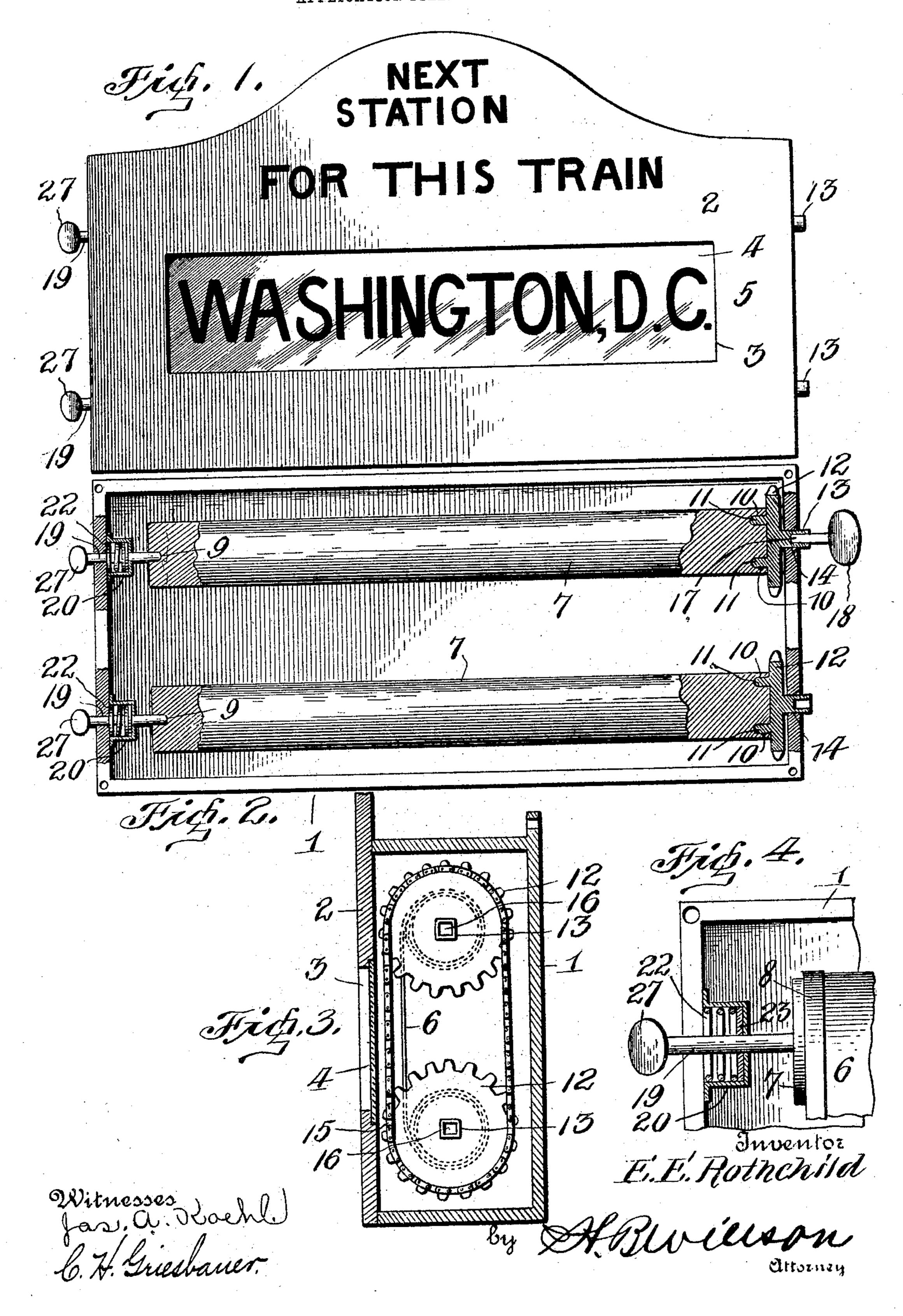
E. E. ROTHCHILD. STATION INDICATOR. APPLICATION FILED JAN. 23, 1905.



UNITED STATES PATENT OFFICE.

EMANUEL EDWIN ROTHCHILD, OF NEW HAVEN, CONNECTICUT.

STATION-INDICATOR.

No. 798,147.

Specification of Letters Patent.

Patented Aug. 29, 1905.

Application filed January 23, 1905. Serial No. 242,333.

To all whom it may concern:

Be it known that I, EMANUEL EDWIN ROTH-CHILD, a citizen of the United States, residing at New Haven, in the county of New Haven 5 and State of Connecticut, have invented certain new and useful Improvements in Station-Indicators; and I do declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to improvements in station-indicators for railway-cars, street-cars, and the like; and it consists of certain novel features of construction, combination, and arrangement of parts hereinafter described and claimed.

The object of the invention is to provide a simple, durable, and practical device of this character which may be readily operated by a conductor or train attendant, so that it will indicate the successive stations at which the train or car will stop.

The above and other objects, which will appear as the nature of my invention is better understood, are accomplished by the construction illustrated in the accompanying drawings, in which—

Figure 1 is a front elevation of a stationindicator constructed in accordance with my invention. Fig. 2 is a similar view of the same with the cover-plate removed and with parts in section, and Fig. 3 is an end elevation of the device with parts in section. Fig. 4 is a detail view, partly in section, showing the bearing for one end of one of the rollers and adjacent devices.

Referring to the drawings by numeral, 1 denotes the casing of the device which is adapt-40 ed to be secured at one end of the interior of a railway-coach, so that it may be readily seen by persons within the coach or car. This casing is preferably constructed of copper or other suitable sheet metal and, as shown, is of 45 rectangular form. The front or cover plate 2 of the casing is preferably removably secured in position and is formed at its center with a longitudinally-extending sight-opening 3, which is covered by a sheet of glass or other 50 transparent material 4. This sight-opening is provided for the purpose of exposing the names of the different stations or any other printed matter 5, which is placed upon a flexible band or apron 6, mounted upon rollers 7 within 55 the casing. This flexible band 6 may be made of paper, cloth, or other suitable material,

and preferably has its edges bound or strengthened, as shown at 8. The ends of this band are secured to and wound upon the two rollers 7, so that as one is rotated to wind up the 60 band upon it the latter will unwind from the other roller, the printed matter upon the band thus being brought before the sight-opening 3.

The rollers 7 are removably mounted within the casing 1, and each has at one of its ends 65 a concentrically-disposed recess 9 and at its opposite end two or more eccentrically-disposed recesses 10, which are preferably arranged at diametrically opposite points. The recesses 10 are engaged by studs 11, provided 70 upon the inner faces of sprocket-wheels 12, which are disposed between the adjacent end of said rollers and said casing. Upon the outer faces of the sprocket - wheels 12 are formed hubs 13, which project through bear- 75 ing-openings 14, formed in one of the end walls of the casing, and thus support one end of the rollers. The sprocket-wheels 12 are connected by a sprocket-chain 15, so that the two rollers will be caused to rotate together 80 in the same direction, and in order to rotate said rollers the hubs 13 of the sprocketwheels are formed with polygonal-shaped recesses 16, which are adapted to be engaged by the similar-shaped end 17 of an operating 85 key or device 18. The opposite ends of the rollers 7 are mounted upon bearing pins or studs 19, which project into the concentrically-disposed recesses 9 in said rollers. These studs or pins 19 are slidably mounted in the 90 adjacent end wall of the casing and in a cylindrical sleeve or bearing 20, secured upon the inner face of said end wall. The outer end of the pin 19 is provided with an operating-head 27, and its inner end is retained in 95 the recess 9 by means of the coil-spring 22, which surrounds said pin and is confined between the end wall of the casing and an annular stop-disk 23, secured upon said pin. It will be seen that by drawing the pin 19 out- 100 wardly against the tension of the spring 22 the inner end of said pin will be removed from the recess 9, so as to permit the roller to be readily removed by disengaging the recesses in its opposite ends from the stude 11 105 upon its sprocket-wheel. The tension of the spring 22 causes the stop-disks 23 to bear frictionally against the inner end of the cylindrical sleeves or bearings 20 to such an extent as to prevent casual rotation of the 110 rollers 7.

The construction, use, and advantages of

my invention will be readily understood from the foregoing description taken in connection

with the accompanying drawings.

Any desired printed matter may be provided upon the band or apron 6; but when the device is used in a street or railway car the names of the different stations are printed or otherwise placed upon the same in their proper order, so as to be successively exposed before the opening 3 by the conductor or other person in charge of the train, who inserts the key 18 in the hub of one of the sprocket-wheels to rotate the latter. Upon the front plate 2 above the opening 3 is printed or painted "Next station for this train" or other matter to indicate or explain the printed matter appearing in the opening 3.

Having thus described my invention, what 20 I claim as new, and desire to secure by Letters

Patent, is—

A station-indicator comprising a casing having openings in opposite sides, cylindrical sleeves in said casing, secured to one side thereof, opposite the openings in said side, a

| pair of rollers in said casing, journal-pins extending through said sleeves, and the openings in the side of the casing to which the sleeves are attached, the said journal - pins bearing in one end of the said rollers, stop- 3° disks on said journal-pins and bearing against the closed inner ends of the cylindrical sleeves, springs in the latter, each bearing at one end on one of said stop-disks, sprocket-wheels on the other ends of the rollers, having hubs 35 journaled in the openings in the proximate side of the casing, said hubs having recesses to receive operating-keys, an endless sprocketchain engaging the sprocket-wheels and hence connecting said rollers together for simulta- 40 neous rotation, and a flexible band connecting and partly wound on said rollers, substantially as described.

In testimony whereof I have hereunto set my hand in presence of two subscribing wit- 45

nesses.

EMANUEL EDWIN ROTHCHILD.

Witnesses:

A. W. Bowman, E. L. Bartholomew.