

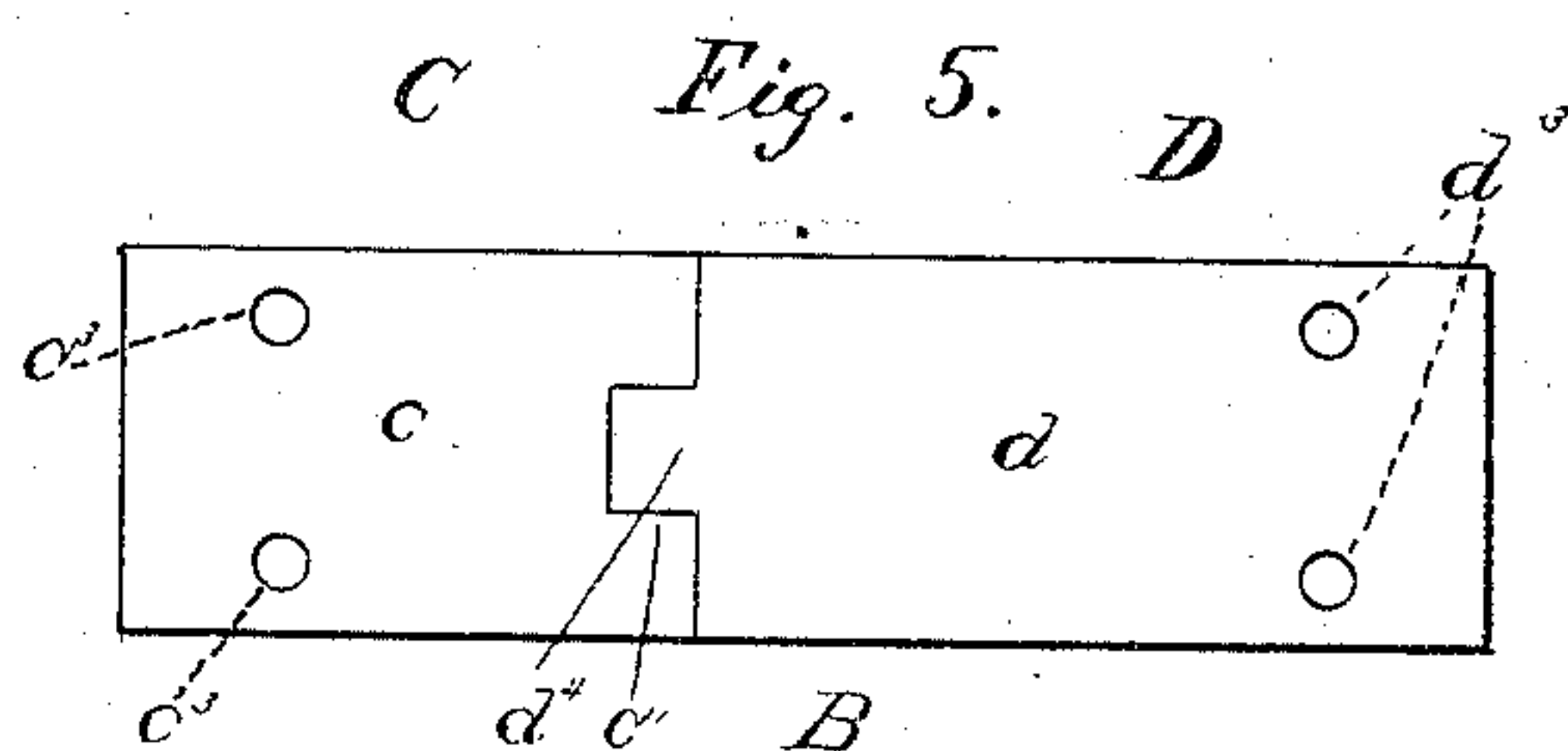
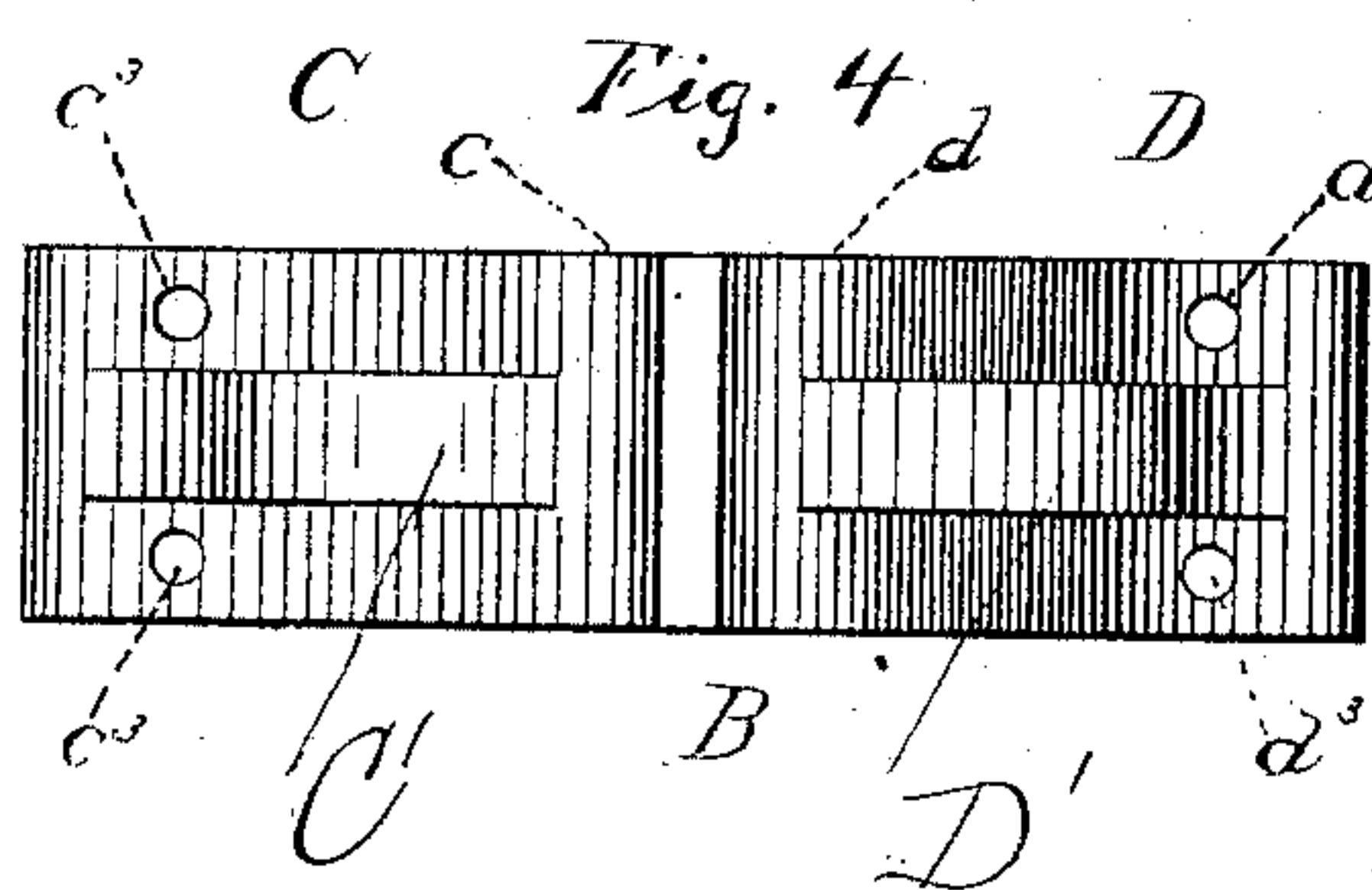
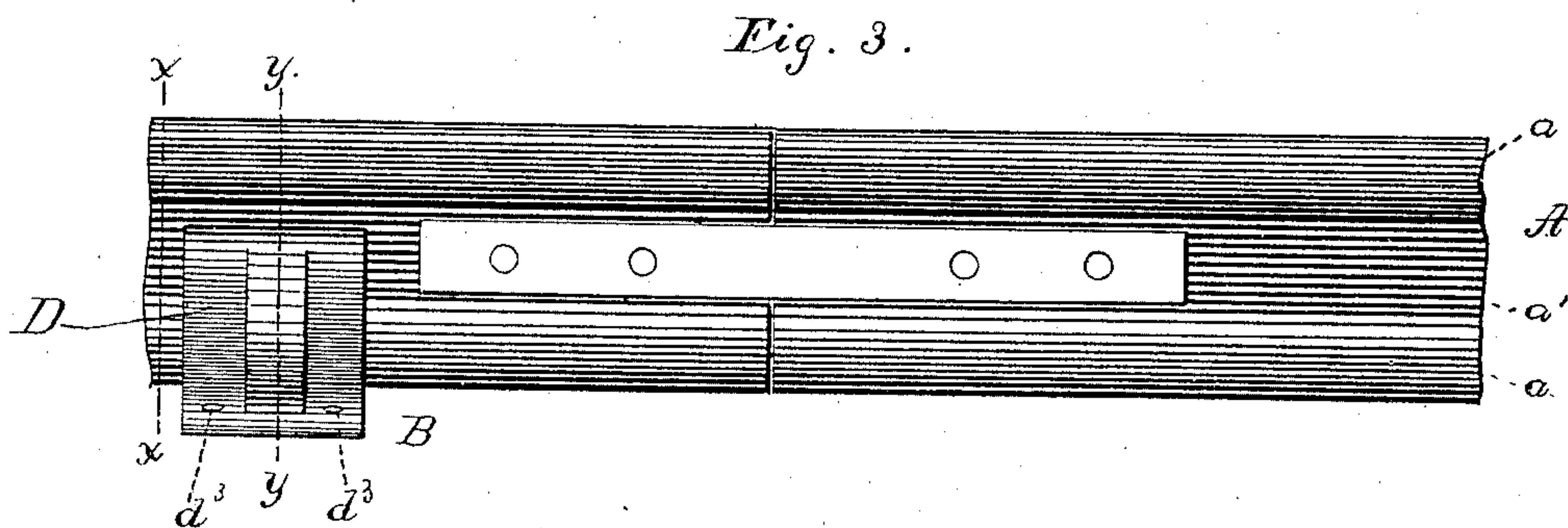
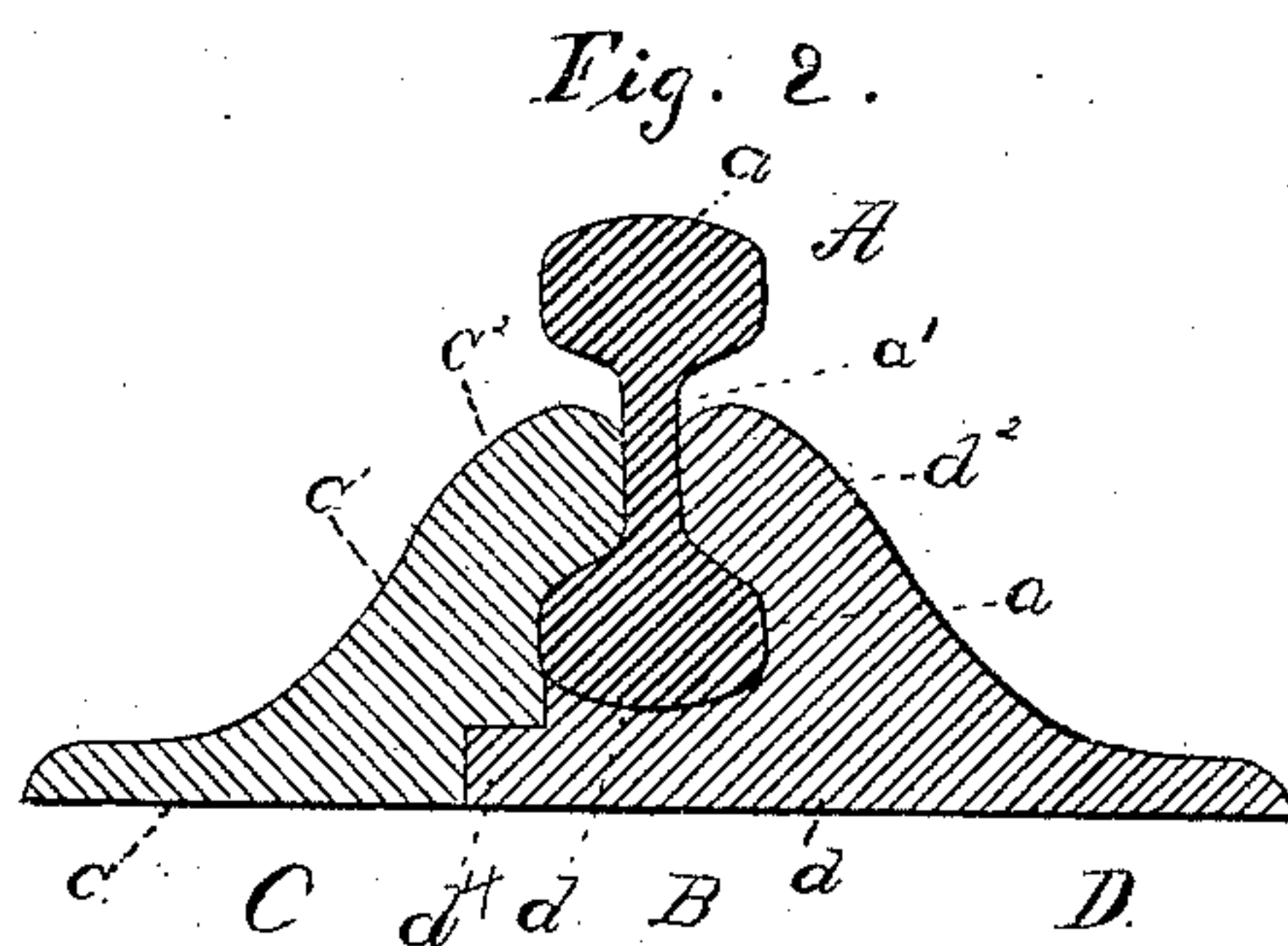
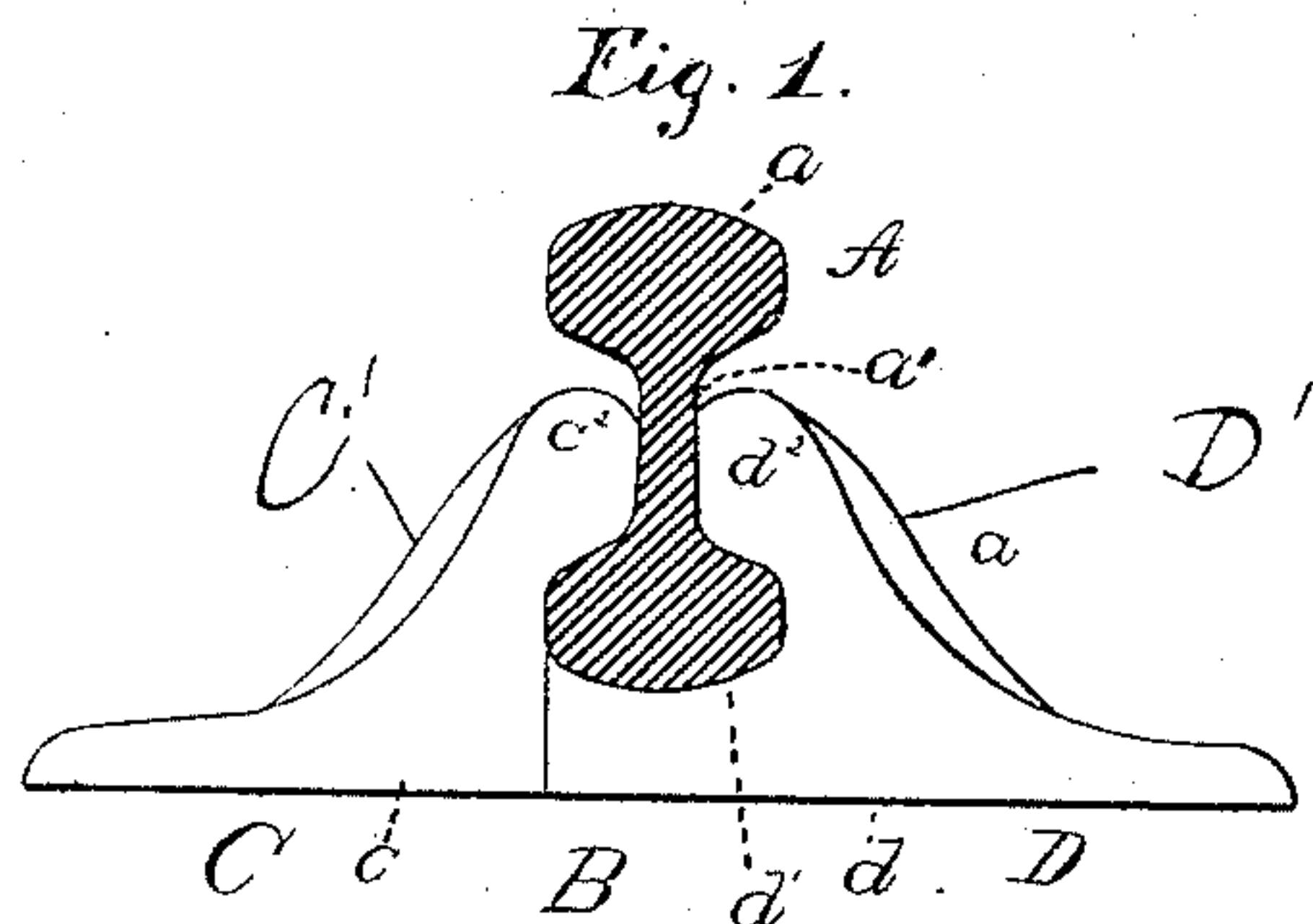
(No Model.)

F. E. TAPLING.

RAILROAD CHAIR.

No. 311,387.

Patented Jan. 27, 1885.



Witnesses.

P. B. Turpin.
C. McKamer

Inventor.

Francis E. Taping
By R. S. & A. Lacey
Atty.

UNITED STATES PATENT OFFICE.

FRANCIS EMMERSON TAPLING, OF MOUNT GILEAD, OHIO.

RAILROAD-CHAIR.

SPECIFICATION forming part of Letters Patent No. 311,387, dated January 27, 1885.

Application filed April 3, 1884. (No model.)

To all whom it may concern:

Be it known that I, FRANCIS E. TAPLING, a citizen of the United States, residing at Mount Gilead, in the county of Morrow and State of Ohio, have invented certain new and useful Improvements in Railroad-Chairs; and I do 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 ap-
10 pertains to make and use the same, reference being had to the accompanying drawings, and to the letters and figures of reference marked thereon, which form a part of this specification.

My invention relates to improvements in railway-chairs; and it consists in the novel features hereinafter described and claimed.

In the drawings, Figures 1 and 2 are transverse sections on respectively lines X X and Y Y, Fig. 3. Fig. 3 is a side view of chair and a section of rail in place therein. Fig. 4 is a top plan view of the chair. Fig. 5 is a bottom plan view of same, all of which will be described.

The rail A is made with the double treads *a* and the connecting-rib *a'*. The treads *a* are made alike, as clearly shown, so that when one becomes worn the other may be brought into use, as will be appreciated. I make this rail in a single piece or casting, so that its application and reversal may be accurately and readily accomplished. The treads are made exactly alike, and may be varied in form as desired.

The chair B is composed of sections C D, adapted to be secured on opposite sides of the rail. The section D has the base *d* provided on its upper face with a seat, *d'*, made sufficiently large to receive and support the lower tread of the rail, and is conformed thereto, as clearly shown in Figs. 1 and 2. The side flange or wing, *d''*, is extended up from the seat *d'* on the side of the rail, and is conformed to the hollow thereof between the treads, in which it is snugly fitted. The outer edge of the base *d* is extended, and may be provided with holes *d'''* to receive the spikes. A tenon, *d''''*, is extended laterally from the inner edge of the base *d*, as most clearly shown in Figs. 2 and 5, and for the purpose presently described. The section C has its base *c* provided in its inner edge with a mortise, *c'*, fitted to receive the tenon *d''''* on section D, and its flange or wing *c''* is extended up and conformed to the hollow of the

rail on the side opposite that in which is fitted the flange or wing *d''*. Holes *c'''* may be formed through the outer edge of the section C to receive the spike. It will be seen the section D supports the full weight of the rail and of the trains passing thereover. The sections may, manifestly, be joined other than by the tenon and mortise; but I prefer such construction, as thereby a firm union of the parts is secured, the sections are held firmly from any independent longitudinal movement along the rails, and are conveniently joined and may be easily detached, as will be readily seen.

By making the chair in sections and one section to receive all the wear when such section becomes too much worn or otherwise unserviceable, it can be replaced and the other section be used, thus avoiding the necessity of renewing the whole chair. My sections C D, it will be seen, are cast or otherwise suitably formed with ribs C' D', which extend longitudinally upon said sections and transversely to the rail. This strengthens the sections in the direction of greatest strain, and at the same time does not materially add to the weight or expense of manufacturing the chairs. The lower side of the base of the rail will be seen to be curved transversely throughout. In using such rail and the chair before described it will be seen that by forming the rail-seat wholly of one of the sections I prevent any spreading of the chair-sections likely to occur by reason of the curvature of the rail when the seat is formed partly on one and partly on the other section; also, by closing the top of the mortise *c'* it serves to prevent any rising of the tenon from lateral strain on the rail, the fastenings of section C co-operating with those of section D, to prevent such rising of the tenon, as will be understood.

Having described my invention, what I claim, and desire to secure by Letters Patent, is—

1. A railway-chair consisting of the jaw or section D, having its upper end projected into and fitting the web of the rail, and having its lower side or base projected inwardly under the rail to a point in line with the opposite edge of the rail, and formed in its upper side with a seat, *d'*, adapted to wholly support the rail, and having a tenon, *d''''*, extended laterally from its inner edge out beyond the line of

the rail and beyond the seat d' , and the section
or jaw C, having its base arranged in a plane
with the base of the section D, and having its
upper end fitted into the web of the rail and
5 its lower side abutted at its inner edge against
the inner edge of the section D, and provided
in said inner edge with a mortise, c , closed at
its upper side and fitted to receive the tenon
 d^4 , the said tenon d^4 and mortise c being en-
10 gaged at a point lateral to the line of the rail,
substantially as set forth.

2. In a railway-joint, the combination of the
rail having the lower side of its bottom or base
curved transversely, the chair-section D, hav-
15 ing its upper side fitted into the web of the
rail, and having its lower side extended under
the rail to a point in line with the opposite
edge of same, and provided in its upper side

with a curved seat, d' , adapted to receive and
wholly support the curved base of the rail, and 20
a tenon, d^4 , extended from its inner edge out
laterally beyond the rail, and the chair-section
C, having its upper end fitted into the web of
the rail, and its lower side formed in a plane
with the lower side of the section D, and pro- 25
vided in the lower side of its inner edge with
a mortise or tenon, c' , closed at its upper side
and fitted to receive the tenon d^4 , the said mor-
tise and tenon being engaged laterally to the
line of the rail, substantially as set forth. 30

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

FRANCIS EMMERSON TAPLING.

Witnesses:

C. W. ALLISON,
L. K. POWELL.