

B. N. CARPENTER.

Running Gear.

No. 94,397.

Patented Aug. 31, 1869.

Fig 1.

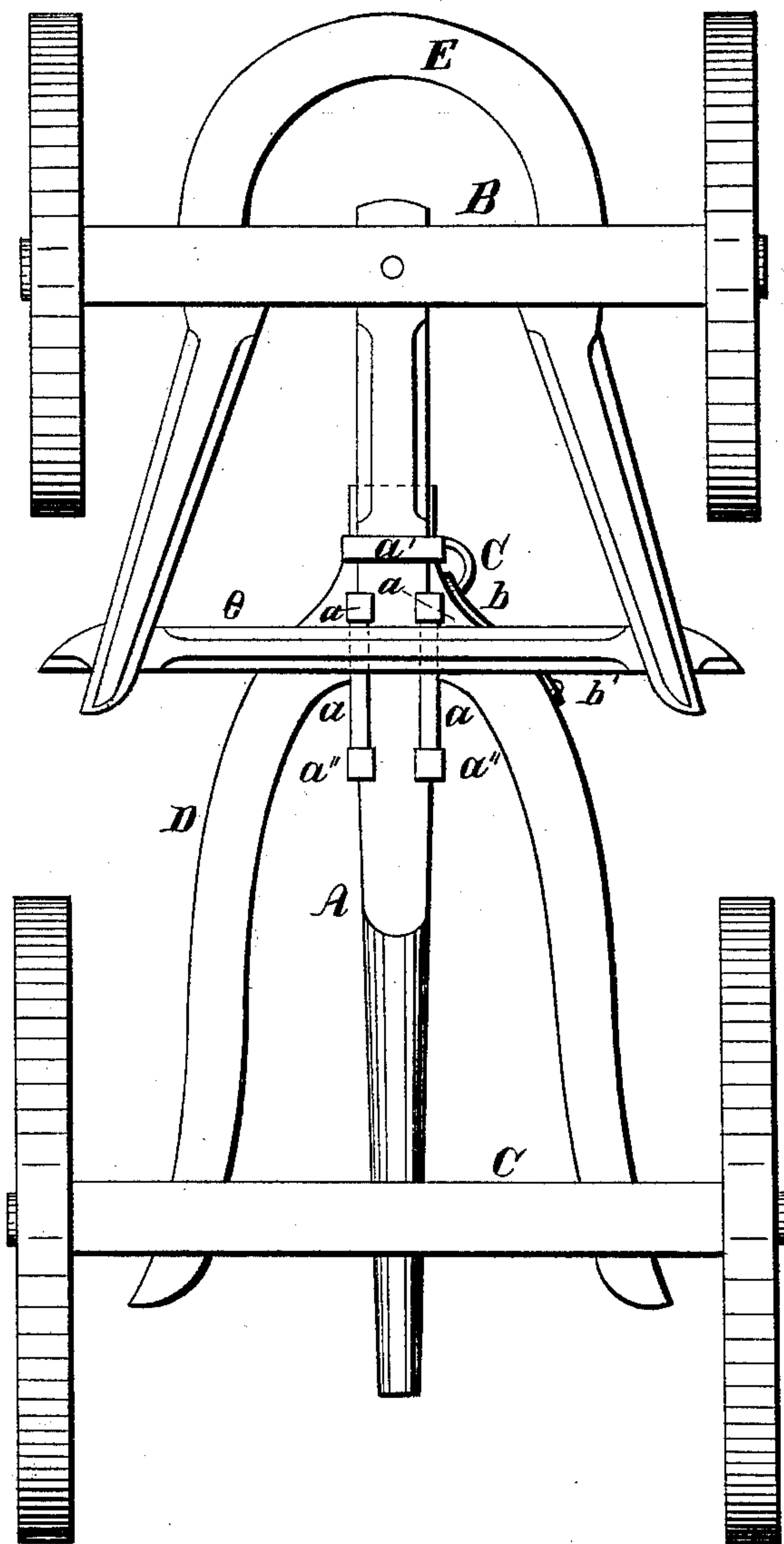


Fig 2.

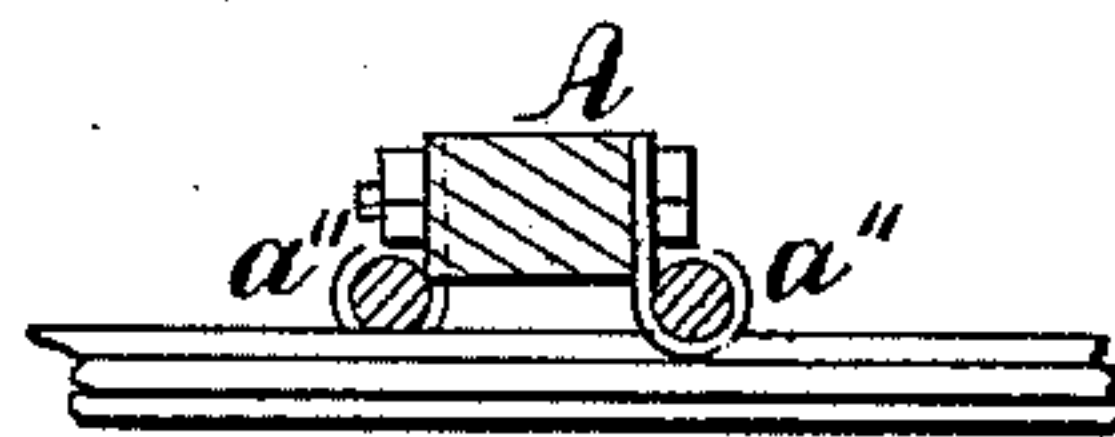
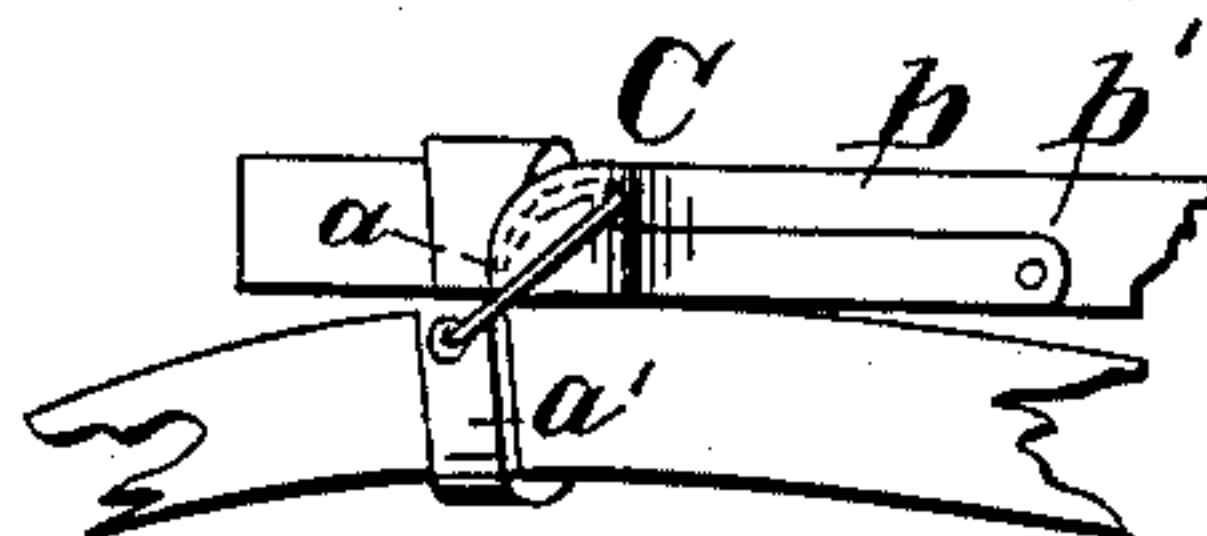


Fig 3.



Witnesses:

E. A. Pettis
Wm. R. Robinson

Inventor:

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United States Patent Office.

B. N. CARPENTER, OF MOUNT JACKSON, VIRGINIA.

Letters Patent No. 94,397, dated August 31, 1869.

IMPROVEMENT IN VEHICLES.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, B. N. CARPENTER, of Mount Jackson, in the county of Shenandoah, and State of Virginia, have invented a new and useful Improvement in Vehicles; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the accompanying drawings, making a part of this specification, in which—

Figure 1 is a plan view;

Figure 2, a transverse vertical section; and

Figure 3, a side elevation.

This invention consists in providing, upon the under side of the bar which couples the forward and rear axles of a wagon, and longitudinally of the same, two or more friction-rollers, against which the triangular frame that forms the rear part of the tongue may play, as the forward axles turn to one side or the other, the arrangement taking the place of a fifth-wheel; also, in confining the front end of the frame, that projects forward from the rear axle, to the coupling-bar, by means of a flexible band, the two ends of which are fastened together, by a pivoted and hooked lever, in such a manner that they may be easily disconnected when necessary, and the rear axle drawn further along or further back on the coupling-bar at pleasure.

In the drawings—

A represents the coupling-bar.

To the under part of the coupling-bar is attached, in any suitable manner, a pair of friction-rollers, *a a*, one on each side.

The upper surface of the sliding bar *c*, that forms the rear part of the frame E, attached to the back end of the tongue, rubs against the rollers *a*, as the bar plays from side to side, according to the direction of the forward axle. The rollers form a cheap and efficient substitute for a fifth-wheel.

The rollers, being adjustable vertically through the operation of set-screws, as shown in fig. 2, form a stop, to limit the descent of the tongue toward the earth, at any desired point.

The front end of the frame D, that projects forward from the rear axle, is joined to the coupling-bar by means of a flexible band, *a'*, one extremity of which is fastened to the end of the frame, and in the other extremity is a link, *c*.

A lever, *b*, is pivoted, at its hooked end, to the frame D, over the fixed extremity of the band *a'*.

To fasten the frame and coupling-bar together, place the link *c* upon the hook of the lever *b*, and then draw the lever down, so as to bring the two ends of the band *a'* together, until the lever can be slipped under a catch, *b'*, in the side of the frame. The frame D and coupling-bar are then firmly joined.

The band *a'* also serves to cover and keep in place the bolt that passes through the frame D and bar.

To disconnect these two parts, remove the lever *b* from beneath the catch *b'*, and raise it so that the link *c* may be taken off from the hook, and the band *a'* raised from the bolt. The latter may then be taken out, and the frame drawn back or forward along the axle, as it may be desired to increase or decrease the distance between the front and rear wheels.

The sockets *a''*, in which the friction-rollers *a* are placed, have slots in them, and, by means of set-screws, may be set on the coupling-bar so as to give room for vertical play to the tongue.

Having thus described my invention,

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

1. The adjustable friction-rollers *a''*, combined with the coupling-bar A, in the manner and for the purpose described.

2. The flexible band *a'*, combined with the link *c* and hooked lever *b*, as and for the purpose specified.

To the above specification of my improvement, I have set my hand, this 29th day of June, 1869.

B. N. CARPENTER.

Witnesses:

CHAS. A. PETTIT,
WM. R. ROBINSON.