

No. 847,156.

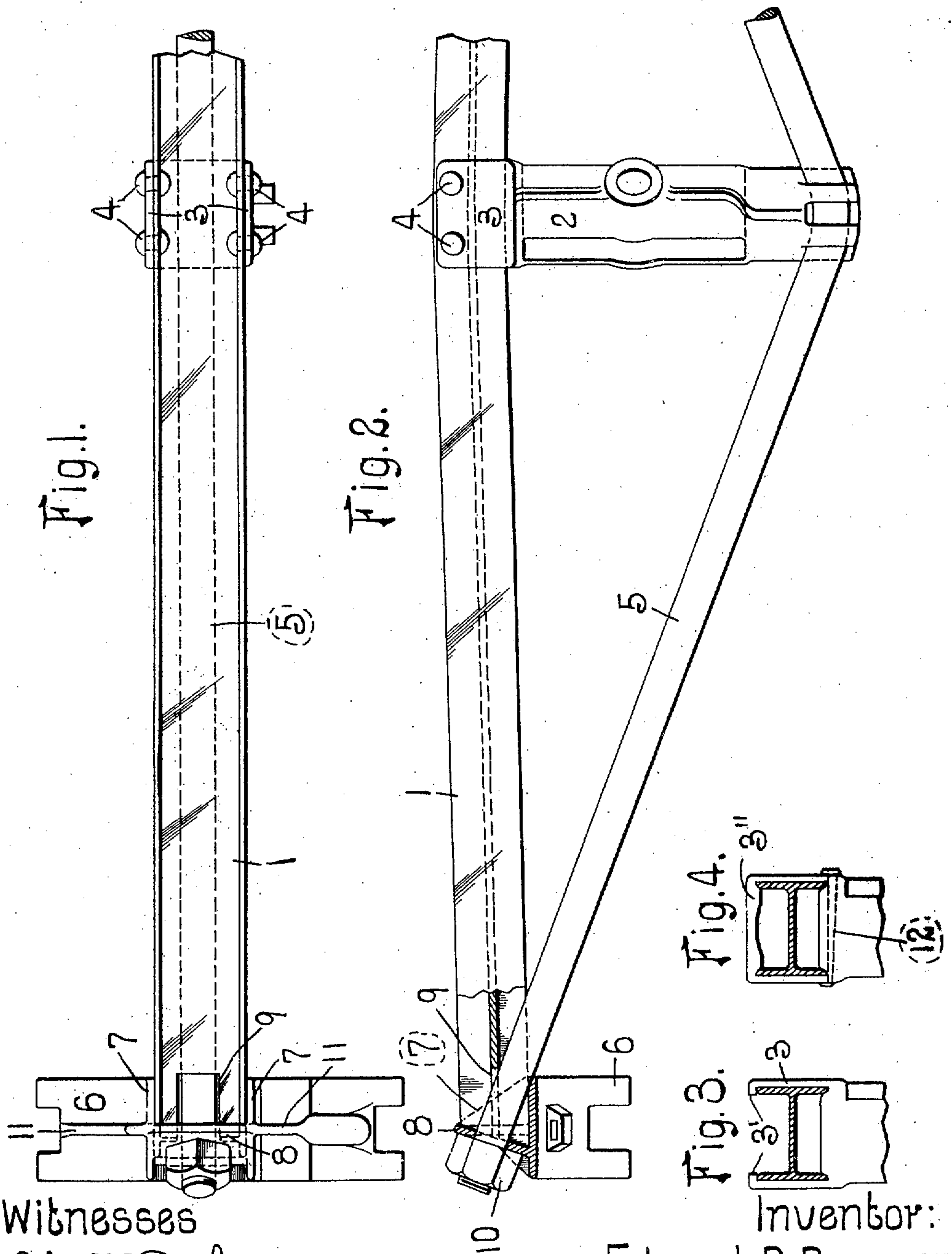
PATENTED MAR. 12, 1907.

E. D. BRONNER.

BRAKE BEAM.

APPLICATION FILED MAY 21, 1906.

2 SHEETS—SHEET 1.



Witnesses
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2 SHEETS—SHEET 2.

Fig. 5.

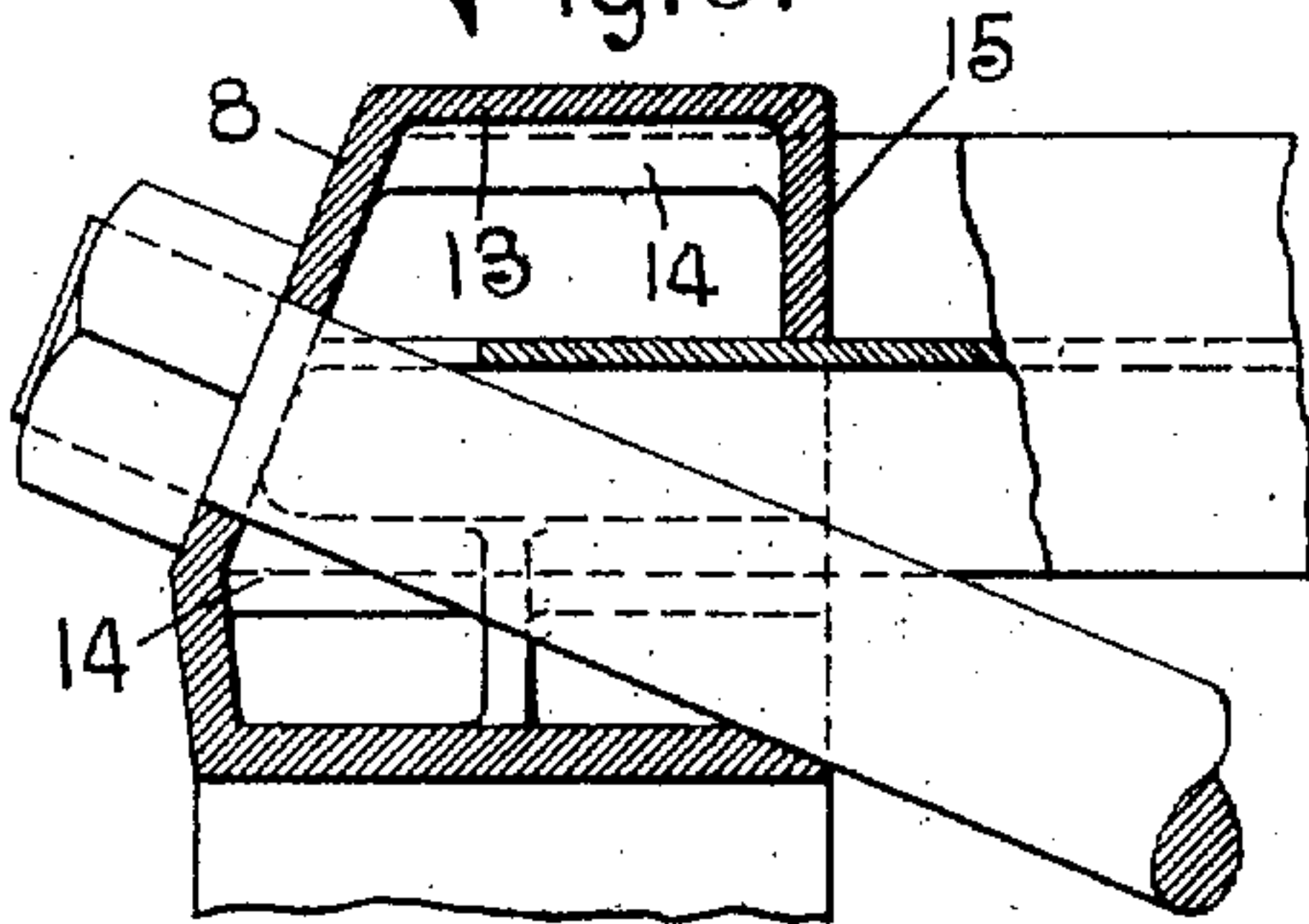


Fig. 6.

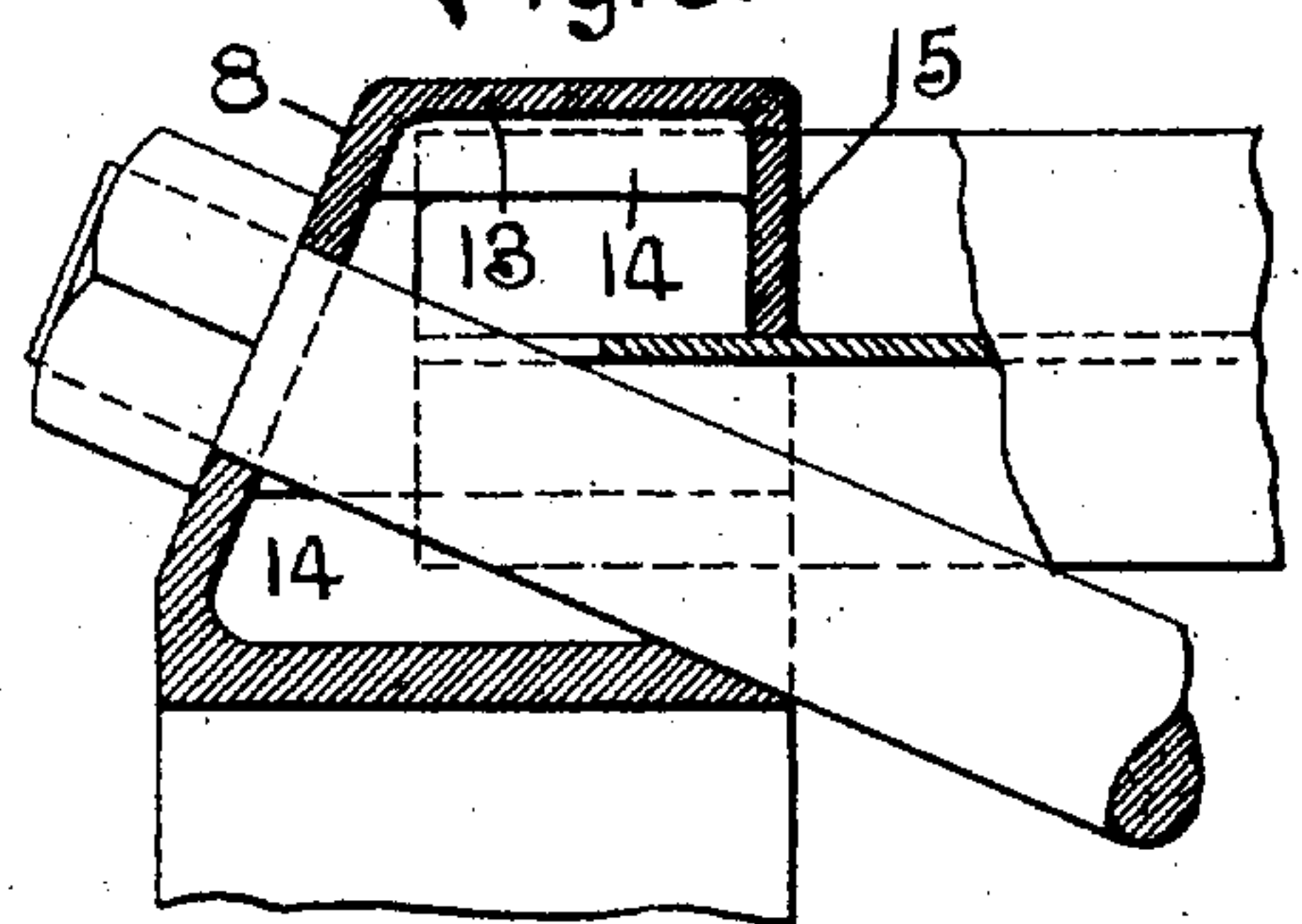


Fig. 7.

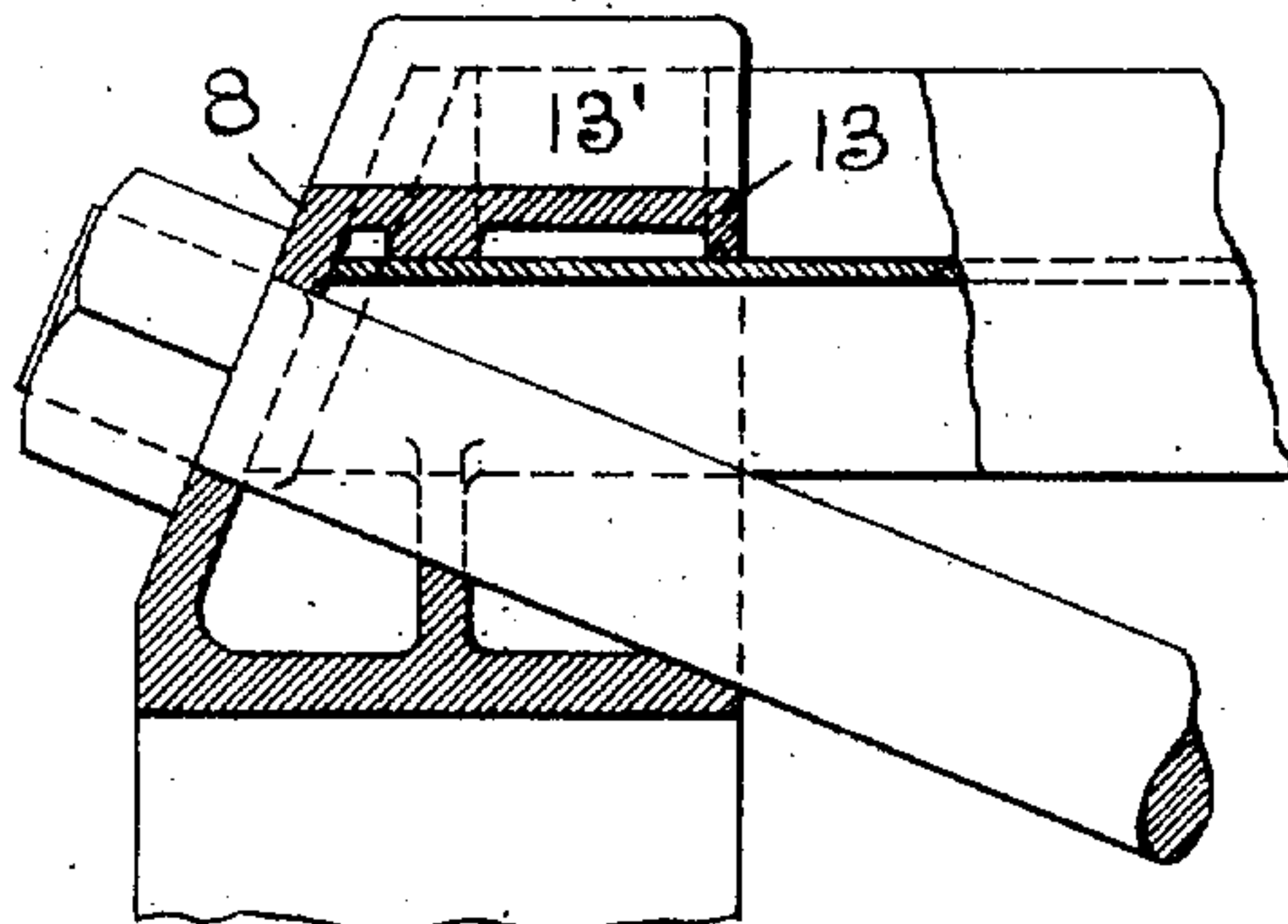


Fig. 8.

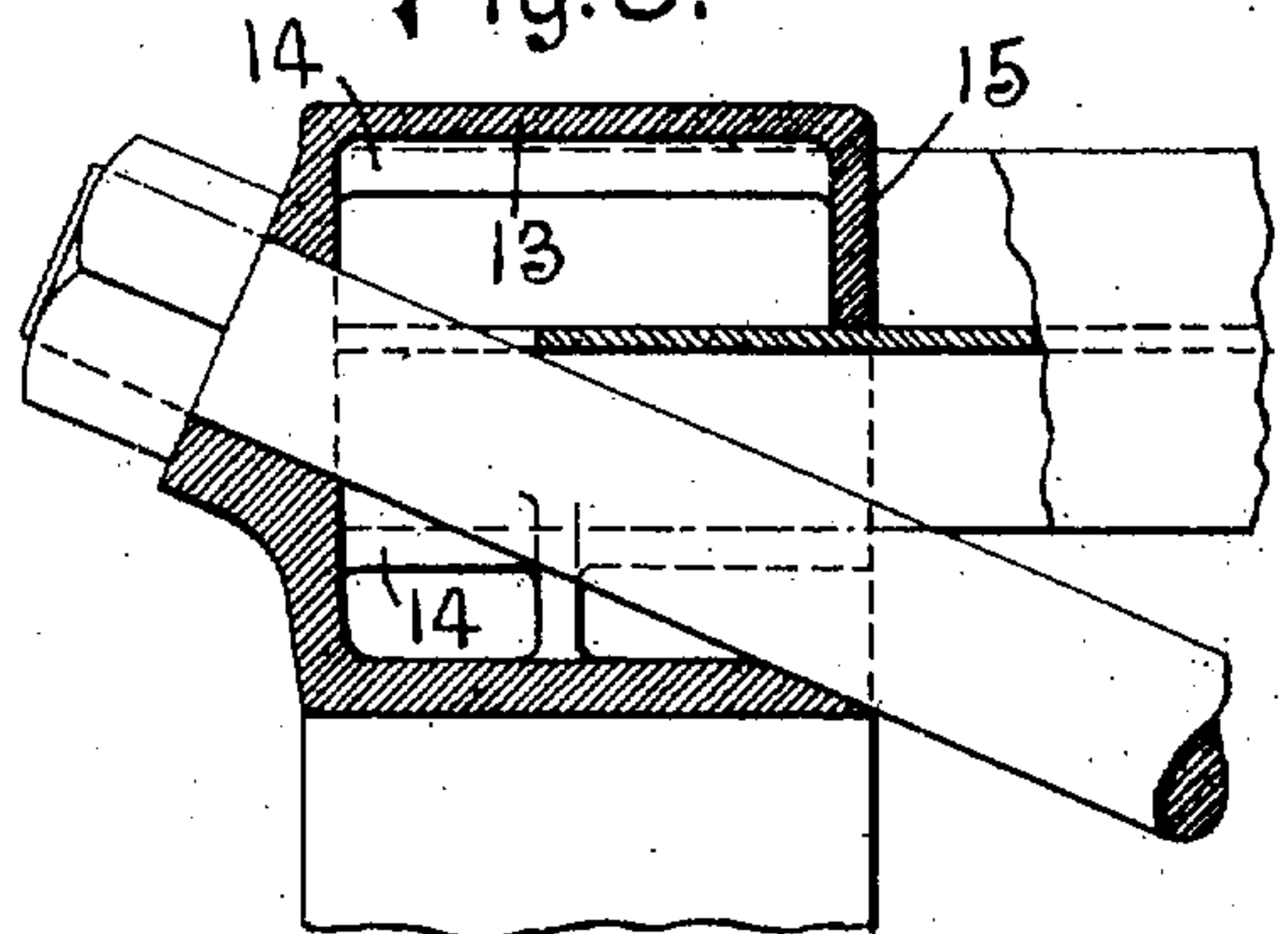
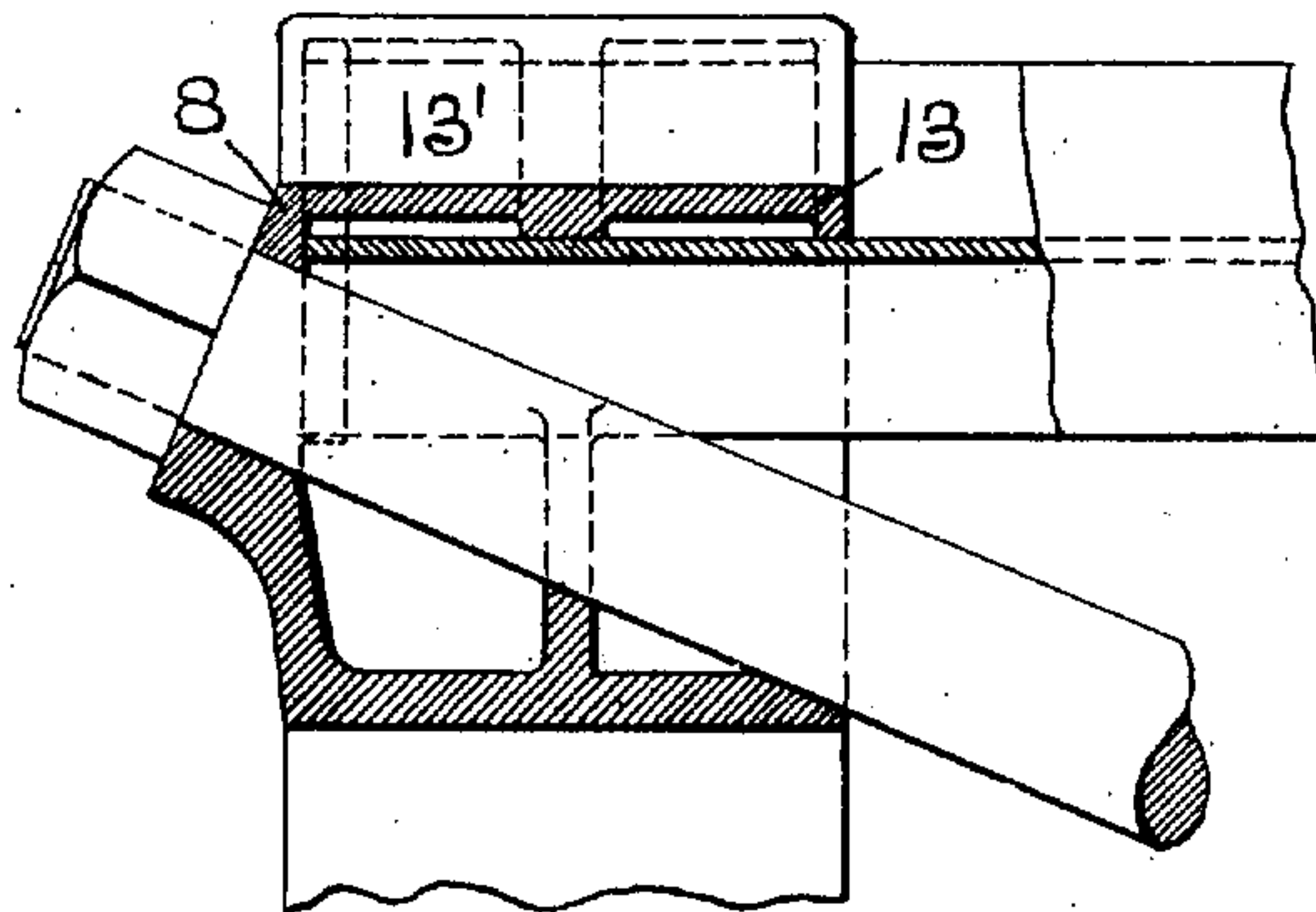


Fig. 9.



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UNITED STATES PATENT OFFICE.

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BRAKE-BEAM.

No. 847,156.

Specification of Letters Patent.

Patented March 12, 1907.

Application filed May 21, 1906. Serial No. 317,953.

To all whom it may concern:

Be it known that I, EDMOND D. BRONNER, a citizen of the United States, residing at Detroit, Michigan, have invented a certain new and useful Improvement in Brake-Beams, of which the following is a full, clear, and exact description, such as will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, forming part of this specification, in which—

Figure 1 is a rear elevation of a brake-beam embodying the features of my invention. Fig. 2 is a plan view thereof. Fig. 3 shows a modified form of connection between the strut and the compression member of the brake-beam. Fig. 4 shows still another form of connection between these parts; and Figs. 5 to 9, inclusive, show modified forms of brake-heads.

This invention relates to brake-beams, and particularly to that type known as "trussed" beams.

The object of my invention is to provide a brake-beam which is light and of simple construction and in which the brake-heads are connected to the beam in a novel manner.

Referring to the drawings, which represent the preferred form of my invention, I designate the compression member of the beam which preferably consists of an I-beam. The strut 2 is provided at its inner end with flanges 3, which are connected to the flanges of the compression member by rivets 4, and at the outer end of said strut is an opening to receive the tension member 5, which preferably consists of a round rod.

The brake-heads 6 are provided at their rear faces with flanges 7, which embrace the flanges of the compression member, and a diagonally-extending web 8 is formed integral with said flanges 7, the ends of the compression member being beveled or sheared at an angle to the body portion thereof, so that said ends will fit snugly in the pockets formed by the flanges 7 and the webs 8 on the rear faces of the brake-heads. The end portions of the web of the I-beam compression member have slots 9, through which the tension member passes, and the webs 8 on the brake-heads also have openings to receive said tension member. Nuts 10 are threaded on the ends of the tension member and bear against the outer faces of the webs 8 on the brake-

heads which, as herein shown, extend approximately at right angles to the tension member, thereby insuring said brake-heads being securely held in position when the nuts 10 are tightened. The flanges 7 on the rear of the brake-heads are strengthened by ribs 11.

In Fig. 3 I have shown a different manner of connecting the strut to the I-beam compression member, the flanges 3 at the rear end of the strut being provided with legs 3', which engage the rear edge of the flanges of the I-beam.

Fig. 4 shows still another form of connection between the strut and I-beam, the rear end of the strut in this modification being provided with a yoke 3'', which surrounds the I-beam and which has undercut grooves to receive the edges of the flanges of the beam, a tapered key 12 passing through said yoke and engaging the front edges of the flanges of the I-beam, thereby securely holding said yoke in position.

In Figs. 5, 6, and 8 I have shown modified forms of brake-heads in which the flanges 7, that embrace the flanges of the compression member and are formed integral with the web 8, are of slightly-different shape, said flanges being connected at their rear edges by a vertical wall 13, which forms a continuation of the web 8. Ribs 14 are provided for bearing against the inner faces of the flanges of the I-beam compression member, and a leg 15 projects inwardly from said rear wall and butts against the web of the I-beam.

In Figs. 7 and 9 I have shown still different forms of brake-heads, and in these forms the vertical wall 13 is located adjacent the web of the I-beam compression member and flares outwardly at its upper and lower ends at 13' and merges into the horizontally-extending flanges 7, so that the ends of the compression member are inclosed in housings which conform practically to the shape of one-half of the I-beam.

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

1. A brake-beam comprising a tension member, a strut, a compression member having beveled ends which extend approximately at right angles to the tension member, brake-heads having members projecting from their rear faces to form pockets to re-

ceive the ends of said compression member and abut against the beveled ends thereof, and means for securing said brake-heads to the brake-beam; substantially as described.

5 2. A brake-beam comprising a tension member, a strut, a compression member having beveled ends which extend approximately at right angles to the tension member, brake-heads provided on their rear faces
10 with flanges which engage the lower and upper faces of the compression member and with diagonally-extending webs which bear against the beveled ends of the compression member, and means for securing said brake-
15 heads in operative position; substantially as described.

3. A brake-beam comprising a tension member, a strut, an I-beam compression member having its ends cut at an angle and
20 having its web slotted to receive the tension member, brake-heads provided with flanges, webs connecting said flanges and extending approximately at right angles to the tension member, thereby forming pockets in which
25 the ends of the compression member fit snugly, openings in said webs through which the tension member passes, and nuts on the ends of said tension member and bearing against the webs on the brake-heads; sub-
30 stantially as described.

4. A brake-beam comprising an I-beam compression member, a tension member, a strut, and flanges on said strut for embracing the flanges of the I-beam, the rear end of
35 said flanges being deflected to engage the edges of the flanges on the I-beam; substantially as described.

5. A brake-beam comprising an I-beam

compression member, a tension member, a strut provided at its rear end with a yoke 40 which entirely surrounds the compression member, and a key passing through the strut and engaging a portion of the compression member, whereby said strut is held
45 securely in position; substantially as described.

6. A brake-beam comprising a tension member, a strut, an I-beam compression member, and brake-heads provided on their rear faces with diagonally-extending webs 50 which are formed integral with horizontally-extending flanges connected at their rear edges by a vertical wall, said vertical walls being provided with legs which engage the web of the compression member and with
55 ribs for engaging the inner faces of the flanges of said member; substantially as described.

7. A brake-beam comprising a tension member, a strut, a compression member 60 having beveled ends which extend at approximately right angles to the tension member, and brake-heads applied to the ends of said compression member, said brake-heads being provided with housings which conform 65 to the shape of the I-beam compression member and one wall of each housing butting against the end of the compression member; substantially as described.

In testimony whereof I hereunto affix my 70 signature, in the presence of two witnesses, this 30th day of April, 1906.

EDMOND D. BRONNER.

Witnesses:

W. D. THOMPSON,
DAVID M. KERR.