

(No Model.)

W. J. WALKER.
CAR COUPLING.

No. 429,103.

Patented May 27, 1890.

Fig. I

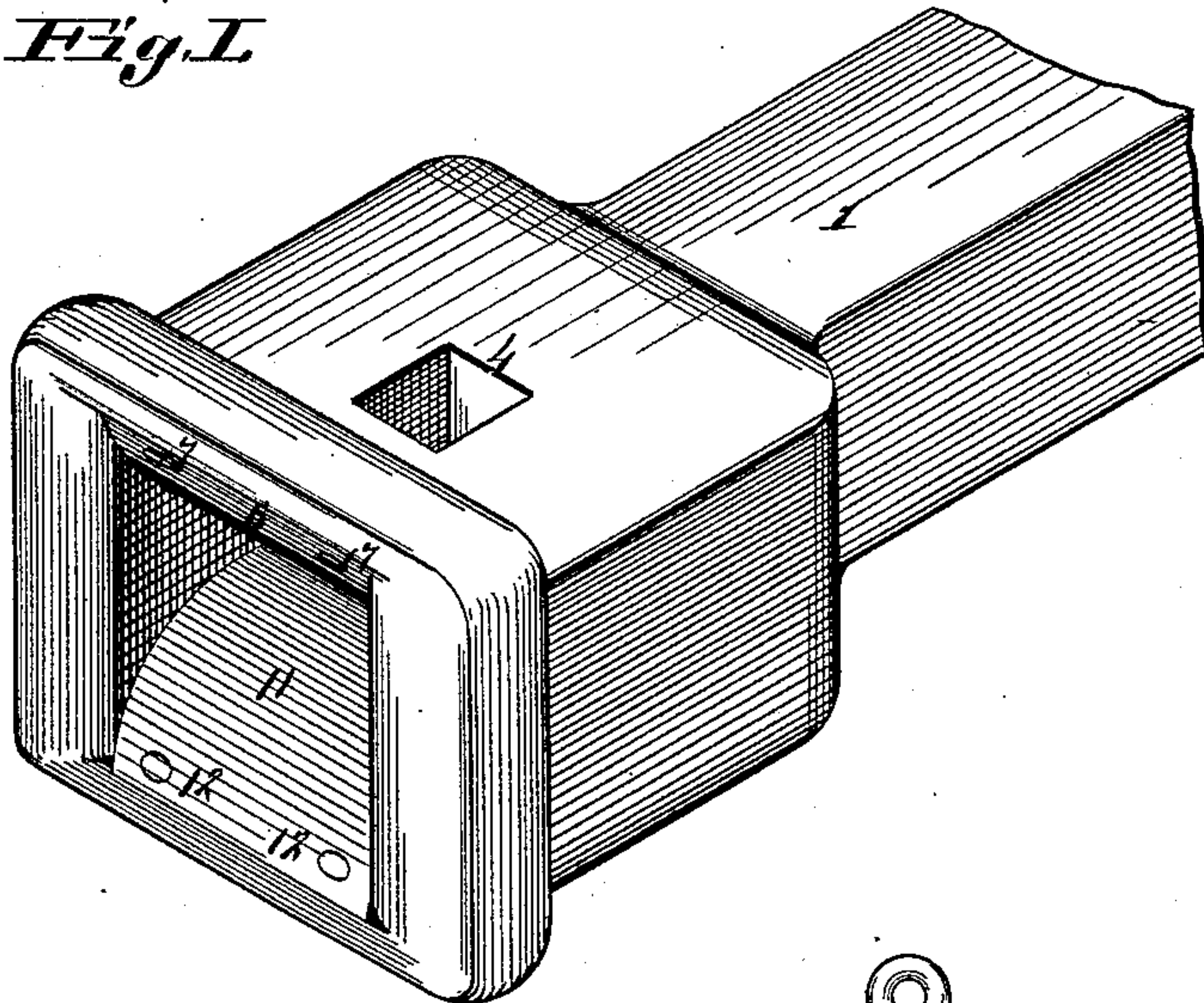


Fig. II

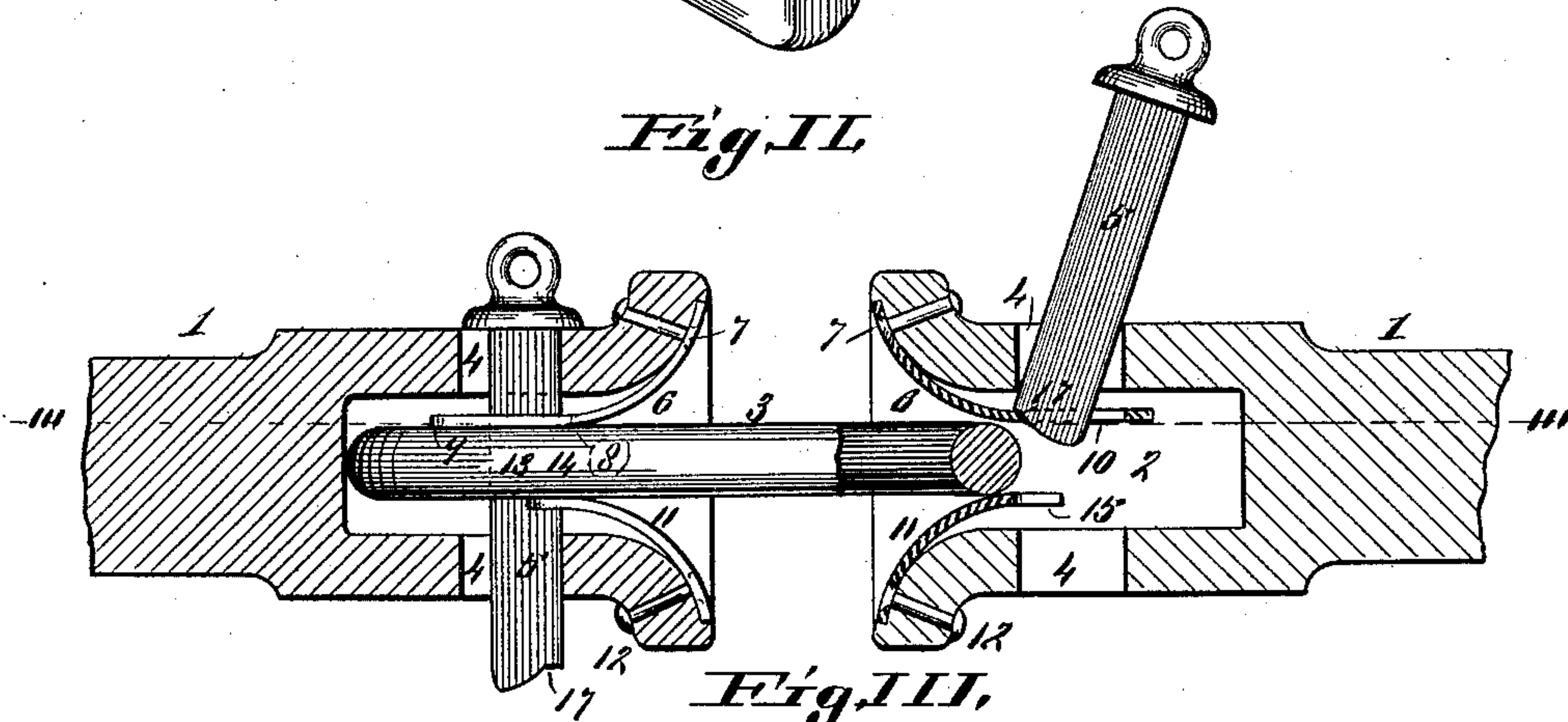
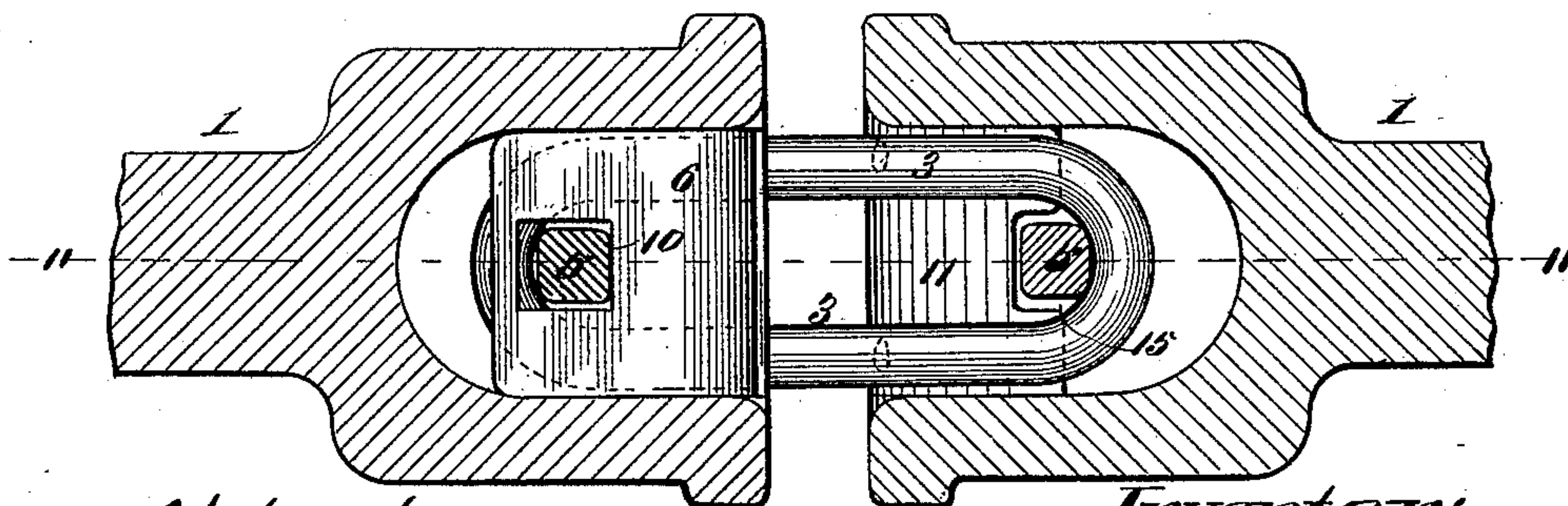


Fig. III



Attest,
E. Arthur
Geo. E. Bruce.

Inventor,
William J. Walker
By *Wright Bros*
attys

UNITED STATES PATENT OFFICE.

WILLIAM J. WALKER, OF ST. LOUIS, MISSOURI, ASSIGNOR OF ONE-HALF TO
LOUIS HAMMERSCHMIDT, OF SAME PLACE.

CAR-COUPLING.

SPECIFICATION forming part of Letters Patent No. 429,103, dated May 27, 1890.

Application filed March 25, 1890. Serial No. 345,240. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM J. WALKER, of the city of St. Louis, in the State of Missouri, have invented a certain new and useful Improvement in Draw-Heads for Railway-Cars, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings, forming part of this specification.

My invention relates to certain improvements in draw-heads for railway-cars; and my invention consists in features of novelty hereinafter fully described, and pointed out in the claims.

Figure I is a perspective view of a draw-head provided with my invention. Fig. II is a vertical longitudinal section through the adjacent ends of two draw-heads, showing the link and connecting-pins in place, this section being taken on line II II, Fig. III. Fig. III is a horizontal section taken on line III III, Fig. II.

Referring to the drawings, 1 represents a pair of draw-heads of a railway-car, each having a recess 2, as usual, to receive the connecting-link 3, and each having holes or perforations 4, as usual, to receive the connecting-pins 5. Each head has an upper curved plate 6 secured to its mouth by means of suitable rivets or bolts 7. These curved plates extend in a downwardly and inwardly direction into the throat of the draw-heads, and have a substantially horizontal portion from 8 to 9, and these portions are perforated at 10 to receive the connecting-pins 5.

11 represents lower curved plates secured to the mouths of the draw-heads by means of suitable bolts or rivets 12. These plates extend in an upwardly and inwardly direction into the throat of the draw-heads, as shown clearly in Fig. II, each having a substantially horizontal portion from 13 to 14, which is notched to receive the pins, as shown at 15 on the right-hand side of Fig. II. The horizontal portions of the plates 6 and 11 of each draw-head are sufficiently far apart to admit the link, as shown in Fig. II, the lower face of the link resting on the hori-

zontal portion of the plate 11, and the horizontal portion of the plate 6 resting and bearing on the upper face of the link, thus holding the link in a horizontal position, or in a position which is parallel or in line with the draw-head.

After the link is inserted into one of the draw-heads and supported as I have just described by the plate 6 and 11, and as shown on the left-hand side of Fig. II, the pin 5 of this draw-head is dropped into place, connecting the link permanently to the draw-head. This is done before the coupling of the cars. The link 5 of the other draw-head is then placed, as shown on the right-hand side of Fig. II, with a shoulder 17 on its lower end resting on the plate 6 at the inner end of the slot 10, the extreme lower end of the pin extending beneath the face of the plate being beveled off to allow of the easy passage of the link. The link is thus supported without attention until the cars coming together causes the end of the link entering this cross-head to strike the beveled end of the pin extending beneath the plate 6, which dislodges the shoulder 17 from the plate and permits the pin to drop through the link into its using position, thus coupling the cars. By an arrangement of this kind a very cheap and effective method of holding the link in a horizontal position, and of holding the pin so as to be automatically applied, is effected, so that the cars can be automatically coupled.

I claim as my invention—

1. A draw-head having plate 6, provided with perforation 10 through its inner end, and plate 11, provided with notch 15 in its inner end, said plates extending into the throat of the draw-head for guiding and supporting the link, substantially as herein set forth.

2. The combination of a draw-head 1, provided with an upper perforated plate 6 and a lower notched plate 11, with a pin 5, provided with a beveled end, and a notch 17 near said end, adapted to engage the edge of perforation 10 in plate 6, whereby the pin

is supported in position for the connecting-link to impinge on the beveled end of the pin, disengage the notch, and automatically couple the car, substantially as herein set forth.

5 3. In combination with a draw-head having plates 6 and 11, arranged and operating

substantially as set forth, the pin 5, having shoulders 17, substantially as specified.

WILLIAM J. WALKER.

In presence of—

THOS. KNIGHT,
E. S. KNIGHT.