

(No Model.)

M. POWER.
RAILWAY TRACK CLEANER.

No. 576,612.

Patented Feb. 9, 1897.

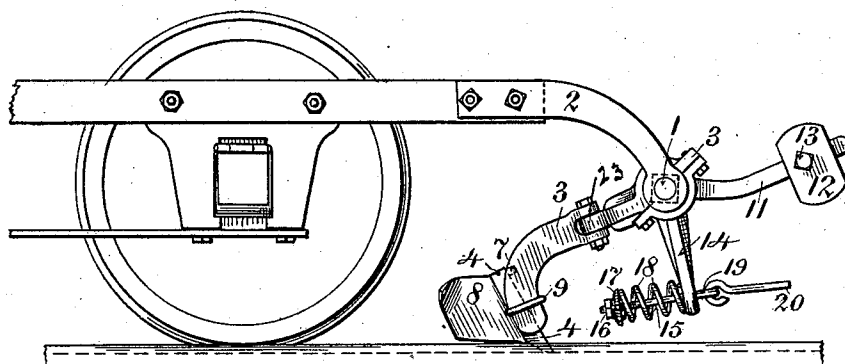


Fig. 1

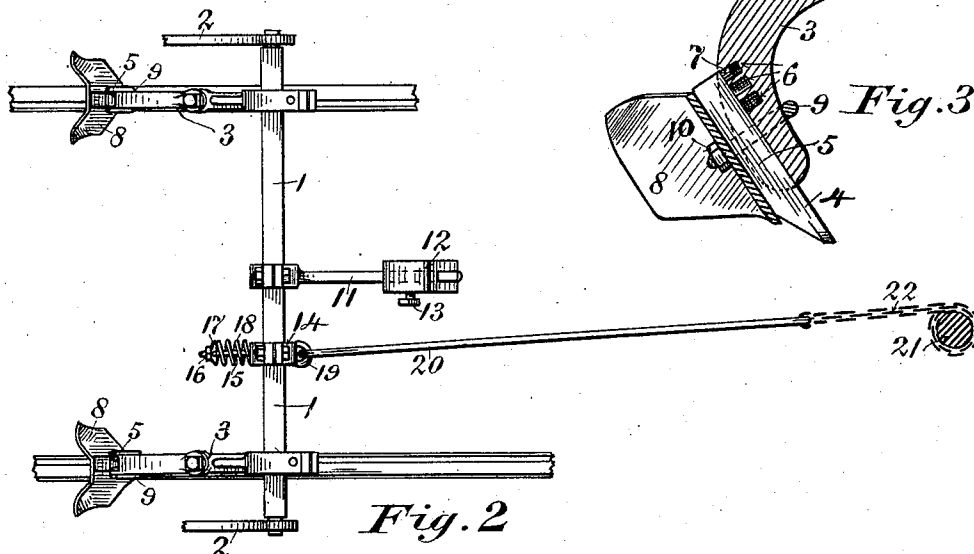


Fig. 2

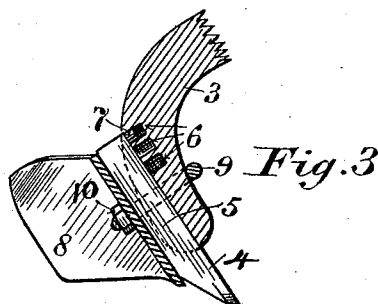


Fig. 3

Witnesses

James B. Smith
Chas. Simmons

Inventor

Michael Power

by M. J. Graham.

ATTY.

UNITED STATES PATENT OFFICE.

MICHAEL POWER, OF TORONTO, CANADA.

RAILWAY-TRACK CLEANER.

SPECIFICATION forming part of Letters Patent No. 576,612, dated February 9, 1897.

Application filed May 25, 1896. Serial No. 592,919. (No model.)

To all whom it may concern:

Be it known that I, MICHAEL POWER, a subject of the Queen of Great Britain, residing at the city of Toronto, in the county of York and Province of Ontario, Canada, have invented certain new and useful Improvements in Groove-Cleaners for Lipped Rails of Street-Railways, of which the following is a specification.

My invention relates to a device attached to the truck of a motor-car in front of the wheels and which can be operated by means of a hand-wheel similar to a brake-wheel to clear the groove in the rails of dirt and ice in the summer and winter seasons, respectively, so that imperfect circuit and insulation of the wheels on the rails are prevented.

The objects of my invention are, first, to provide a simple, effective, and reliable groove-cleaner that will clear the groove and rail-surfaces; second, to provide such groove-cleaner easy of application and release from its work, and, third, to provide such device that is durable and its parts require but very limited attention and renewal.

In the accompanying drawings, illustrating my invention, similar numbers of reference refer to similar parts throughout.

Figure 1 represents a side view of part of my invention attached to a car-truck. Fig. 2 represents a plan of the invention, and Fig. 3 represents a detail section of a portion of the tool-holder to show the means of adjustment provided for wear of the tool.

The rocker-shaft 1 is supported journaled at its ends in the hangers 2, which vary in shape according to the kind of truck equipped. This rocker-shaft 1 is of square iron usually and has securely clamped on it, near its ends and directly over the rails of the road or track, the pair of tool-holders 3, of the curved form shown, extending rearward and terminated slightly inclined forward, so as to hold the tool 4, carried in each, to stand inclining, with the point or lower end in advance to act like chisels.

In the rear lower portion of the tool-holders 3 a channel 5 is formed having a series of holes 6 for the reception of a stud 7 on the tool 4 as said tool becomes worn, and to bring it lower down the stud 7 is placed in a next lower hole 6.

The tool 4 is preferably of tool-steel square bar chisel-pointed at its lower end.

In rear of the tool 4 is secured a shovel 8 to each tool-holder 3 by means of a U-shaped clamp 9, provided with nuts 10 on the ends in rear of the shovel 8. This shovel 8 has its wings inclined rearward, so that its advance along the rails of the road is angular or shearing and tends to push dirt and objects off the track.

Near the center of the rocker-shaft 1 there is secured the counterweight-arm 11 to extend in the opposite direction from that of the tool-holders 3. On the arm 11 the counterweight 12 is secured adjustably by means of the set-screw 13. Near the arm 11 another arm 14 extends downward equally divergent from said arm 11 and the tool-holders 3, and through its lower end a bolt 15 is passed, having a nut 16 and washer 17 to bear against and hold the spiral spring 18, encircling said bolt 15 and bearing at its opposite end against the arm 14. To a hook 19 on the opposite end of the bolt 15 a rod 20 is connected, which by its opposite end is connected to the mast 21 by a chain 22, wound on said mast 21. The mast 21 may suitably be a second brake-mast utilized or provided for this purpose.

When the rod 20 is drawn forward, the arm 14 is operated forward and the tools 4 are engaged with the grooves in the track and the spring 18 compressed, which tends to press the tools 4 constantly into the rail-grooves and cause any dirt to be removed. Owing to the constant angle at which the lower end of the tool 4 bears on the rail, it is worn sharp at its front face where the edge is required to cut and remove dirt and other obstructions.

The tool-holders 3 have a joint 23 therein, as shown, which is sufficiently stiff to prevent the lower portions moving except in rounding curves in the track.

The counterweight 12 is adjusted so that when the mast 21 is released the weight falls and the tools 4 are lifted several inches in height above the track.

Having described my invention, what I claim, and desire to secure by Letters Patent, is—

As a track-cleaning device, the combination of a rocker-shaft carried in hangers on the truck-frame, by its ends, curved arms secured

on said rocker-shaft at points over the rails
of the track, a tool adapted to clear the rail-
groove and adjustable in the lower end of
each of said curved arms, a shovel having
5 rearwardly-inclined wings clamped to said
curved arms, a counterweight-arm and weight
extending from the opposite side of the rocker-
shaft to disengage said tools from the track,
an arm hanging downward from said rocker-
10 shaft, a spring encircling a bolt through the

lower end of said hanging arm and means
as provided to connect said bolt with a sec-
ondary brake-mast to operate the rocker-shaft
and engage the tools with the track substan-
tially as shown and described.

MICHAEL POWER.

Witnesses:

JAS. MCBRIDE,

CHAS. SIMMONDS.