(No Model.)

M. J. KEENAN.

RAILROAD RAIL.

No. 507,012. Patented Oct. 17, 1893.

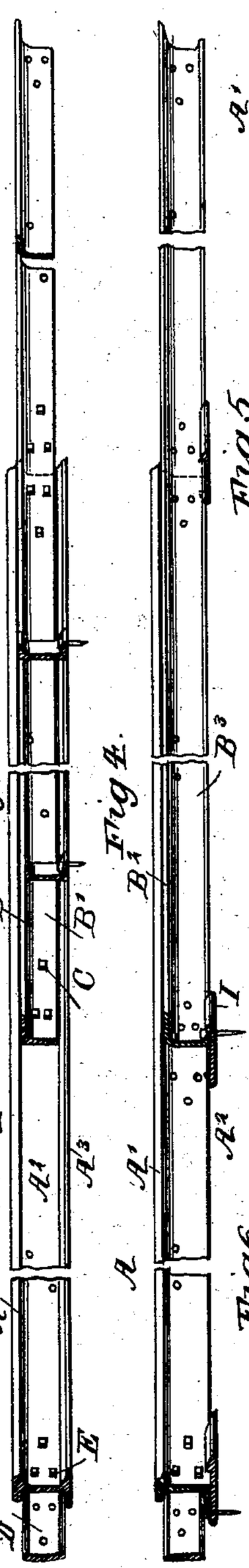
Fig. 2.

Fig. 4.

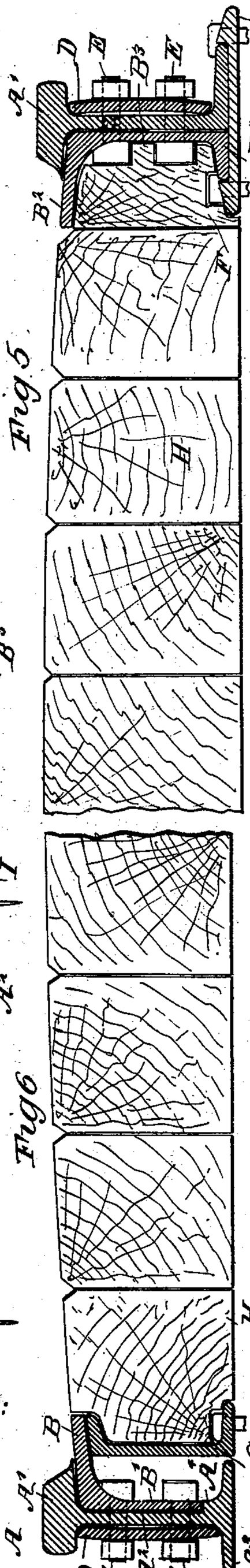
Fig. 5.

Fig 6.

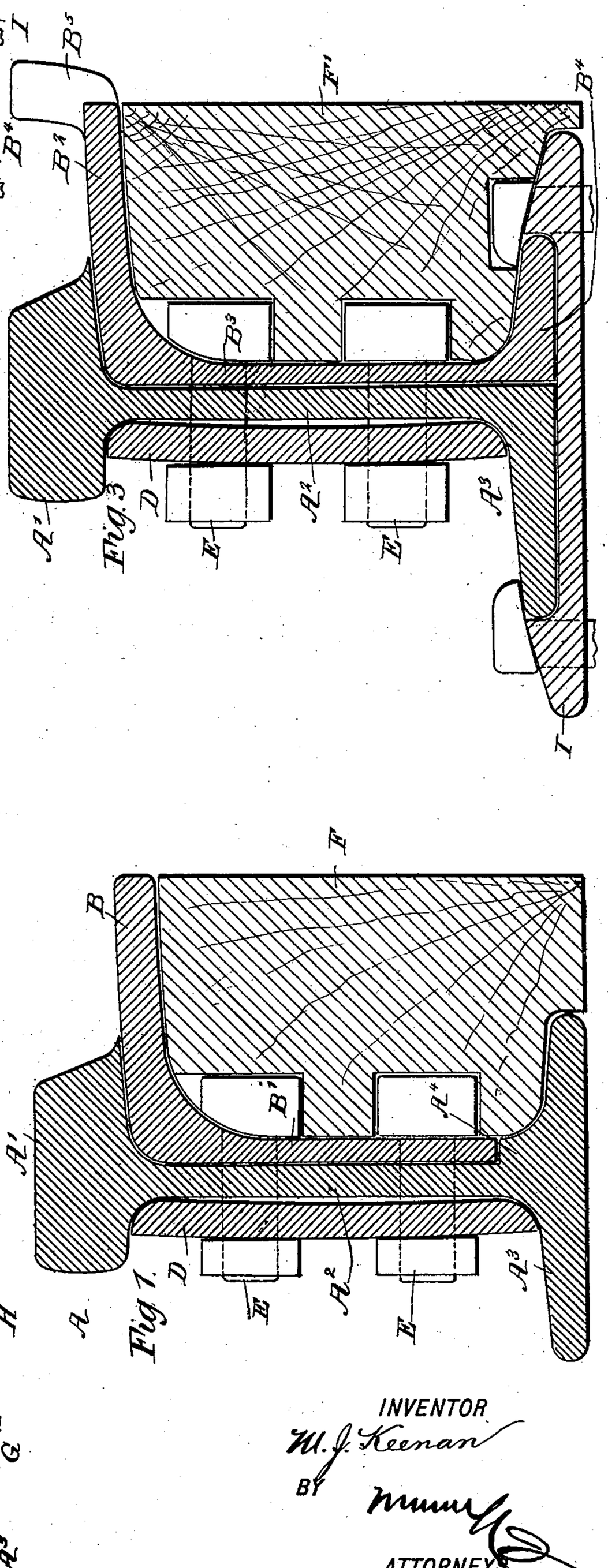
Fig. 3.

Fig. 1.

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MICHAEL J. KEENAN, OF GALVESTON, TEXAS.

RAILROAD-RAIL.

SPECIFICATION forming part of Letters Patent No. 507,012, dated October 17, 1893.

Application filed February 10, 1893. Serial No. 461,769. (No model.)

To all whom it may concern:

Be it known that I, MICHAEL J. KEENAN, of Galveston, in the county of Galveston and State of Texas, have invented a new and Improved Railroad-Rail, of which the following is a full, clear, and exact description.

The object of the invention is to provide a new and improved railroad rail, which is simple and durable in construction, arranged to present a jointless rail to the car wheel, and more especially designed for use on street railroads.

The invention is an improvement in the class of railroad rails which are composed of track or running rails proper and supplementary rails bolted to the track rails and having a laterally-projecting top portion which serves as a wheel guard or lateral brace for the track rails.

The improvement is hereinafter set forth.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which similar letters of reference indicate corresponding parts in all the figures.

Figure 1 is a cross section of the improvement. Fig. 2 is a reduced side elevation of the same with parts in section. Fig. 3 is a cross section of a modified form of the improvement. Fig. 4 is a reduced side elevation of the same with parts in section. Fig. 5 is a reduced cross section of the same as applied; and Fig. 6 is a cross section of another modified form of the improvement.

The improved street railroad rail is composed of main track rails A, and flange rails B, arranged on the inside of the main track rails A, and breaking joints with the latter, as plainly illustrated in Figs. 2 and 4. The main track rail A is provided with a head A′, the web A^2, and the base A^3, which may extend on both sides, as shown in Figs. 1, 2 and 6 or on one side only, as shown in Figs. 3, 4 and 5. The inner edge of the head A′ is beveled, as plainly shown in the drawings, the bevel terminating at its lower base end on top of the flange rail B, which is formed in the shape of an angle iron, and has its arm B′ fastened by bolts E or other means, to the inside of the web A^2 of the main track rail A. The lower edge of the arm B′ of the flange rail B is preferably seated on the shoulder A^4 formed in the base A^3 on the inner side of the web A^2, as plainly illustrated in Figs. 1 and 6, or the said arm is formed at its lower end with a base B^4, as shown in Figs. 3, 4 and 5, to form a continuation of the flange of the main track rail A. The main track rails A are connected with each other at their joints by fish plates D held in place by bolts E, also passing through the arm B′ of the respective flange rail B. As shown in the drawings, the fish plate D is slightly curved so that its ends only rest against the outer face of the web A^2 near the head A′ and the base A^3, so that when the nuts of the bolts E are drawn up, each fish rail will sufficiently give to securely draw the arm B′ of the respective flange rail against the web A^2 of the main rail to securely hold the same in place. The flange rail B rests on the usual block F forming part of the pavement, the said block being fitted under the rail, as plainly shown in Fig. 1. As shown in Fig. 6, the outer end of the flange rail B is supported on an angle iron G running parallel with the track rail A, and connected with the outermost block H of the pavement.

As illustrated in Fig. 3, the bases A^3 and B^4 of the rails A and B, are fitted into a longitudinally-extending groove formed in the top of a chair I secured to each railroad tie by means of spikes, as indicated in the said figure. In this case, the paving block F′ is shaped at its bottom edge to conform partly to the base B^4 and the inner end of the chair I.

For crossings, curves and similar places, I provide the flange rail B with a guard rail B^5, as indicated in Fig. 3. It will be seen that by this improvement the main track rail breaks joints with the flange rails, so that the flange of the car wheel travels on the said flange rails at the time the tread of the wheel passes over the joint between the two main track rails A.

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

The combination, with a series of aligned main track rails, and rails, B, having a lateral top flange and fitting beneath the heads of the track rails, of the angle irons, G, running parallel to the latter and supporting the flanges of the rails, B, as shown and described.

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Witnesses:
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