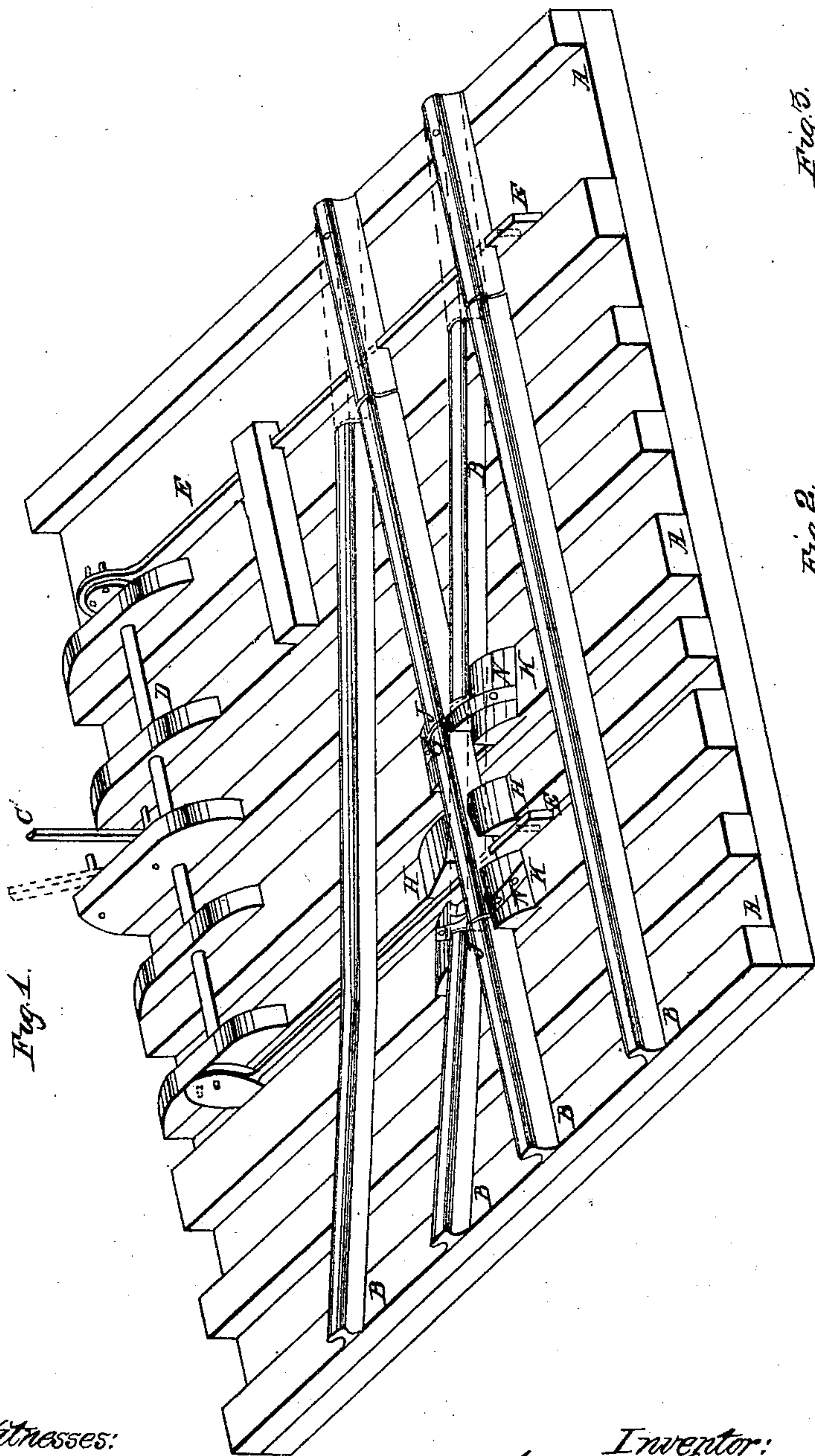


*J. S. Brothers.*

*Railroad Switch.*

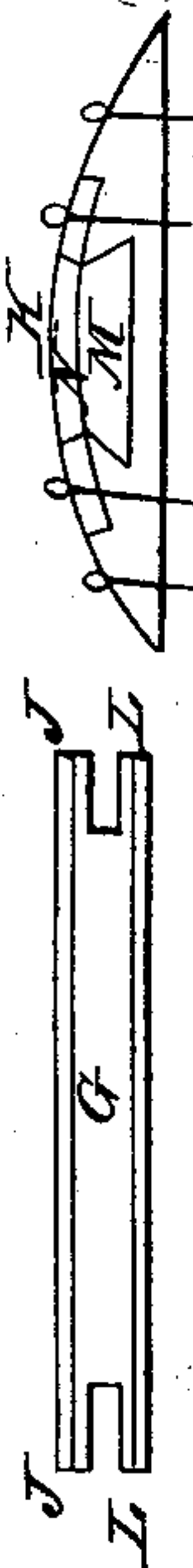
*N<sup>o</sup> 64,833.*

*Patented May 21, 1867.*



*Fig. 1.*

*Fig. 2.*



*Witnesses:*  
*G. D. Smith*  
*Charles C. J. Lewis.*

*Inventor:*  
*James S. Brothers*  
*By* *John A. H. H. H.*  
*John A. H. H. H.*

# UNITED STATES PATENT OFFICE.

JAMES S. BROTHERS, OF DUNCANNON, PENNSYLVANIA.

## IMPROVED RAILWAY-SWITCH.

Specification forming part of Letters Patent No. **64,833**, dated May 21, 1867.

*To all whom it may concern:*

Be it known that I, JAMES S. BROTHERS, of Duncannon, of the county of Perry and State of Pennsylvania, have invented a new and useful Improvement in Railway-Switches; and I do hereby declare the following to be an exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, making a part of this specification.

The nature of my invention consists in the construction of the chair and the adjustable frog in combination.

Figure 1 represents a perspective view of the railway and switch. Fig. 2 shows the construction of the square forked ends of the frog, and Fig. 3 is an end view of the chair.

A represents the common cross-ties; B, the ordinary rails; C, the main lever that operates the roller D and levers E E, common to switches. G is the frog or pivot rail, operating at its center in the dovetail of the chair

H, but without a pivot or bolt running through it. The ends of the frog G are forked, and the top prongs J J operate on the tops of the chairs K K, while the lower prongs L L move in the dovetails M M of the chairs K K. The chairs K are to be made of cast or wrought iron, and with wrought-iron guards N bolted down across them, to assist in keeping the frog-rail G from rising, and under which each opposite corner or prong L of the frog is firmly held. The frog G is adjusted by a notch or pins in the lever E.

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

The construction of the chair K with the adjustable frog G, when arranged, combined, and operated as herein described, and for the purposes set forth.

JAMES S. BROTHERS.

Witnesses:

SAMUEL SHELLER,

JNO. CHARTERS.