J. T. CLARK.

Improvement in Railway-Track Anchors.

No. 131,501. Patented Sep. 24, 1872.

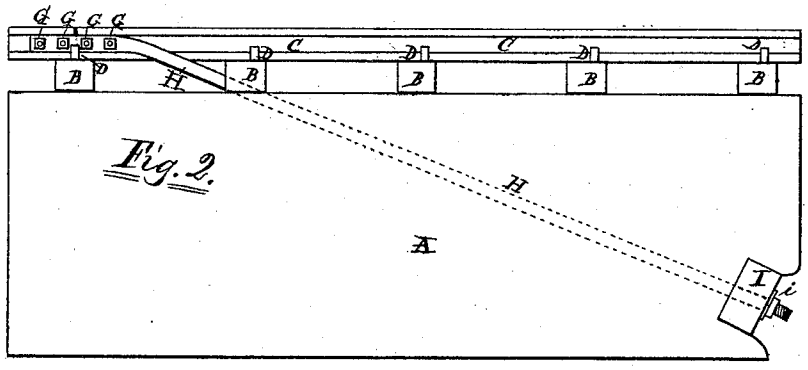

Fig. 2.

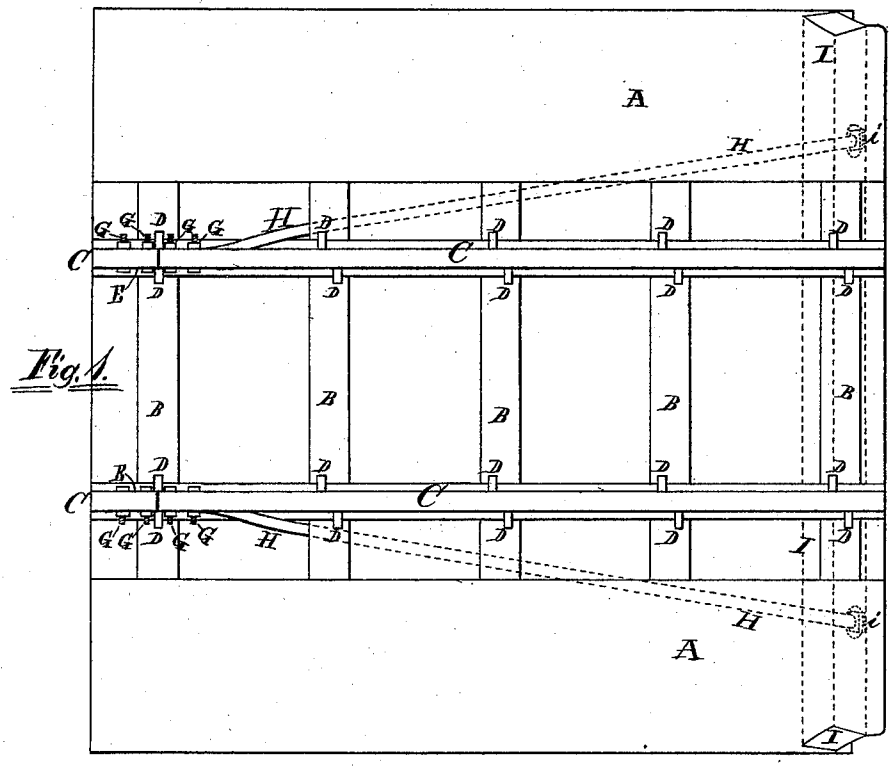

Fig. 1.

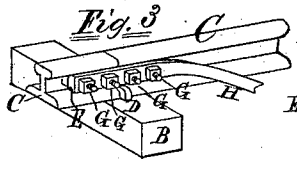

Fig. 3

Fig. 4

Witnesses:
Platt R. Richards
M. H. Barringer.

Inventor,
James T. Clark,
by W. B. Richards,
atty.

UNITED STATES PATENT OFFICE.

JAMES T. CLARK, OF GALESBURG, ILLINOIS.

IMPROVEMENT IN RAILWAY TRACK-ANCHORS.

Specification forming part of Letters Patent No. **131,501**, dated September 24, 1872.

To all whom it may concern:

Be it known that I, JAMES T. CLARK, of Galesburg, county of Knox and State of Illinois, have invented certain Improvements in Railway Track-Anchor, of which the following is a specification:

My invention has for its object securing the rails in an ordinary railway track against longitudinal displacement by passing trains or other causes; and the invention consists in connecting the rails from the joints or other places by a bar or rod with an anchor buried transversely with the track in the solid earth of the road-bed, all as hereinafter fully described.

Description of the Accompanying Drawing.

Figure 1 is a top or plan view of a section of railway embodying my invention. Fig. 2 is a side elevation of Fig. 1. Fig. 3 is a perspective view of a portion of Fig. 1. Fig. 4 is a sectional view of a portion of Fig. 1.

General Description.

A represents the embankment or road-bed of an ordinary railway; B B B B B, the cross-ties; C C, the rails; D D D D D, the spikes for securing the rails to the cross-ties; and E, the ordinary fish-plate for securing the adjacent ends of two contiguous rails. G G G G are ordinary fished-joint bolts. H H are wire cables, and I the anchor. The forward ends of the cables H are made somewhat heavier than the ordinary fish-plate, and are pressed to fit accurately against the web, the head, and the lower flange of the rail, as shown at Fig. 4, and are pierced with holes to correspond with the holes in the fish-plate E and in the web of the rail C for the reception of the fish-joint bolts G G G G. The anchor I consists of a beam of wood or other material, somewhat longer than the track is in width, and buried transversely beneath the track sufficiently deep that the solidity of the material and superincumbent earth may hold it firmly in place, and should be buried some distance from the rail-joint or point at which the forward ends of the cables are attached to the rails in order to bring the strain on the cables in an advantageous direction. The cables H H are threaded at their rear ends, and passed through holes in the anchor I, where they are secured by nuts *i i*. Their central portions extend from the anchor I forward through the road-bed, as shown by dotted lines at Figs. 1 and 2, to the outer or nut side of the fished joints, or other position on the outer side of the rails, where they are curved, as shown, to allow their forward ends to rest in the position already described.

In the drawing the common T-rail is shown, but the invention may be used with any style of rail by fitting the forward ends of the cables accurately to the side of the rail, thereby saving the fastening-bolts from wearing off too rapidly. In case it is desired, the cables may be secured to the sides of the rails at any other position than the joints by simply drilling the necessary holes through the web of the rail.

These anchors may be used in any positions where the rails are liable to creep, at long-descending grades, at switches where the crowding of the rails longitudinally often interferes with the operation of setting the switches, and in any other desired situations, and will hold the rails effectually without disturbing the cross-ties, as is the case when the rails are secured thereto. The number of anchors may be regulated by the necessities of each particular case.

Claim.

The cables H H and beam I when arranged to operate with the rails C C and road-bed A, substantially as described, and for the purpose specified.

JAMES T. CLARK.

Witnesses:

SAML. N. GROSE,

M. H. BARRINGER.