plate extending across the track under the two rails. The plate acts as a gage and also prevents the rails from spreading. The plates E may be secured to the plate A, as shown by dotted lines, when used at the switch.

The process of making the above-described plate and brace is set forth in an application filed by me and bearing even date herewith.

I claim as my invention—

A combined slide-plate and brace consisting of a portion extending under the main rail and provided in that portion on the inner side of said rail with a slide-plate and having the portion at the outer side of the rail bent to conform to the side of said rail, the remaining portion of said outer end being bent downwardly, forming a brace and foot, substantially as specified.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

FREDERICK S. GUERBER.

Witnesses:

HENRY HOWSON,
EUGENE ELTERICH.