

No. 765,563.

PATENTED JULY 19, 1904.

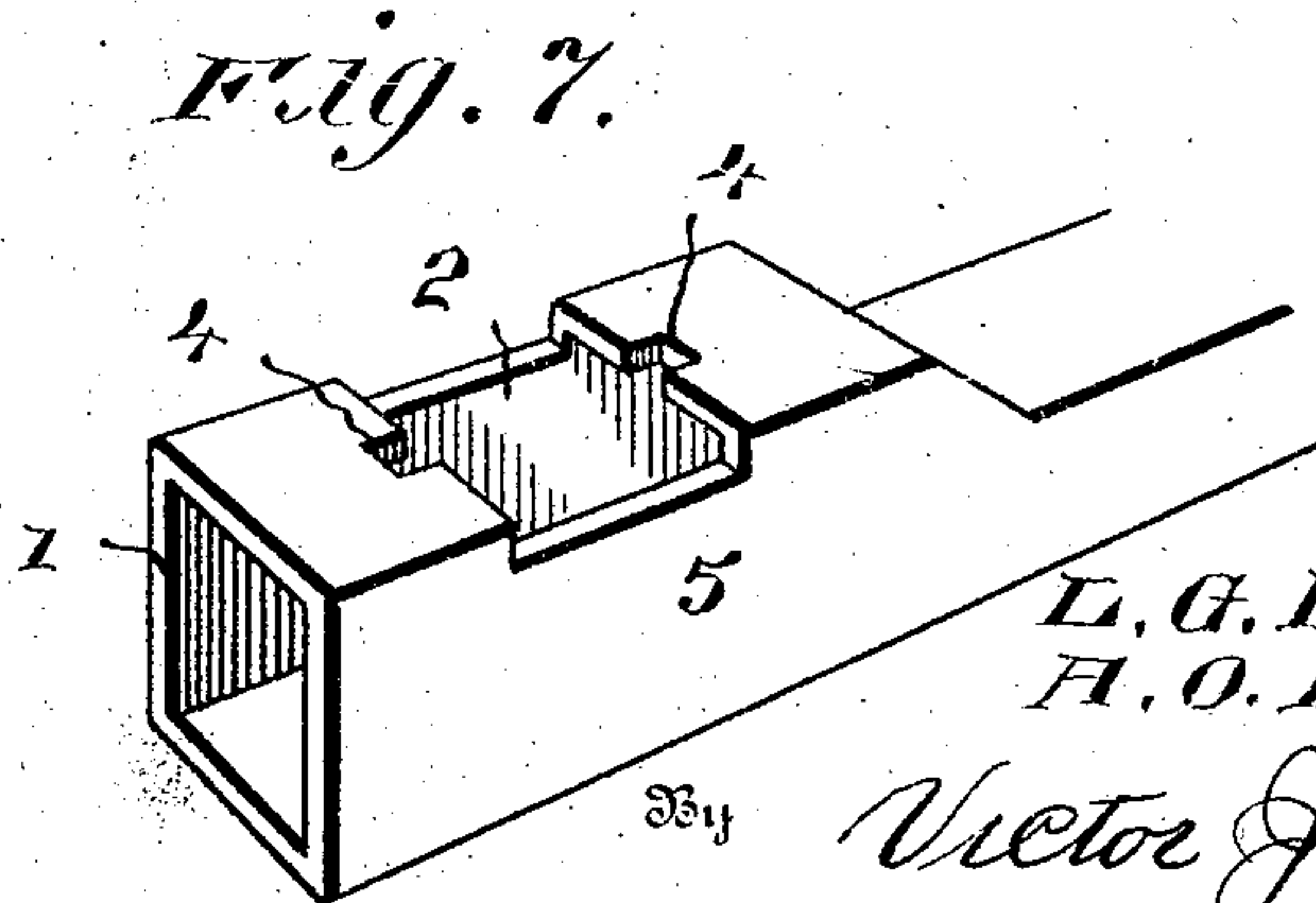
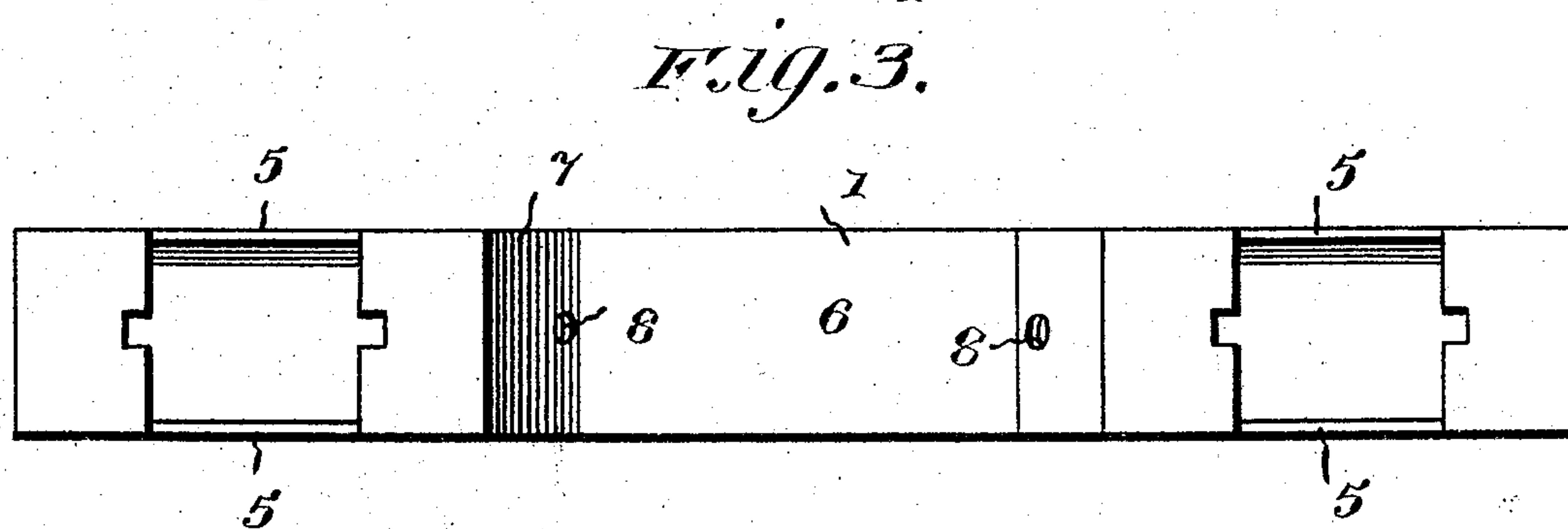
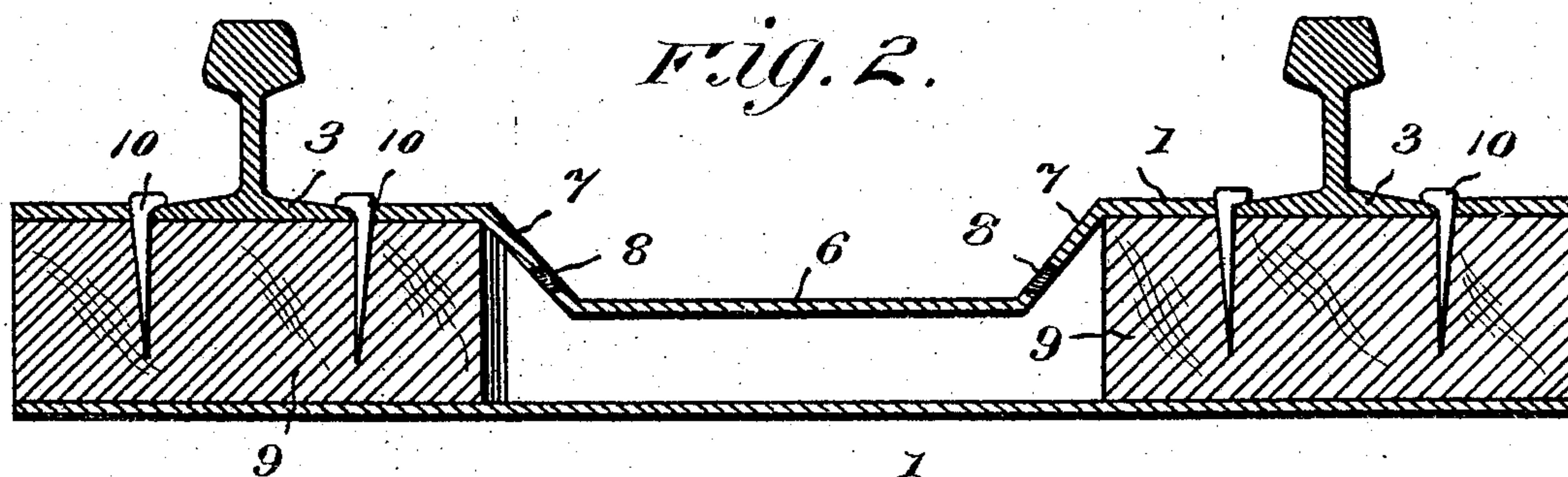
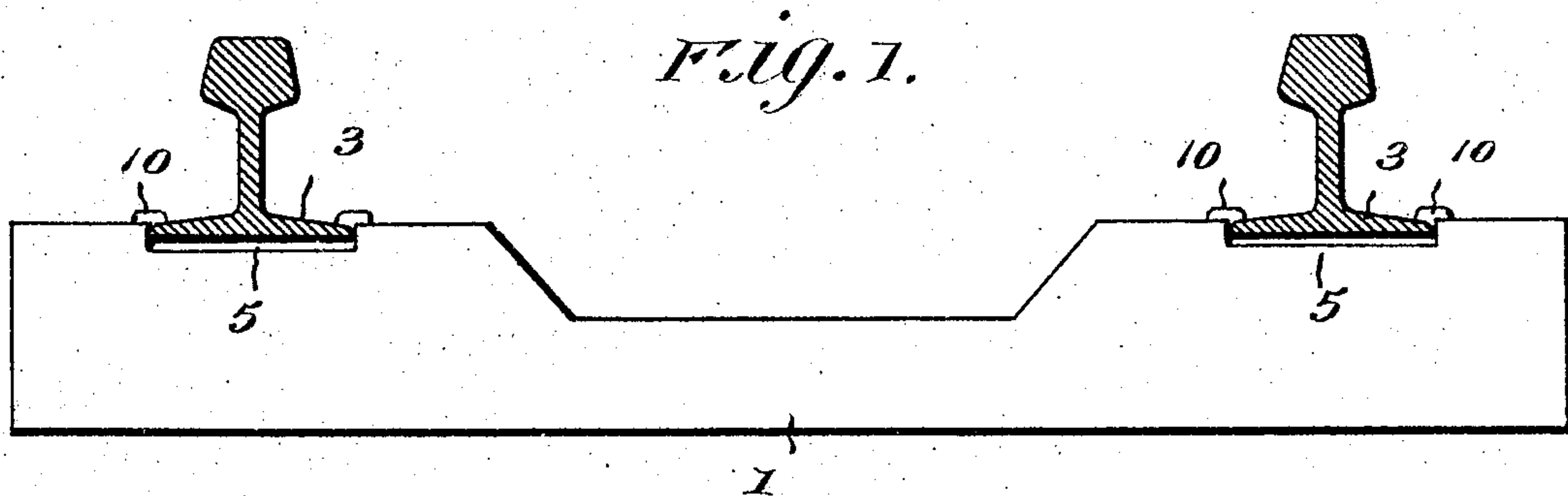
L. G. & A. O. DAILEY.

RAILWAY TIE.

APPLICATION FILED NOV. 24, 1903.

NO MODEL.

2 SHEETS—SHEET 1.



Witnesses

G. W. Riley.
Robert D. Lawson.

Inventors

L. G. Dailey.
A. O. Dailey.

By

Victor J. Evans

Attorney

No. 765,563.

PATENTED JULY 19, 1904.

L. G. & A. O. DAILEY.

RAILWAY TIE.

APPLICATION FILED NOV. 24, 1903.

NO MODEL.

2 SHEETS—SHEET 2.

Fig. 4.

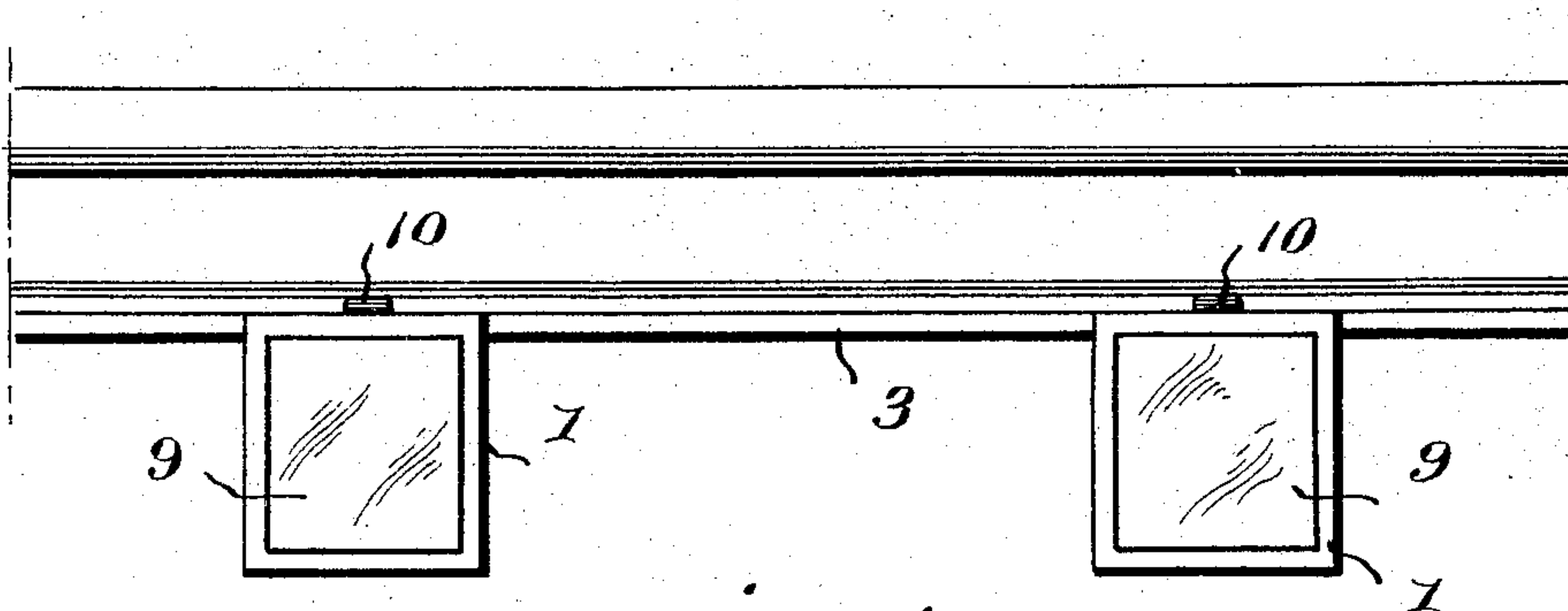


Fig. 5.

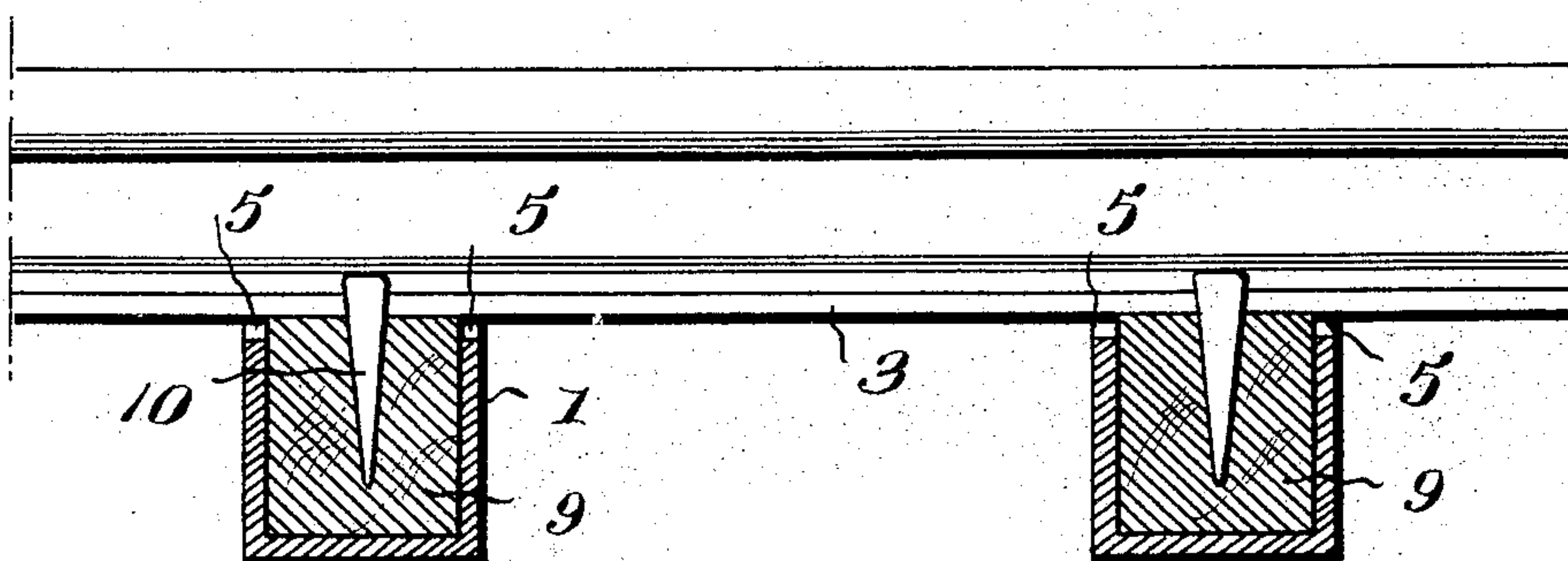


Fig. 6.

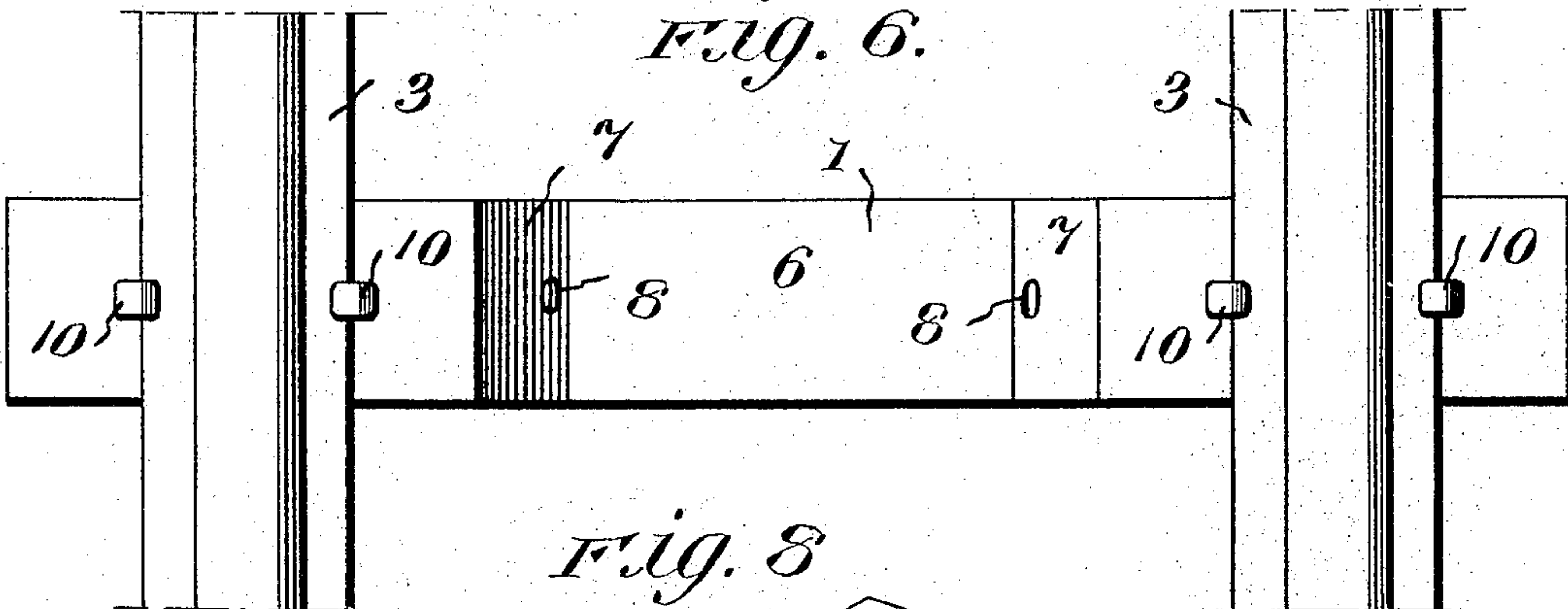
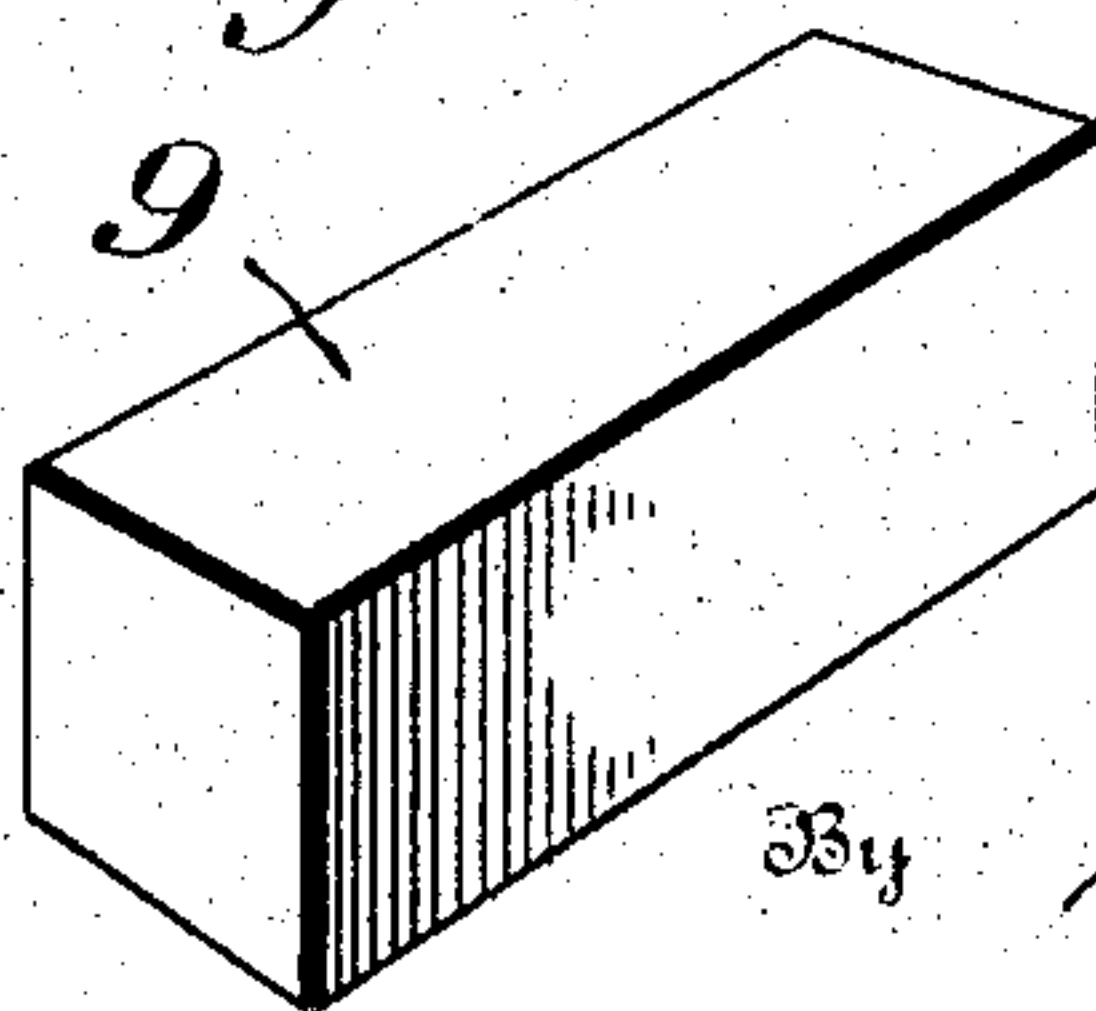


Fig. 8.



Witnesses

J. W. Dailey.
Hubert D. Larson.

Inventors

L. G. Dailey.
A. O. Dailey.

By

Victor J. Evans

Attorney

UNITED STATES PATENT OFFICE.

LEWIS G. DAILEY AND AMOS O. DAILEY, OF BINGHAMTON, NEW YORK.

RAILWAY-TIE.

SPECIFICATION forming part of Letters Patent No. 765,563, dated July 19, 1904.

Application filed November 24, 1903. Serial No. 182,522. (No model.)

To all whom it may concern:

Be it known that we, LEWIS G. DAILEY and AMOS O. DAILEY, citizens of the United States, residing at Binghamton, in the county of Broome and State of New York, have invented new and useful Improvements in Railway-Ties, of which the following is a specification.

Our invention relates to new and useful improvements in railway-ties; and its object is to provide a metallic tie of simple, durable, and inexpensive construction adapted to receive wooden blocks for supporting the rails and for receiving the rail-securing means.

A further object is to so construct the tie that the blocks contained therein will be protected from the elements, thereby prolonging the usefulness of each block.

With the above and other objects in view the invention consists in forming the tie of a metallic casing adapted to extend under the rails and having its upper faces cut away to receive the base-flanges of said rails. Located within the tie and under these cut-away portions are wooden blocks, which form supports for the rails and are adapted to receive the spikes or other rail-securing means employed.

The invention also consists in reducing the thickness of the casing at points intermediate the rails and providing the end walls of said reduced casing with apertures for the reception of tools for ejecting the blocks.

The invention also consists in the further novel construction and combination of parts, hereinafter more fully described and claimed, and illustrated in the accompanying drawings, showing the preferred form of our invention, and in which—

Figure 1 is a side elevation of a tie constructed in accordance with our invention and showing rails in position thereon. Fig. 2 is a vertical longitudinal section through the tie. Fig. 3 is a plan view thereof. Fig. 4 is an end elevation of two of the ties with a rail thereon. Fig. 5 is a transverse section through said ties. Fig. 6 is a plan view of the tie with rails secured thereon. Fig. 7 is a perspective view of one end of the tie, the block being

removed therefrom; and Fig. 8 is a detail view of one of the blocks.

Referring to the figures by numerals of reference, 1 is a metallic casing, preferably rectangular in cross-section and open at the ends. The upper face of this casing is cut away adjacent the ends to form apertures 2 of sufficient width to receive the base-flanges 3 of a rail. Recesses 4 are formed within the side walls of each aperture 2, and the side walls of the casing are also provided with recesses 5, which register with the aperture 2. The central portion 6 of the tie is depressed or reduced in size, and the end walls of this reduced portion are inclined, as shown at 7, and provided with apertures 8. Blocks 9, of wood or other suitable material, are adapted to be inserted longitudinally into the ends of the casing and under the apertures 2. Said blocks form supports for the base-flanges 3 of the rails, and said flanges are secured to the blocks by driving spikes 10 downward through the recesses 4 and into the blocks. It will be seen that the casing protects all of the faces of the blocks except the ends thereof from the elements, and therefore the usefulness of the blocks is materially prolonged. The blocks can be readily withdrawn from the casing by first extracting the spikes 10 and then inserting a suitable tool through each aperture 8, so as to force the blocks outward. Should the upper face of either block become worn or otherwise rendered unfit for use, the block can be reversed and reinserted into the casing. It will be understood that the inclined walls 7 limit inward movement of the blocks 9. Ties constructed in accordance with our invention will last as long as or longer than the rails thereon, and the blocks employed in connection therewith can be obtained at slight cost in view of the fact that it is unnecessary to have them of a length sufficient to enable them to project under both rails.

In the foregoing description we have shown the preferred form of our invention; but we do not limit ourselves thereto, as we are aware that modifications may be made therein with-

out departing from the spirit or sacrificing any of the advantages thereof, and we therefore reserve the right to make such changes as fairly fall within the scope of our invention.

Having thus described the invention, what is claimed as new is—

1. In a railway-tie, the combination with a casing hollow throughout its length and having a reduced intermediate portion and its upper face cut away to form rail-receiving apertures; of blocks removably seated within the ends of the casing and abutting against the reduced portion, said blocks being adapted to receive rail-securing means.

2. In a device of the character described, the combination with a casing having open ends, and a reduced intermediate portion having apertured inclined end walls, the upper face of the casing being cut away adjacent its ends to form rail-receiving apertures; of blocks

within the ends of the casing and abutting against the inclined walls of the reduced portion thereof, said blocks being adapted to receive rail-securing devices and being removable longitudinally from the ends of the casing.

3. In a device of the character described, the combination with a casing having open ends, and a reduced intermediate portion having apertured end walls; of blocks within the ends of the casing and abutting against the ends of the reduced portion, said blocks being adapted to receive rail-securing means.

In testimony whereof we affix our signatures in presence of two witnesses.

LEWIS G. DAILEY.
AMOS O. DAILEY.

Witnesses:

ARCHIBALD HOWARD,
DANA B. HINMAN.