To all whom it may concern:

Be it known that I, SAMUEL SZNUTCHKO, a citizen of the United States of America, residing at Oakdale, in the county of Allegheny and State of Pennsylvania, have invented certain new and useful Improvements in Metallic Ties and Rail-Fasteners, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to certain new and useful improvements in metallic ties and rail-fasteners; and the invention has for its object to provide a simple and inexpensive metallic tie to which rails can be easily and quickly fastened.

My invention aims to dispense with the ordinary wooden tie or sleeper and provide a more durable tie wherein the use of spikes is dispensed with and more positive means provided for preventing the displacement of a rail.

To this end I have devised a tie having integral and detachable fasteners; also, a novel chair for securing the confronting ends of two sections of rails together.

The detail construction of my improved metallic tie and rail-fastener will be presently described and then specifically pointed out in the appended claim.

Referring to the drawings forming part of this specification, like numerals of reference designate corresponding parts throughout the several views, in which—

Figure 1 is a perspective view of my improved tie and rail-fastener. Fig. 2 is an elevation, partly in section. Fig. 3 is a perspective view of a detachable fastener. Fig. 4 is a cross-sectional view of a chair employed for securing the confronting ends of two sections of rails together. Fig. 5 is a perspective view of a locking-bolt used in connection with the chair illustrated in Fig. 4, and Fig. 6 is a detail sectional view of a portion of the same.

My improved tie comprises a metallic structure having integral fasteners adapted to lie over the base-flanges 3 of rails 4. The fasteners 2 hold the rails 4 from lateral displacement in one direction, while detachable fasteners prevent lateral displacement in the opposite direction. The detachable fasteners 5 are provided with depending rectangular shanks 6, adapted to pass through openings 7 in the tie. The ties are recessed adjacent to their ends, as at 7a, to permit of easy access being had to the shanks 6 of the detachable fasteners 5. The lower ends of the shanks 6 are recessed, as at 1a, and in said recesses are mounted spring-held latches 2a, these latches being adapted to recede when the fasteners are passed through the openings 7 of the tie and assume their normal position when the fasteners have been correctly positioned, the latches preventing the fasteners from becoming displaced with relation to the tie.

In connection with the tie and fasteners just described I employ a chair for securing together the confronting ends of two sections of rails. The chair 10 has fish-plates 11 to engage the web portions of the rails 4 and support the head of said rails. The rails are secured within the chair 10 by locking-bolts 12, said bolts passing through the fish-plates 11 and the web portions of the rails and having latches 2a similar to the fasteners 5.

My invention particularly resides in the novel construction of the metallic tie and its rail-fasteners, said fasteners preventing the spreading of rails, and thereby reducing the number of accidents heretofore incurred by defective track construction.

What I claim, and desire to secure by Letters Patent, is—

A metallic tie and rail-fastener embodying a structure having recesses formed in its sides, fasteners carried by the top of said structure, detachable fasteners alining with the first-mentioned fasteners, shanks carried by said detachable fasteners and extending into said recesses, spring-held latches mounted in said shanks and adapted to lock said detachable fasteners in engagement with said tie.

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

SAMUEL SZNUTCHKO.

Witnesses:
K. H. BUTLER,
MAX H. SKOLOVITZ.