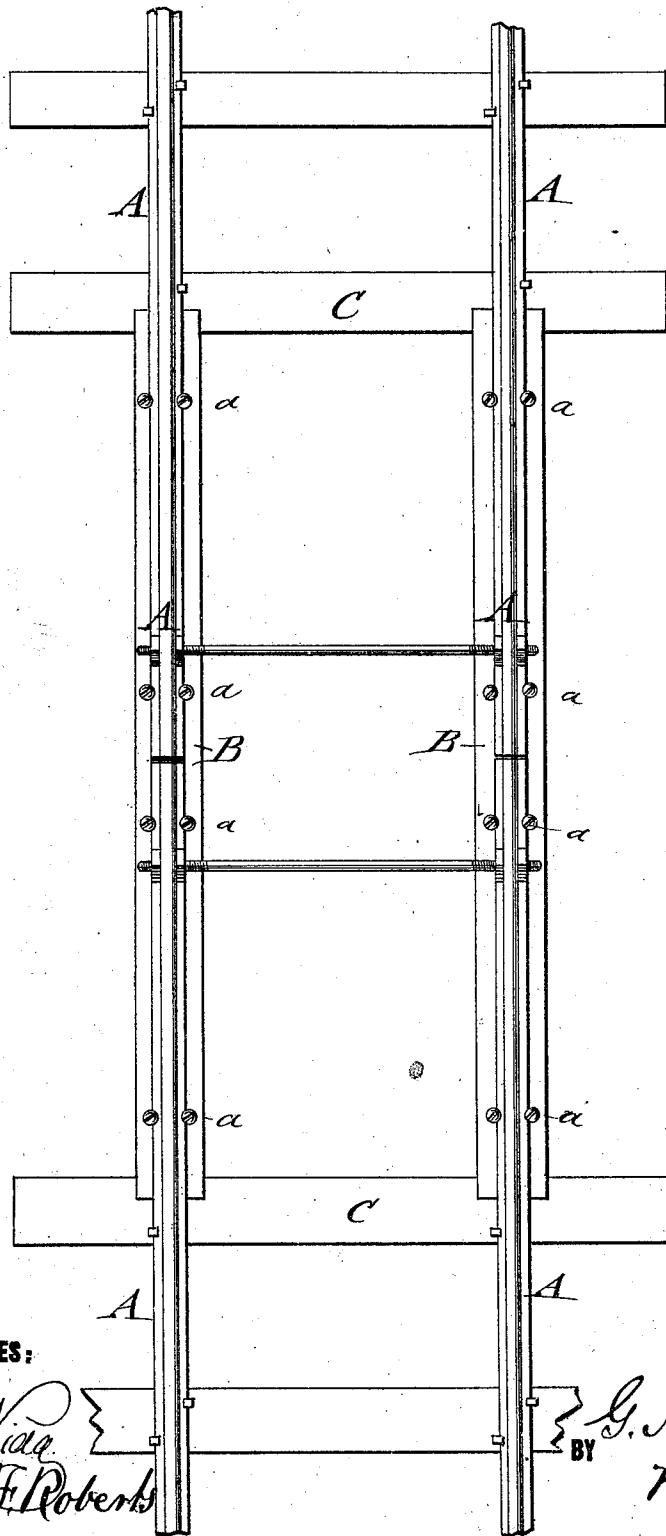


G. N. HODGDON.
RAILROAD RAIL-JOINT.

No. 173,541.

Patented Feb. 15, 1876.



WITNESSES:

Chas. Nida
Alex. F. Roberts

INVENTOR:

G. N. Hodgdon
BY *Munn & Co.*
ATTORNEYS.

UNITED STATES PATENT OFFICE

GEORGE N. HODGDON, OF ENFIELD, NEW HAMPSHIRE.

IMPROVEMENT IN RAILROAD-RAIL JOINTS.

Specification forming part of Letters Patent No. **173,541**, dated February 15, 1876; application filed November 6, 1875.

To all whom it may concern :

Be it known that I, GEORGE N. HODGDON, of Enfield, Grafton county, New Hampshire, have invented a new and Improved Rail-Joint, of which the following is a specification:

The accompanying drawing represents a top view of my improved rail-joint.

The object of my invention is to provide an improved joint for the meeting ends of rails, so that the battering of the same and the wear and tear of the rolling-stock are diminished, and a reliable and steady support at the joints provided.

The invention consists in placing the rail ends on longitudinal sleepers, which are, at a suitable distance from the joint, connected to the lateral ties, the rails being attached by wood-screws to the sleepers and braces in lateral direction near the joint.

In the drawing, A are railway-rails, which are, at their joints, placed on longitudinal sleepers B, to which the rail ends are securely fastened by wood-screws *a*, applied to both sides of the rails. Two or three cross-ties at both sides of the joint are taken out to provide for the sleepers. The spreading of the track on the sleepers is prevented by two lateral iron rods, connecting the rails, and passing through the fish-plate of the joints, dispensing with the bolts of the same. The cross-ties C, at both ends of the sleepers B, are

placed close up to the same, and attached to the sleepers, if desired, furnishing with them a continuous bearing of considerable length, in place of the narrow bearing of the common cross-ties under the joints. The support given to the rail at both sides of the joints resists more effectually the uneven pressure of the rolling-stock, and provides a steadier rail-joint, that is less exposed to the battering action of the wheels, and, in return, exerts a less injurious influence on the rolling-stock.

The cost for repairs of rails and stock is thereby reduced by a simple joint-support, which is less expensive and simpler than the present fish-plate connection.

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

As an improvement in rail-joints, the combination of the rails, which are laterally braced at their meeting ends, with longitudinal sleepers, that extend on both sides of the joint, and are bound by the cross-ties at both ends, to provide a steady, continuous bearing for the rails, substantially as specified.

GEORGE NAYLOR HODGDON.

Witnesses:

JAMES F. BRYANT,
A. C. FIFIELD.