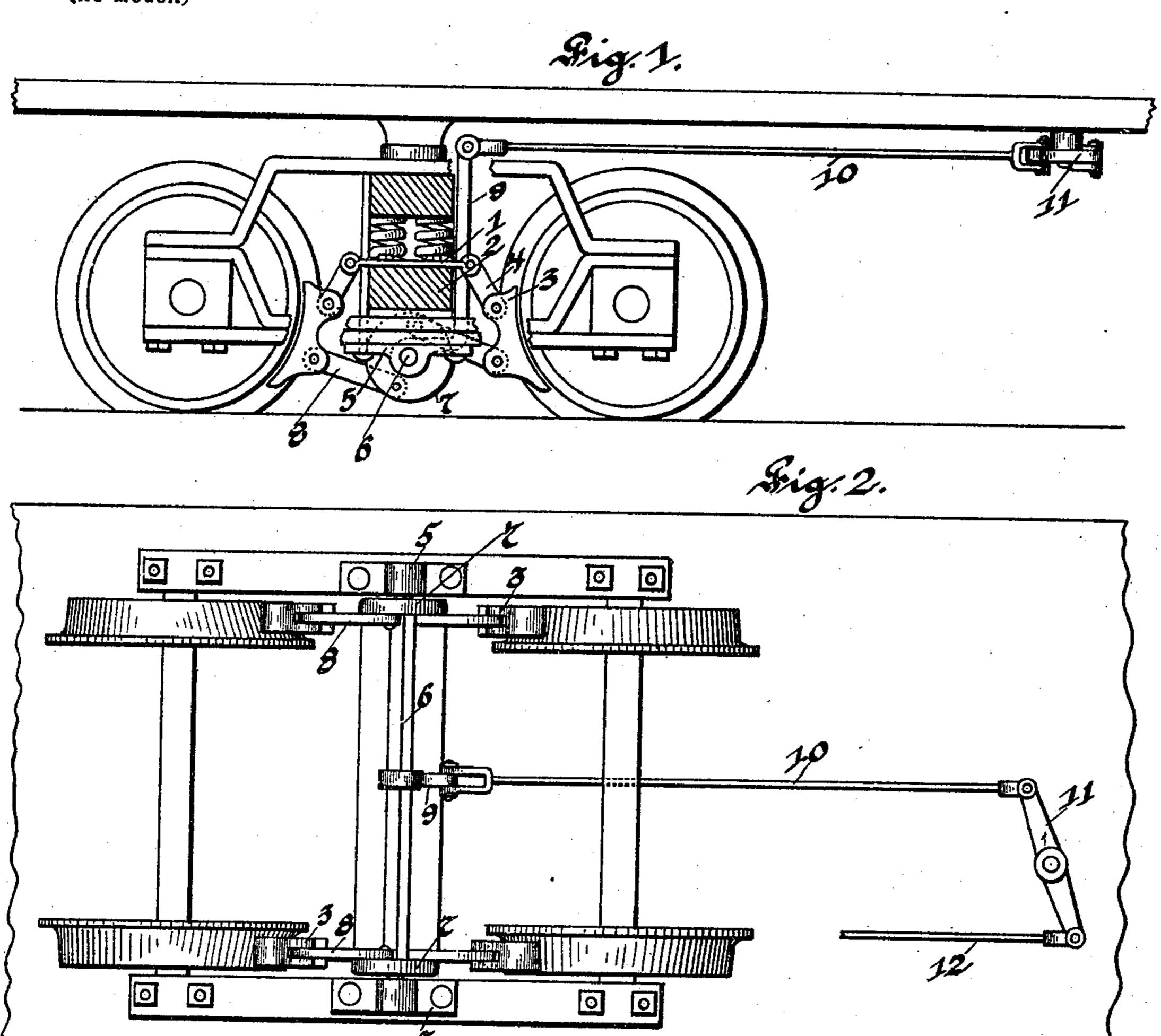
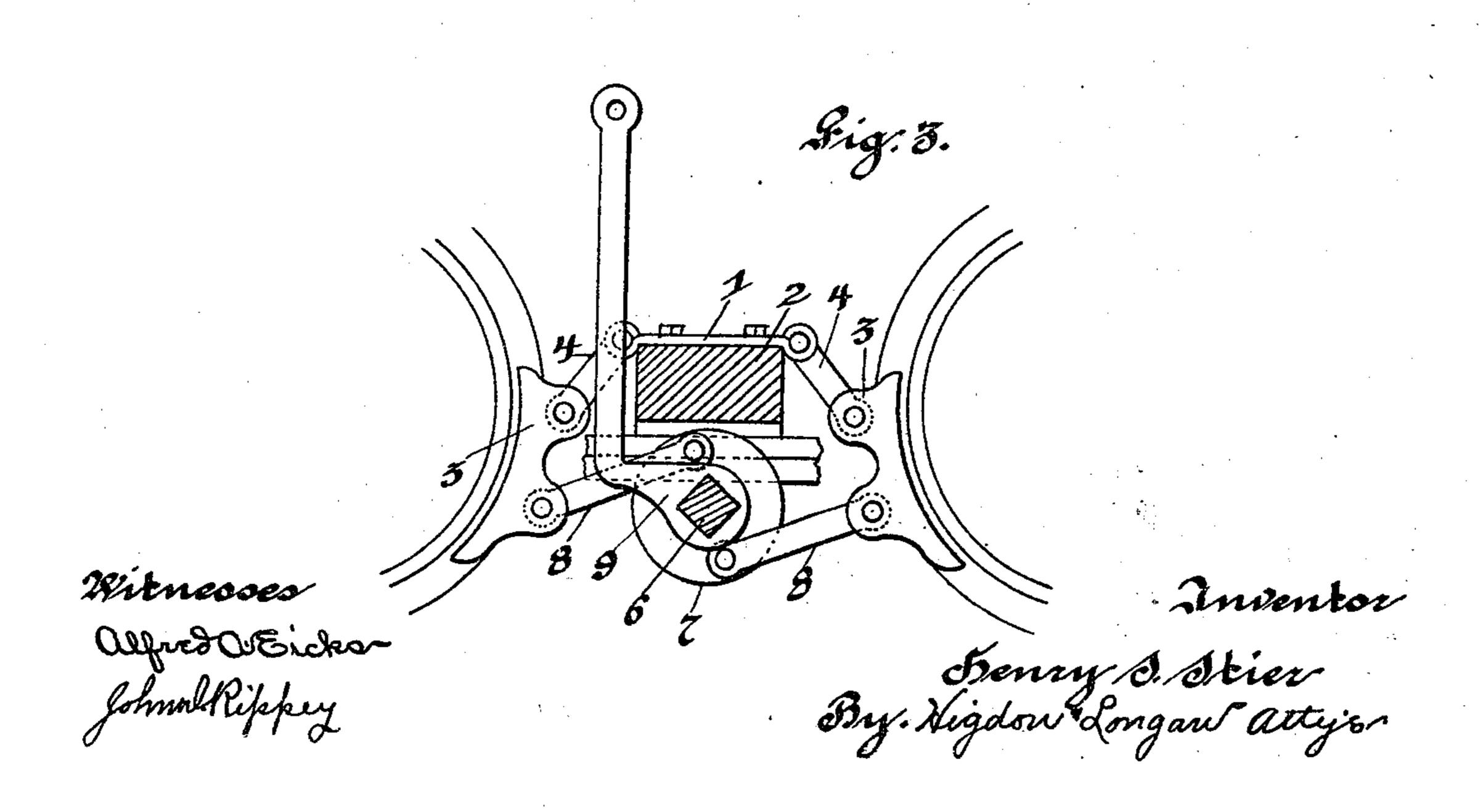
## H. S. STIER. CAR BRAKE.

(Application filed June 10, 1901.)

(No Model.)





## United States Patent Office.

HENRY S. STIER, OF ST. LOUIS, MISSOURI.

## CAR-BRAKE.

SPECIFICATION forming part of Letters Patent No. 684,124, dated October 8, 1901.

Application filed June 10, 1901. Serial No. 63,977. (No model.)

To all whom it may concern:

Be it known that I, HENRY S. STIER, of the city of St. Louis, State of Missouri, have invented certain new and useful Improvements in Car-Brakes, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings, forming a part hereof.

This invention relates to car-brakes; and it consists of the novel construction, combination, and arrangement of parts hereinafter

shown, described, and claimed.

Figure 1 is a side elevation of a car-brake with parts removed, showing my improved brake in position. Fig. 2 is a bottom plan view of the truck. Fig. 3 is a section showing the connection between the brake-shoes and the transverse rod whereby the shoes are applied.

In constructing my improved brake the plate 1 is secured to each end of the lower bolster 2, and the brake-shoes are pivotally connected to the plates 1 by means of the links 4. The plates 1 are in alinement with the car-wheels, so that the brake-shoes will be applied to the wheels whenever the operating-rod is moved.

5 indicates bearings which are secured to the lower parts of the truck-frames, and the 30 transverse rod 6 is journaled in the said bearings 5. A disk 7 is fixed to each end of the rod 6 in alinement with the brake-shoes, and the connecting-rods 8 have their inner ends pivoted to the said disk 7, and their outer ends are connected to the brake-shoes. The ends of the connections 8 are secured to diametrically opposite sides of the disk, so that when the disk is turned in one direction it will apply the brake-shoes to the wheels and when turned in the opposite direction the brake-

shoes will be removed. A lever 9 has its lower end fixed to the rod 6 and projects upwardly above the truck-frame. A connecting-rod 10 is connected to the upper end of the said lever 9, and the opposite end of the said rod 10 45 is connected to a lever 11, which is pivotally supported by some portion of the car-body.

12 indicates a connecting-rod interposed between the lever 11 and the usual brake mechanism, whereby the different parts may 50

be operated to apply the brakes.

My improved brake is simple in construction and employs only one lever to apply the brakes in a single truck. The movement of the operating-lever 9 turns the rod 6 in its 55 bearing, and the connections 8 are operated to force the brake-shoes against the surfaces of the car-wheels, where they may be held as long as desired.

When the lever 9 is released, the brake- 60 shoes will automatically move away from the wheels to their normal positions.

I claim—

In a car-brake, a supporting-plate secured to each end of the lower bolster, links pivoted 65 to said plates, brake-shoes connected to said links, a transverse rod supported below the lower bolster, a disk fixed to each end of said rod, rods 8 connecting the said disks to the brake-shoes so that when the rod is turned 70 the brake-shoes will be applied to or removed from, the wheels, and a single operating-lever connected to said rod, substantially as specified.

In testimony whereof I affix my signature 75 in presence of two witnesses.

HENRY S. STIER.

Witnesses:

ALFRED A. EICKS, JOHN D. RIPPEY.