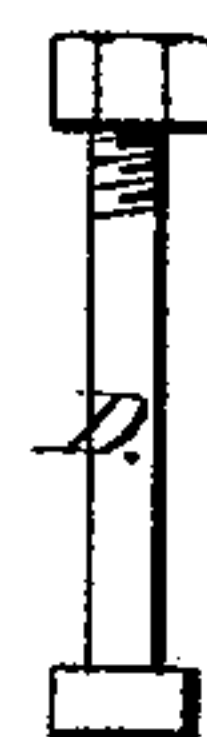
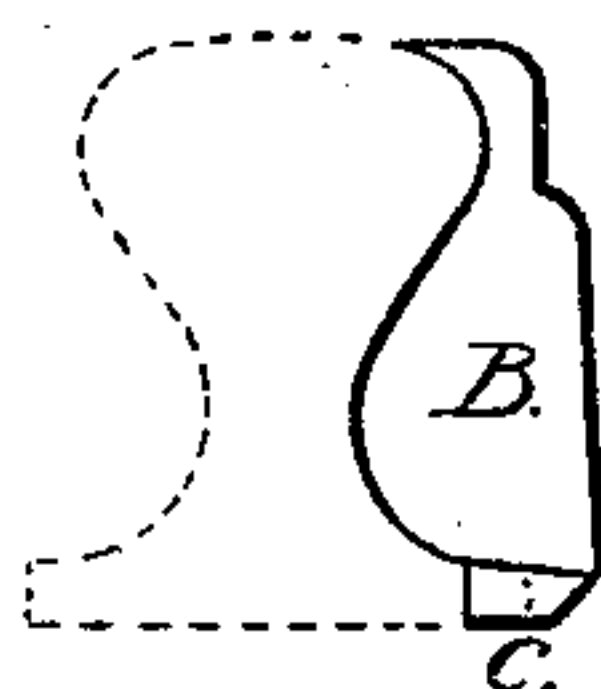
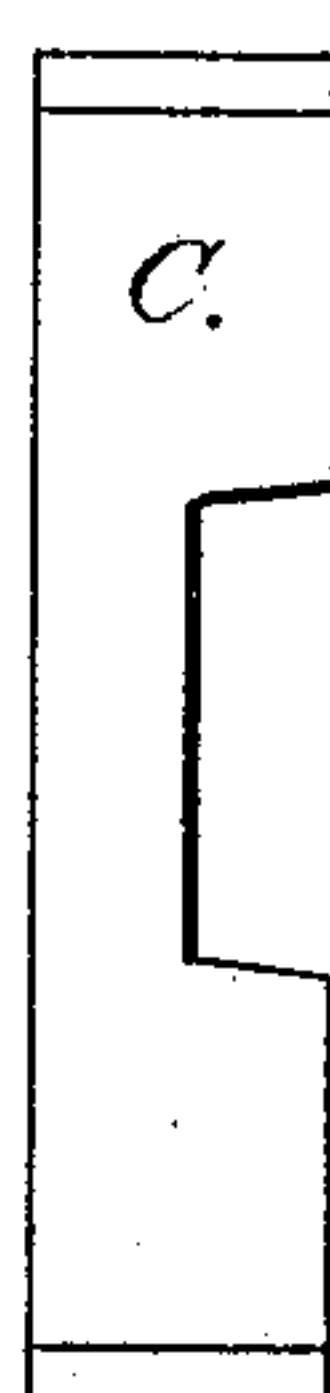
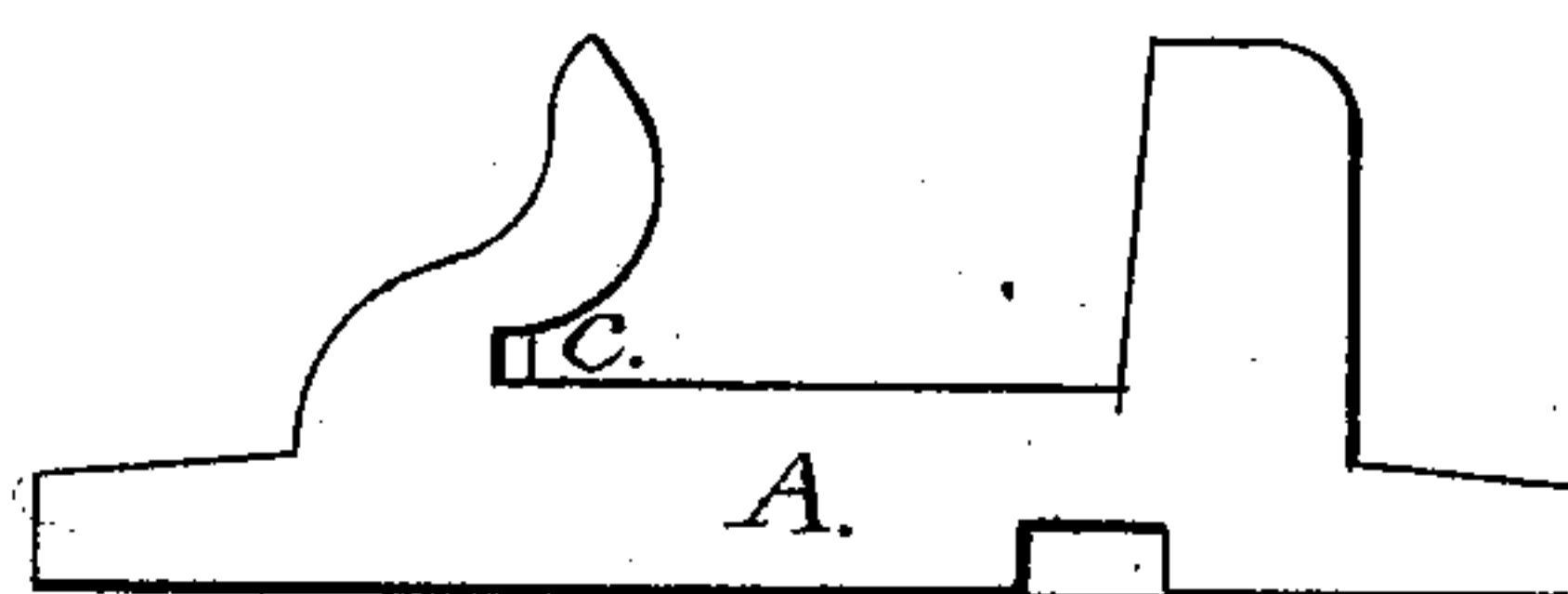
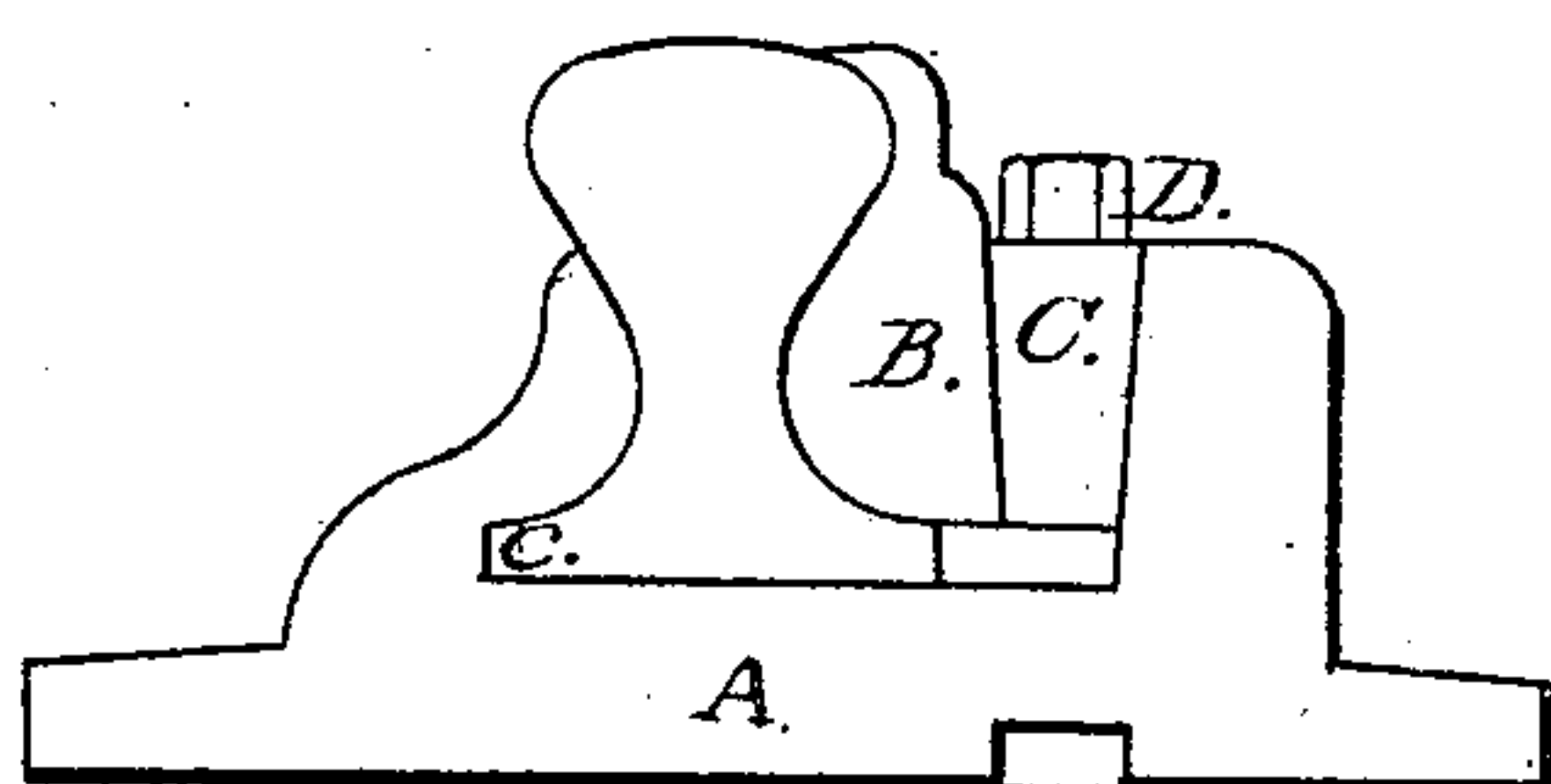
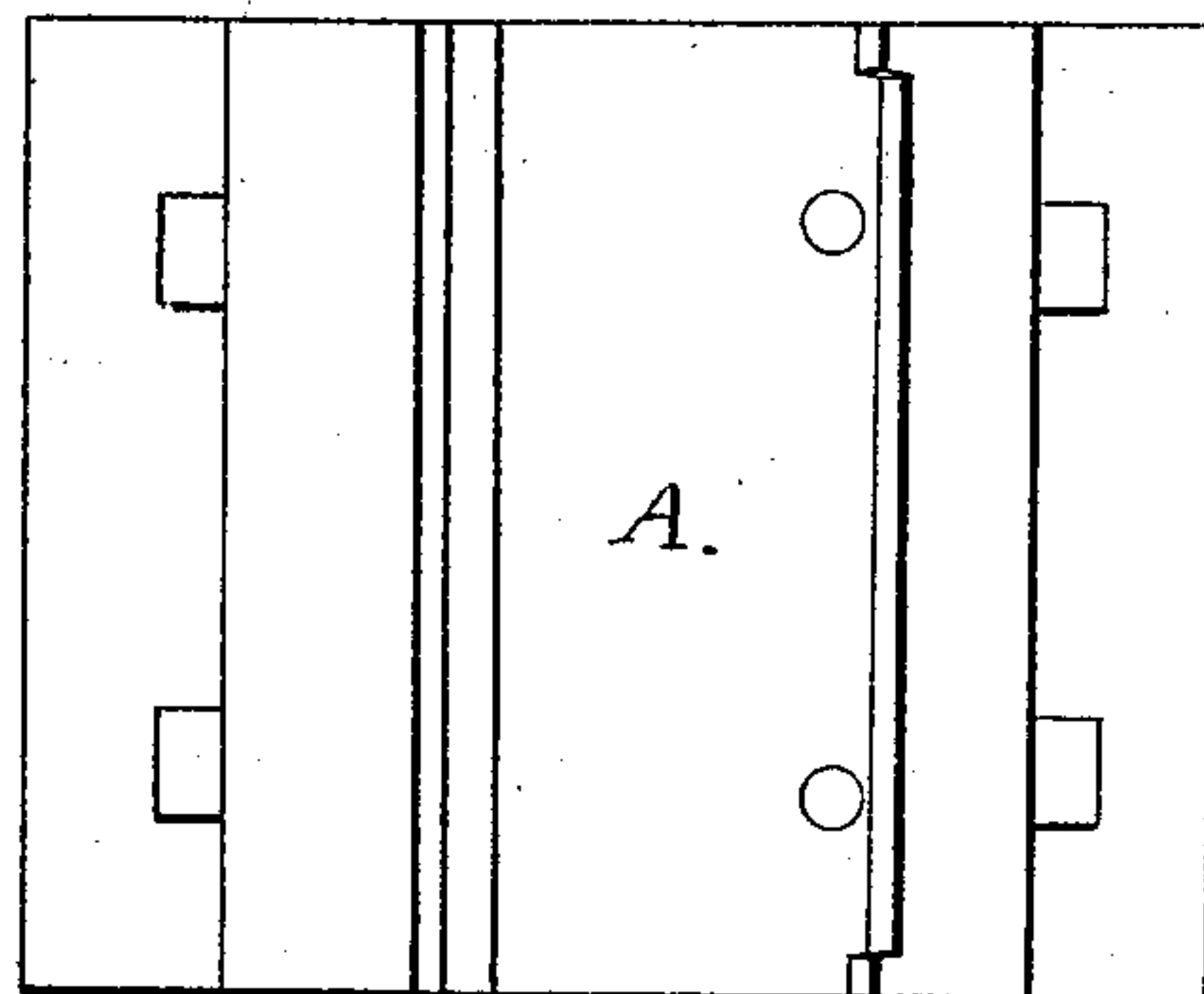
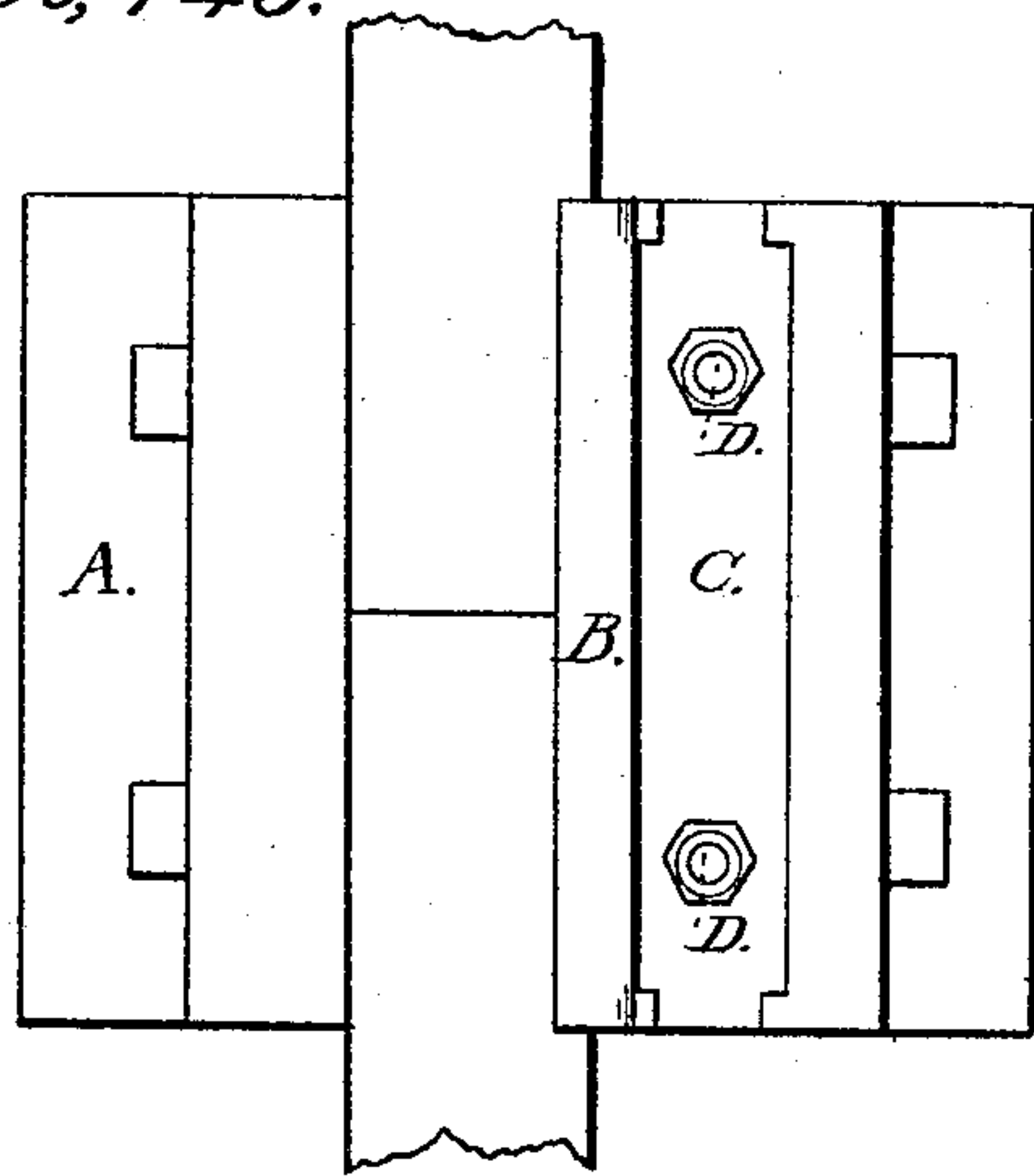


C. A. Harris.

Railroad Chair.

N^o 90,745.

Patented Jan. 1, 1869.



Witnesses:

A. W. Foy
J. E. Jones

Inventor:

Chas. Harris



CHARLES A. HARRIS, OF OWEGO, NEW YORK

Letters Patent No. 90,745, dated June 1, 1869.

IMPROVED RAILWAY-CHAIR.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, CHARLES A. HARRIS, of the town of Owego, county of Tioga, and State of New York, have invented a new and useful Improvement in Chairs for Railroads; and I do hereby declare that the following is a full and exact description of the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon.

In the accompanying drawings—

A shows the base or body of the chair.

B is a false side, conforming, on one side, to the side of the rail.

C shows a drop-block, filling a space between the false side B and an upright part of the piece A, which is held down by one or more bolts, D.

The same letters refer to like parts.

In this chair, the rail sits in the bottom of the chair proper, in the usual manner, one side conforming to the shape of the rail, and rising well up under its tread or top. Opposite is a false side, B, also fitting the side of the rail, and rising even with its top.

The false side is held up to the rail, by means of a taper drop-block, C, which is held down by one or more bolts, D, which, being screwed up, the false side is moved up to the rail, compressing it sufficiently, and high enough to prevent its being crushed down.

If the bolts were broken, or even withdrawn, the

rails would still be held securely; the weight of the drop-block, and the manner in which it is enclosed, would prevent it from moving, and allow the false side to become displaced.

There are four small projections, *c c*, which enter the notches or indentations cut in the flanges of rails at their ends—two on the piece A, and two on the bottom of the false side B.

These projections do not fit the notches in the rails, but allow them to expand and contract, and at the same time prevent them from being driven out of the chairs horizontally by passing trains.

I do not claim the use of a clamp-wedge, drawn down by bolts, to hold the ends of rails in position; but

What I do claim, and desire to secure by Letters Patent, is—

Supporting the ends of rails, to prevent their being crushed, by means of the base-casting A, false side B, and drop-block C, in combination with the projections *c c*, for preventing the rails from being driven out, substantially in the manner herein set forth and described.

CHAS. A. HARRIS.

Witnesses:

A. W. FOX,

H. L. BEAN.