

G. LEHLBACH.
 Railway-Track.

No. 200,737.

Patented Feb. 26, 1878.

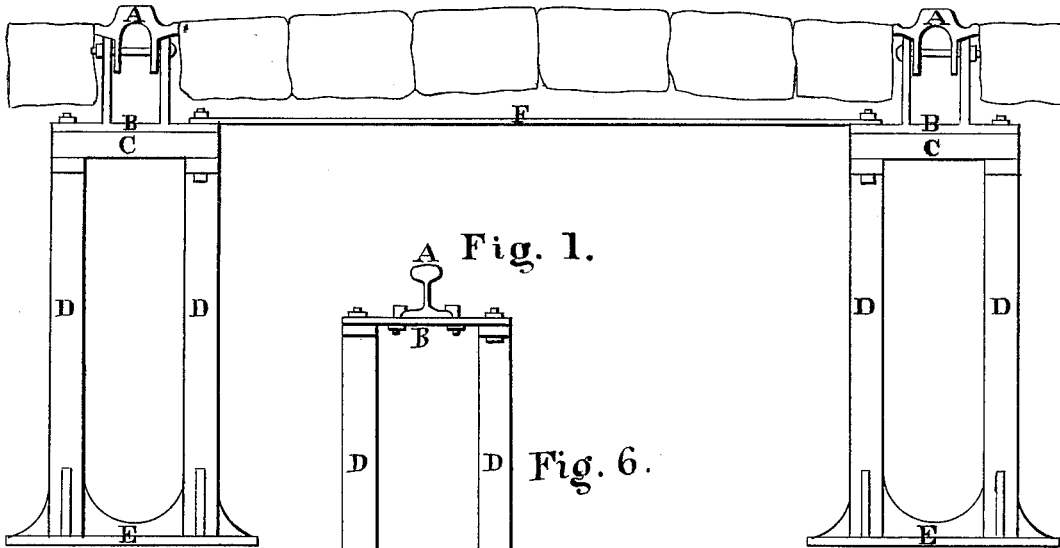


Fig. 1.

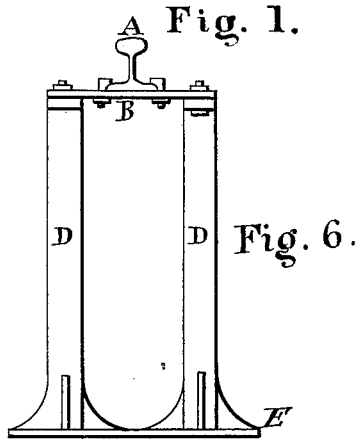


Fig. 6.

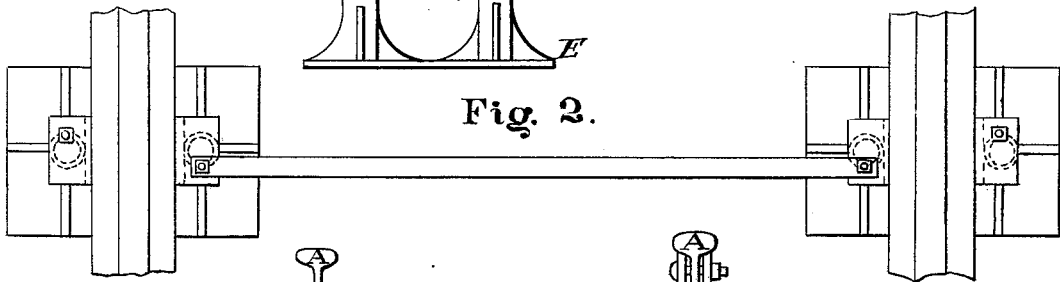


Fig. 2.

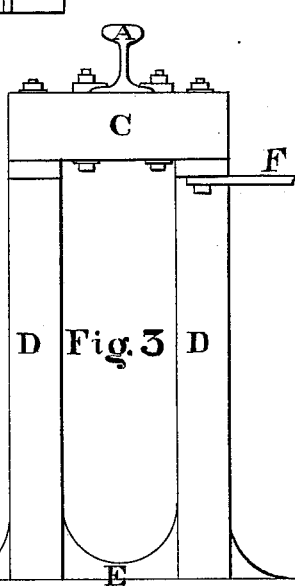


Fig. 3.

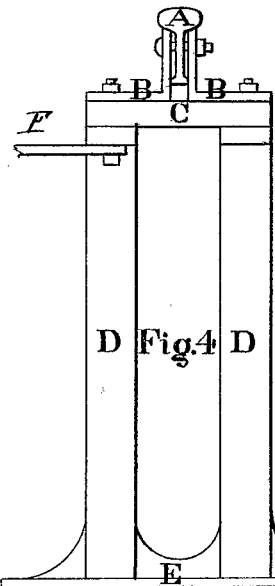


Fig. 4.

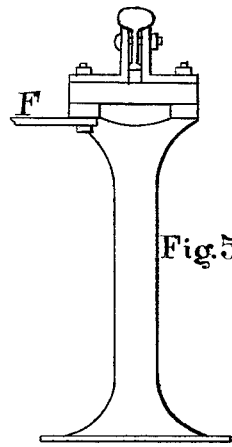


Fig. 5.

Attest:

Olin Drake,
P. J. Amblee.

Inventor:

Gustav Lehlbach

UNITED STATES PATENT OFFICE.

GUSTAV LEHLBACH, OF NEWARK, NEW JERSEY.

IMPROVEMENT IN RAILWAY-TRACKS.

Specification forming part of Letters Patent No. **200,737**, dated February 26, 1878; application filed October 8, 1877.

To all whom it may concern:

Be it known that I, GUSTAV LEHLBACH, of the city of Newark, in the county of Essex and State of New Jersey, have invented certain new and useful Improvements in Permanent Way for Steam and Horse Railways; and I do hereby declare that the following is a full, clear, and exact description of my invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification.

This invention relates more particularly to the construction of the tracks and their supports, which improvements are set forth in the following specification and accompanying drawing, in which—

Figure 1 is a front view of the improvement as applied to horse-railway tracks with a center bearing-rail, A A being the rails; B B, the iron or steel chair-plates; C C, the wooden cushion-blocks; D, the bearing-columns of the pedestal; E, the foundation bed-plates of the same, (the pedestals in this illustration of the invention being designed for cast-iron,) and F, the tie-rod used to keep the track in gage. The parts are fastened together by bolts or other appropriate device, substantially as shown and indicated in Fig. 1.

Fig. 2 is a horizontal plan of the above Fig. 1.

Fig. 3 shows the application of the invention to the ordinary web-footed rail, which is principally used in this country upon steam-railways, A being the rail; C, the wooden chair-block; D E D, the pedestal, designed, in this illustration of the invention, for cast-iron; and F, the iron tie-rod, the parts being fastened together substantially as indicated in the figure.

Fig. 4 shows the application of the invention to a single-headed T-rail, in which A is the rail; B, the iron or steel chair-plate, in two parts; C, the wooden cushion-blocks; D E D, the pedestal; and F, the iron tie-rod, the parts being fastened together substantially as shown in the figure.

Fig. 5 shows the application of the invention combined with a single-column pedestal.

The objects of the invention are, first, to

furnish a uniformly-elastic bearing for the track and its load upon an unyielding foundation; second, to substitute a more durable material in the construction of permanent ways for wood, which is the material now principally used.

The required elastic bearing for the track and its load is provided for by the iron or steel chair-plates with wooden cushion blocks, as shown and indicated in Figs. 1, 2, 4, and 5, or by a single wooden chair-block, as shown in Fig. 3, or by chair-plates alone, of elastic metal, resting on the pedestals, as shown in Fig. 6, the weight and the blow of the rolling load being taken by the suspended portion of the chair-plate or wooden chair-block, between two abutments upon unyielding foundations, as indicated in the figures, the unyielding foundation being furnished by the bed-plates of the pedestals, which are proportioned in superficial area to the bearing capacity of the character of the material upon which they are to rest and to the load they are to bear.

By lengthening or shortening the bearing column or columns of the pedestals the foundation bed-plates can be placed at such distances below the surface as to conform to the requirements of different climates for secure foundations.

Having thus described my invention, I claim—

1. The combination, with the rail A, of the chair-plate B and pedestals D E D, arranged to operate as and for the purposes herein set forth.

2. The combination, with the rail A, of the chair-plate B, cushion-block C, and supporting-pedestals D E D, as and for the purposes set forth.

3. The combination, with the rail A, of the wooden chair-block C, in Fig. 3, and the supporting-pedestals D E D, substantially as and for the purposes set forth.

In testimony that I claim the foregoing as my own I hereto affix my signature in presence of two witnesses.

GUSTAV LEHLBACH.

Witnesses:

OLIVER DRAKE,
P. J. INSLEE.