

M. V. NICHOLS.  
Vehicles.

No. 144,473.

Patented Nov. 11, 1873.

Fig. 4.

Fig. 1.

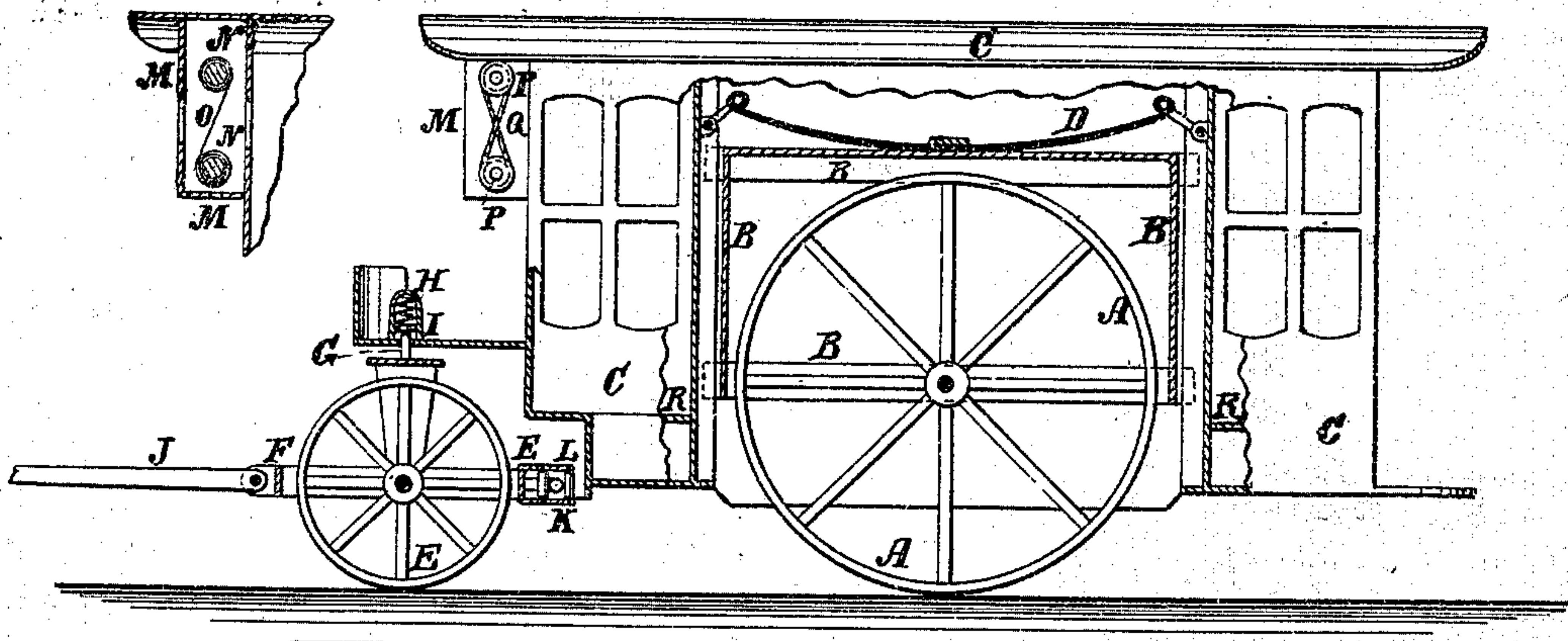


Fig. 2.

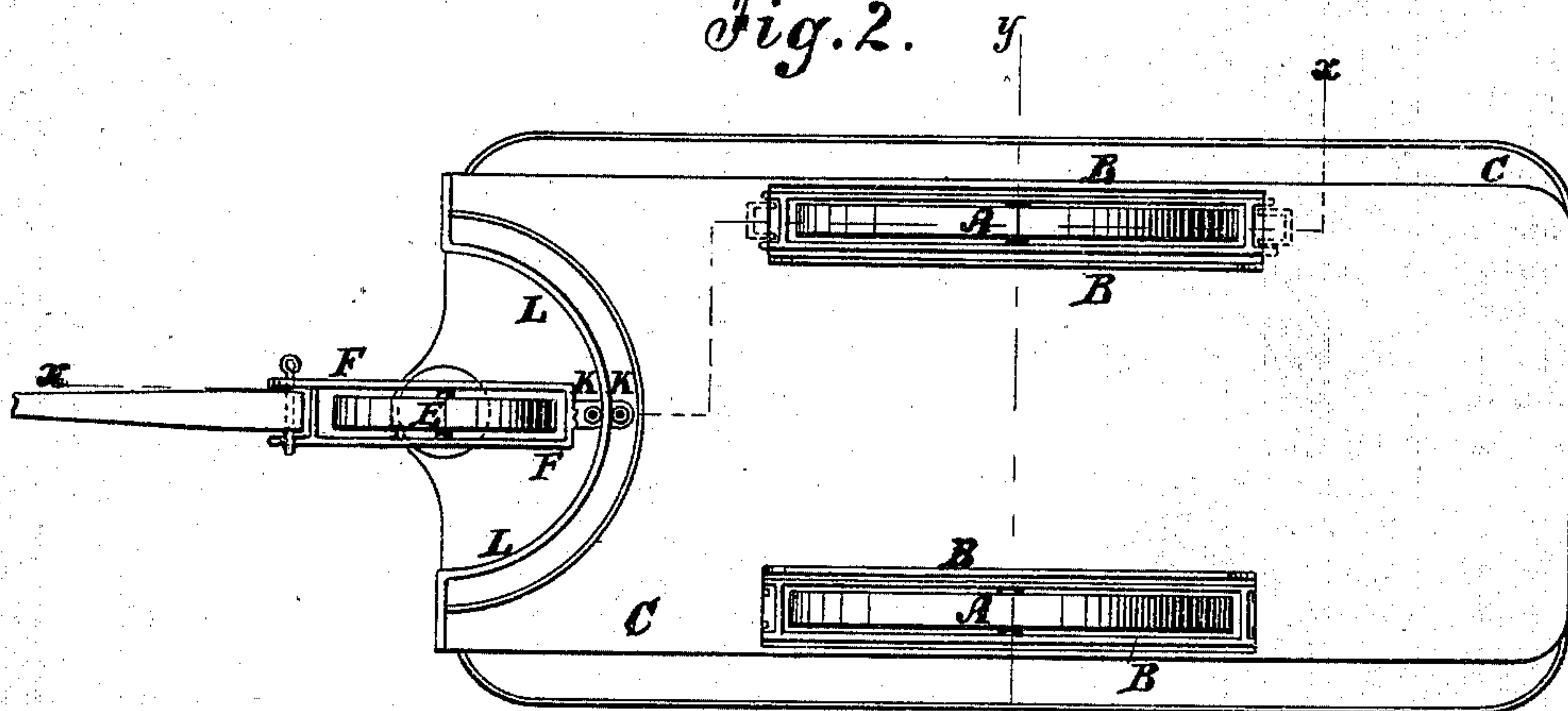
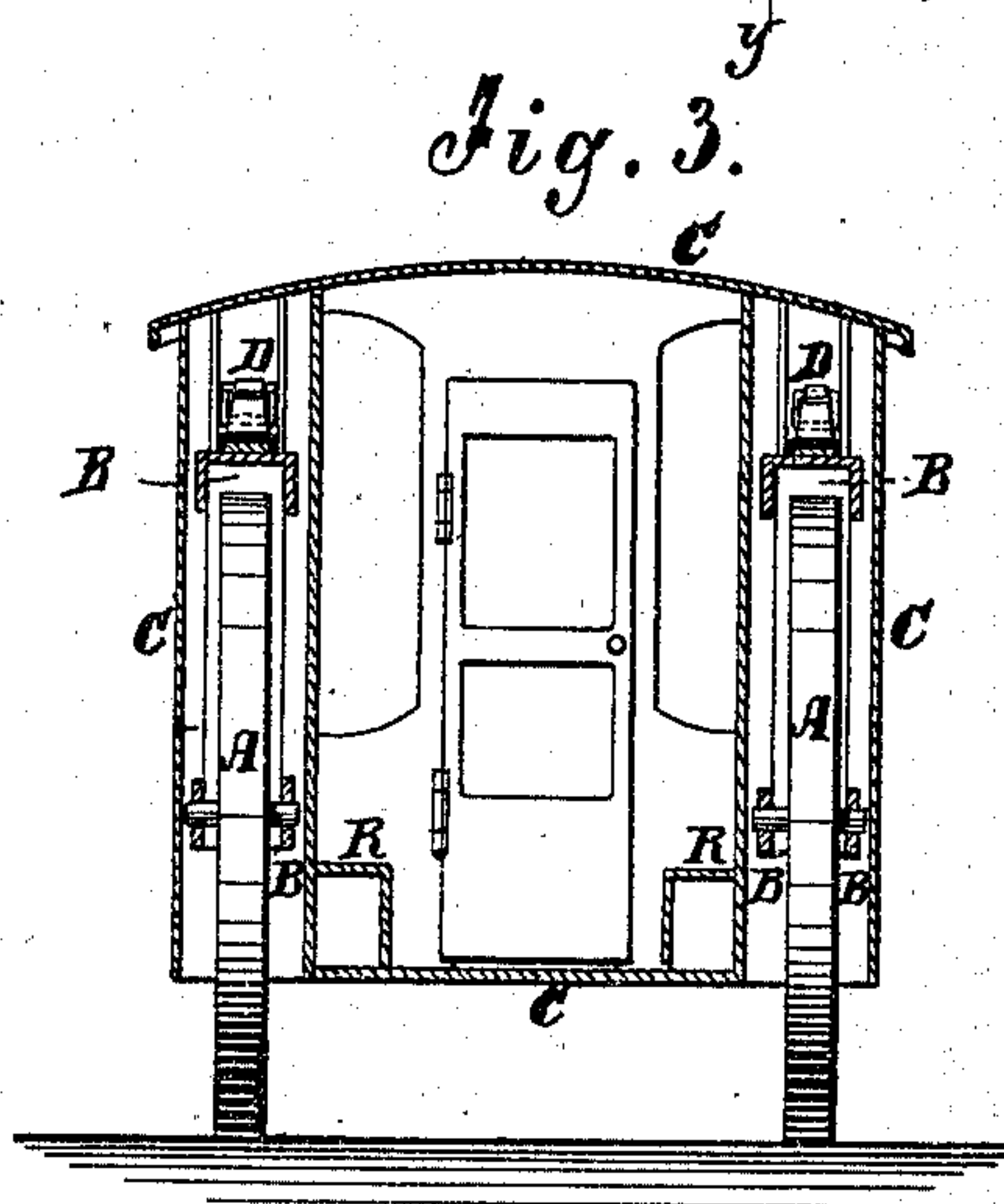


Fig. 3.



Witnesses:

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# UNITED STATES PATENT OFFICE.

MARTIN V. NICHOLS, OF OSAGE, IOWA.

## IMPROVEMENT IN VEHICLES.

Specification forming part of Letters Patent No. **144,473**, dated November 11, 1873; application filed May 31, 1873.

*To all whom it may concern:*

Be it known that I, MARTIN V. NICHOLS, of Osage, in the county of Mitchell and State of Iowa, have invented a new and useful Improvement in Street-Car or Omnibus, of which the following is a specification:

Figure 1 is a side view of my improved omnibus partly in section through the line *x x*, Fig. 2. Fig. 2 is a view of the under side of the same. Fig. 3 is a vertical cross-section of the same taken through the line *y y*, Fig. 2. Fig. 4 is a section of the street-indicator.

Similar letters of reference indicate corresponding parts.

The invention will first be fully described, and then pointed out in the claims.

A are the wheels, which are made very large, and the ends of their journals rest upon the base-bars of the frames B, between which base-bars the said wheels revolve. The ends of the frames B slide up and down in ways attached to the body C of the carriage. To the middle part of the top bar of the frames B is attached the middle part of the half-elliptic springs D, the ends of which are connected with the frame of the carriage-body C, so that the carriage-body may be hung from the springs D, and the said springs may be supported by the frames B, which rest upon the journals of the wheels A. The wheels A and frames B are placed within the sides of the carriage-body, and are incased upon the inner side, no part of the wheels A being in sight, except the part that projects beneath the body C of the carriage. The forward end of the carriage is supported upon a single small wheel, E, or two small wheels placed close together, and the ends of the journal of which rest upon a frame, F. To the frame F is attached a spindle, G, which enters a socket, H, attached to the front platform of the car-body, and in

which is placed a coiled spring, I, against the lower end of which the upper end of the spindle G rests. To the forward end of the frame F is jointed the tongue J, and to its rear end is pivoted two guide-rollers, K, between which passes the semicircular guide-rod L, the ends of which are attached to the forward end of the carriage-body C. The wheel E, frame F, and guide-rod L, are placed in a semicircular recess beneath the front platform of the carriage. In the upper forward part of the carriage-body C is placed a box, M, in which are pivoted two rollers, N, to which is attached and around which is wound a strip, O, of cloth or other suitable material, upon which are printed the names of the streets to be crossed by the car in making its trip. To the ends of the rollers N are attached pulleys P, around which passes a belt, Q, so that the rollers may be turned together and the driver can readily adjust the strip O, and thus enable the passengers to know what street will be crossed next. R are the seats, which are designed to extend along the sides of the car-body C.

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

1. The wheels A A on journals within frames B B, bearing against superposed springs D D, all combined as and for the purpose described

2. The wheel or wheels E, frame F, spindle G, socket H, coiled spring I, rollers K, and semicircular guide-rod L, combined with the recessed forward end of the car-body, substantially as shown and described.

MARTIN V. NICHOLS.

Witnesses:

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