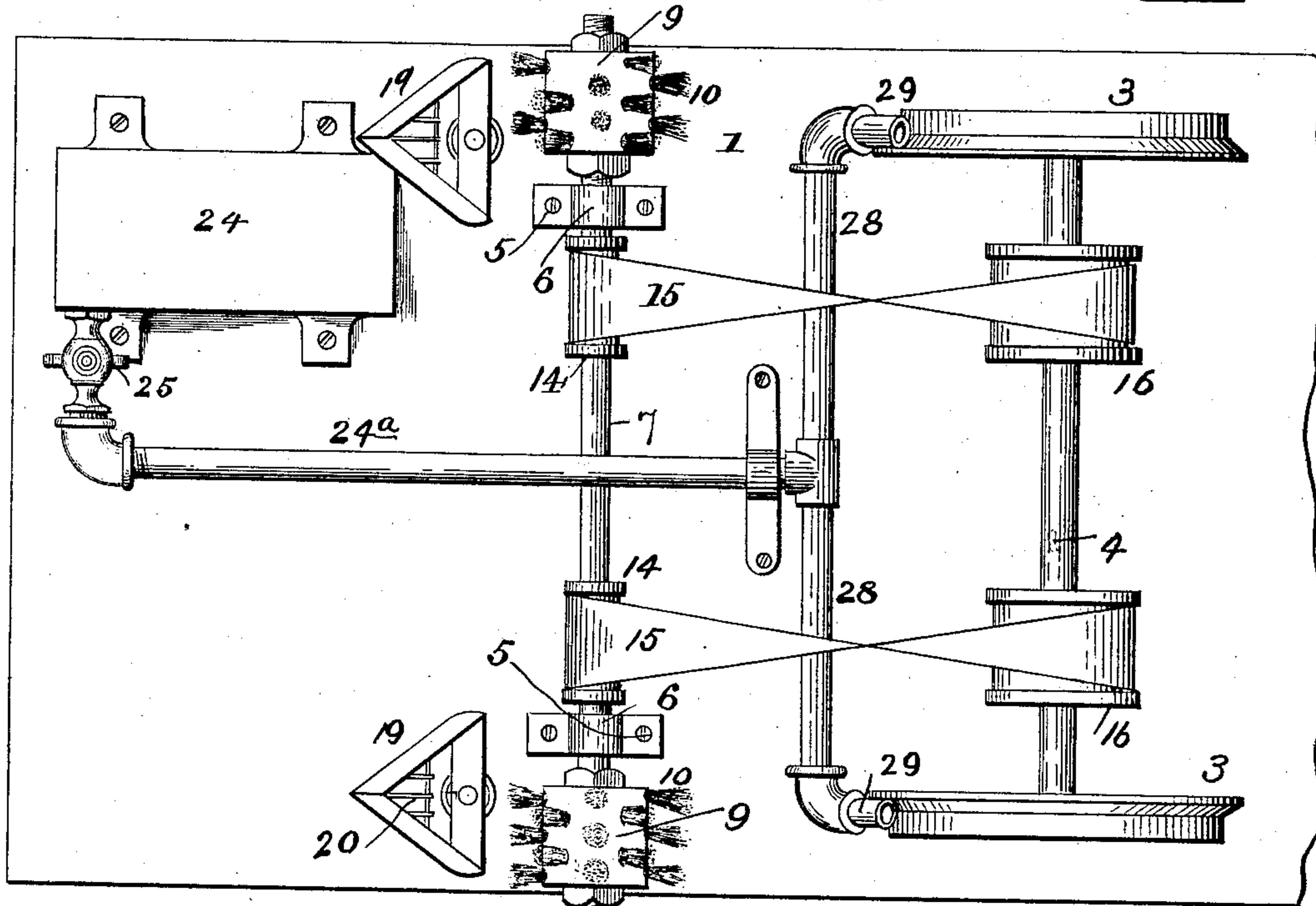
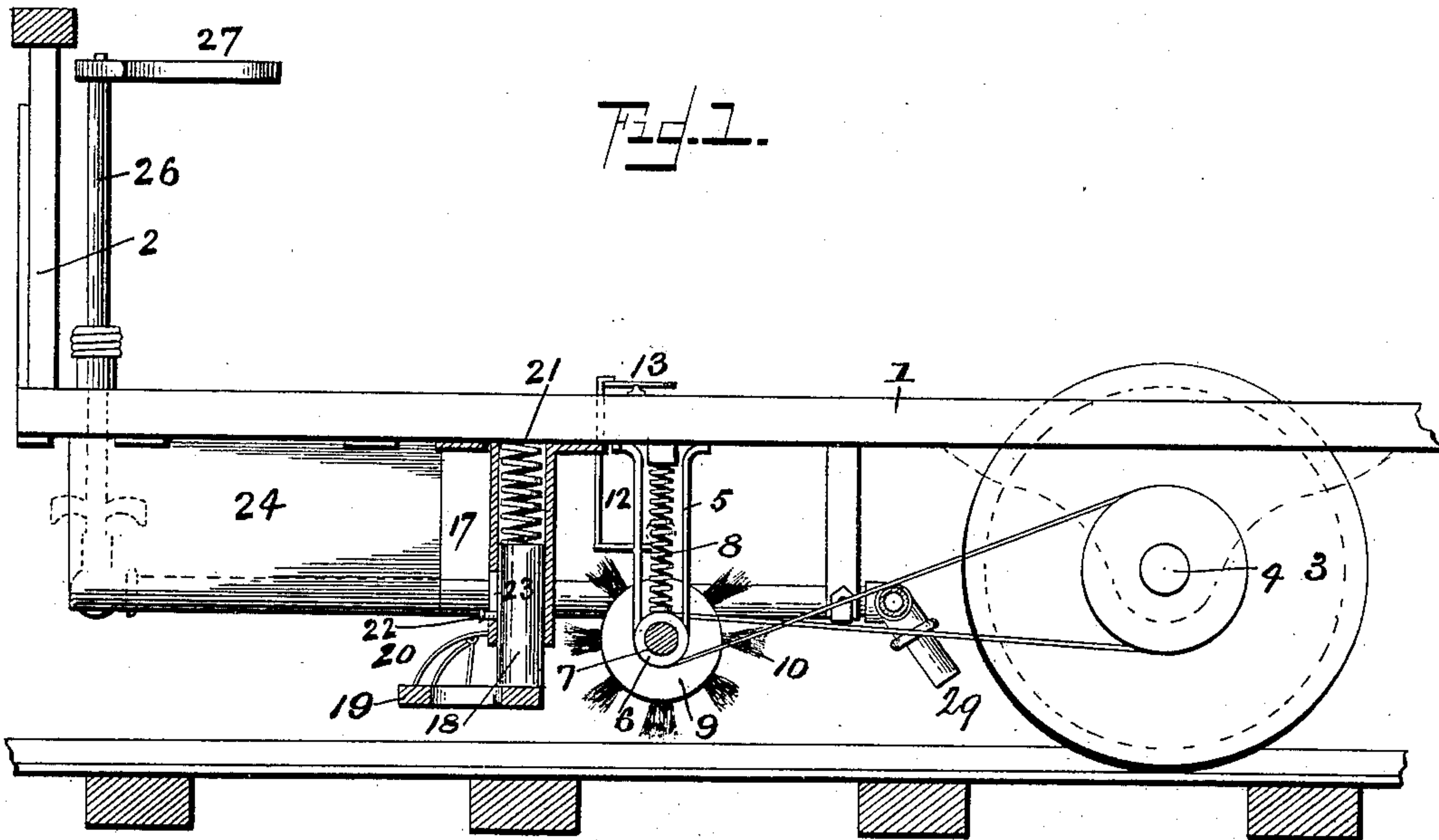


(No Model.)

R. H. NESMITH.
AUTOMATIC TRACK SWEEPING AND OILING ATTACHMENT FOR STREET
CARS.

No. 452,279.

Patented May 12, 1891.



WITNESSES:

J. L. Curand
J. L. Coombs

Fig. 2.

INVENTOR:

Robert H. Nesmith,
by Saml. Daggner & Co.,
Attorneys.

UNITED STATES PATENT OFFICE.

ROBERT HENRY NESMITH, OF DALLAS, TEXAS, ASSIGNOR OF TWO-THIRDS
TO ROBERT E. L. KNIGHT AND MATTHEW H. MAHANA, BOTH OF SAME
PLACE.

AUTOMATIC TRACK SWEEPING AND OILING ATTACHMENT FOR STREET-CARS.

SPECIFICATION forming part of Letters Patent No. 452,279, dated May 12, 1891.

Application filed November 22, 1890. Serial No. 372,299. (No model.)

To all whom it may concern:

Be it known that I, ROBERT HENRY NESMITH, a citizen of the United States, and a resident of Dallas, in the county of Dallas and State of Texas, have invented certain new and useful Improvements in Automatic Track Sweeping and Oiling Attachments to Street-Cars; and I do hereby declare that the following is a full, clear, and exact description of the 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, which form a part of this specification.

My invention relates to improvements in devices for sweeping and removing obstructions from street-railway tracks and for oiling the curves thereof.

The object of the invention is to provide simple, economical, and efficient devices for accomplishing the above purposes; and it consists in the novel construction and combination of parts hereinafter described, and claimed.

In the accompanying drawings, Figure 1 is a central longitudinal sectional view of a portion of a railway-car with my improvements applied thereto. Fig. 2 is a bottom plan view of the same.

In the said drawings the reference-numeral 1 designates the floor of a car, and 2 the dasher at the front end thereof.

3 designates the wheels, and 4 the axle, which are of any ordinary or suitable construction.

Mounted in brackets 5, depending from the under side of the car a short distance in front of the forward axle, are vertically-movable journal-boxes 6, in which is journaled a transverse shaft 7. Bearing upon each of these journal-boxes is one end of a coiled spring 8, the other end of which is secured to the floor of the car, which serves to keep the said boxes and shaft in proper position. This shaft 7 carries at each end a hub 9, fixed thereto, which is provided with a series of brushes 10, which may consist of bristles, wires, splints, or other material suitable for the purpose, and the hubs are so arranged with respect to the track-rails that said brushes will sweep

the same when the shaft is revolved, as hereinafter explained. Connected with the shaft at or near its center is an arm 12, connected with a foot-lever 13, pivoted to the car-floor within easy reach of the driver's foot, so that the brushes may be elevated or depressed, as desired, to bring them into and out of contact with the rails.

Secured to the shaft 7, intermediate of its ends, is one or more pulleys 14, which are connected by belts 15 with corresponding driving-pulleys 16, secured to the axle.

Just in front of the revolving brushes are guards or shields, which consist of hollow posts 17, depending from the under side of the car, in which are fitted the vertically-reciprocating rods 18, each carrying at its lower end a triangular frame or head 19, provided with a series of deflecting wires 20. In the posts 17 are coiled springs 21, which bear upon the rods 18 and keep the heads 19 thereof depressed to near the rail, so as to guard or shield the brushes and remove obstacles from the rails. The movement of the rods 18 is limited, and they are held in place in the posts by means of pins 22, secured thereto and projecting through slots 23 in said posts.

Located at some convenient part of the car, preferably near the front thereof, as shown in the drawings, is an oil-receptacle 24, having pipe 24^a, provided with cock 25, connected with rod 26, which projects up through the car-floor, and is provided with a handle 27, by which it may be operated to open and close the cock. The pipe 24 extends backwardly to near the front wheels, where it is provided with a transverse pipe 28, having depending nozzles 29, which terminate in front of the wheels just above the rails.

The operation is as follows: As the car moves forward, the brushes on the transverse shaft are revolved, which sweep the rails and keep them clean. At the same time they are guarded from injury by means of the shields or guards in front, which remove obstructions on the rails, the coiled springs allowing the shields to give somewhat, so as to prevent damage from heavy obstacles. When desired, the brushes can be thrown out of contact with the rails by depressing the foot-lever. To oil

the curves in the track, it is only necessary for the driver to open the cock in the pipe 24 by means of the connecting-rod and handle, when the oil will flow from the receptacle 5 through said pipe and the transverse pipe 28 and escape through the nozzles 29 onto the rails.

Having thus described my invention, what I claim is—

10 1. In a railway-car, the combination, with the wheels and axle and the pulleys mounted on the axle, of the transverse shaft having pulleys connected by belts with the pulleys on the axle, the brushes on the ends of said 15 shaft, the depending brackets having boxes in which the shaft is journaled, the coiled springs in said brackets, the arm secured to the shaft, and the foot-lever connected with said arm, substantially as described.

20 2. In a railway-car, the combination, with

the wheels, the axle, and the pulleys on the axle, of the transverse shaft having pulleys connected by belts with the pulleys on the axle, the hub and brushes on the ends of the shaft, the depending brackets having boxes 25 in which the shaft is journaled, the coiled springs in the brackets, the arm secured to the shaft provided with a foot-lever, the guards consisting of the hollow slotted posts, the rods carrying the triangular heads and 30 having pins projecting through said slots, and the coiled springs in the posts, substantially as described.

In testimony that I claim the foregoing as my own I have hereunto affixed my signature 35 in presence of two witnesses.

ROBERT HENRY NESMITH.

Witnesses:

JOHN P. GILLESPIE,

ED. S. LAUDERDALE.