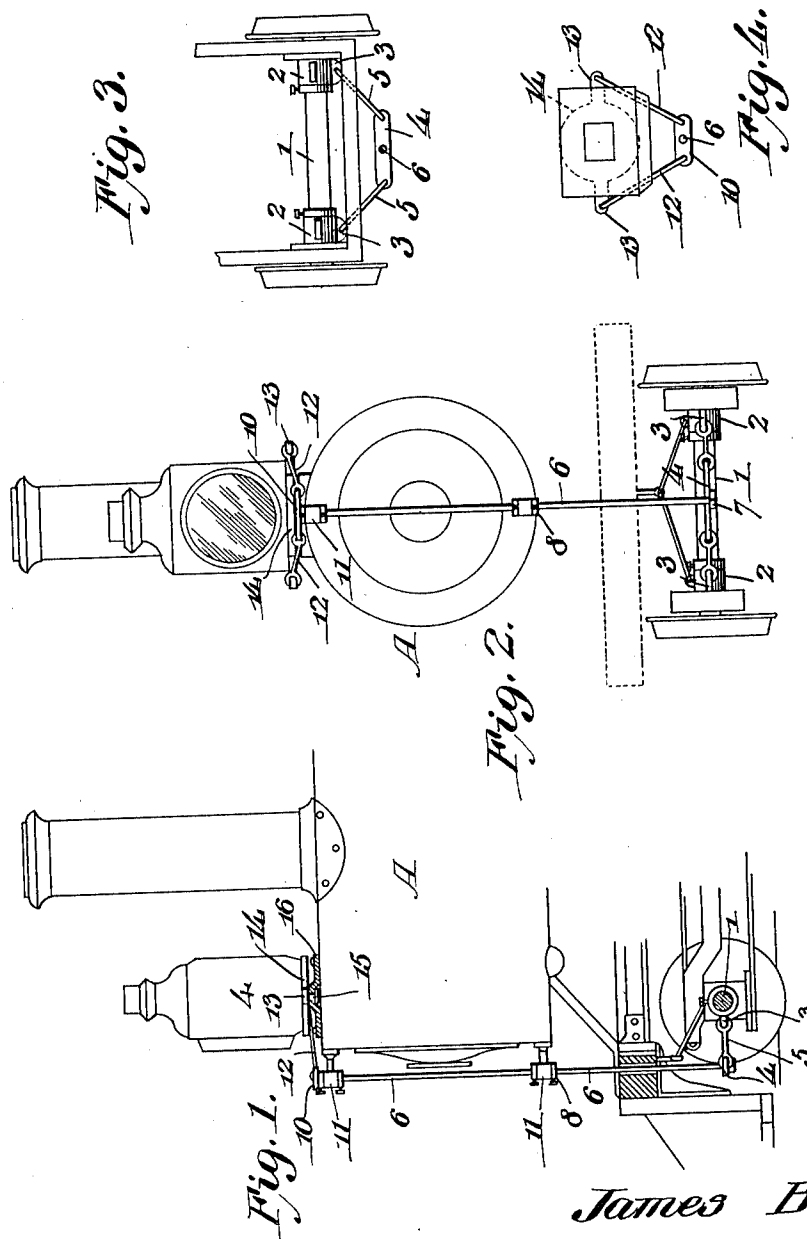


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 DEVICE FOR CONTROLLING LOCOMOTIVE HEADLIGHTS.
 APPLICATION FILED AUG. 10, 1911.

1,012,516.

Patented Dec. 19, 1911.



Witnesses
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DEVICE FOR CONTROLLING LOCOMOTIVE-HEADLIGHTS.

1,012,516.

Specification of Letters Patent.

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Application filed August 10, 1911. Serial No. 643,429.

To all whom it may concern:

Be it known that I, JAMES BULGER, a citizen of the United States, residing at Bulger, in the county of Larimer and State of Colorado, have invented new and useful Improvements in Devices for Controlling Locomotive-Headlights, of which the following is a specification.

The present invention relates to certain novel and useful improvements in a device for controlling locomotive head lights and has particular application to mechanism adapted to turn the headlight in the direction in which the engine is turning when traveling around curves and the like, so that the beam of light will always be thrown directly on the track.

In carrying out my invention it is my purpose to provide a device of the character described which will embody the desired features of simplicity, efficiency and reliability.

Furthermore, it is my purpose to provide a controlling device for locomotive head lights which may be installed upon any ordinary locomotive without changing or affecting the structure of the latter, and which may be readily assembled or removed when desired.

I also aim to provide a controlling device of the class described which is designed to be operated from the axle and connected to the head light so that the latter will swing in the same direction as the axle.

With the above recited objects and others of a similar nature in view, my invention consists in the construction, combination and arrangement of parts set forth in and falling within the scope of the appended claim.

In the accompanying drawings,—Figure 1 is a view in side elevation of a portion of a locomotive provided with my invention. Fig. 2 is a front view of the same. Fig. 3 is a top plan view of the connection, with a truck axle, the vertical operating shaft or rod being shown in section. Fig. 4 is a top plan view of the turn table mounting for the head light and the connections thereof.

Referring now to the accompanying drawings in detail, the letter A indicates conventionally the front portion of a locomotive, of which 1 designates the front axle of the front truck. Mounted upon the front axle, but in such manner as to permit the latter to rotate freely therein are the collars 2—2, each formed with a lug or flange 3.

The numeral 4 indicates a short cross bar connected to the lugs of the collar through the medium of short sections of the cables 5, preferably of wire although if desired, links or other forms of connections may be employed. Extending vertically upward from the bar 4 is the vertical operating shaft 6, the lower end of said rod being connected with a cross bar at approximately the center thereof as at 7.

The numeral 8 indicates a suitable guide sleeve attached to the front of the locomotive and through which the rod 6 passes. The upper end of said rod terminating at the cross bar 10, the rod at its end being preferably guided by the sleeve 11. The cross bar 10 is similar in construction to the lower cross bar and is connected at its end portions with the cables or links 12 with the lugs 13 of the turn table or disk 14, the latter being pivotally mounted as at 15 upon the base plate 16 attached to the top of the locomotive boiler.

The letter L designates a locomotive head light of any approved type which is adapted to be bolted or otherwise fastened to the disk or turn table.

From the above description, taken in connection with the accompanying drawings, the construction and operation of my invention will be readily apparent. When the parts are assembled as shown in Figs. 1 and 2, the turn table upon which the head light is mounted will be so connected with the truck that when the latter swings or turns when the locomotive is taking a switch, curve or the like, the same direction of movement will be imparted to the short lower cable and with the rod 6 and the cables or connections 12 to the turn table carrying the head light so that the latter will turn in the same direction as the truck and the light will at all times be thrown directly upon the track.

It will be noted that I have provided an exceedingly simple and inexpensive means for controlling the head light, and which means may be readily attached to any of the well known type of locomotives or locomotive head lights.

What I claim is:—

The combination with a locomotive, of a pair of collars carried by the front axle of said locomotive, each collar having a lug formed thereon, a pair of links connected at their rear ends to said lugs, a bar connect-

ing the front ends of said links, a vertically disposed rod connected at its lower end to the central portion of said bar and extending upward in front of the locomotive, a
5 turn table, a headlight mounted upon said turn table, links connected at their rear ends to said turn table and extending forward therefrom, and a bar connecting the forward ends of the links and to which bar the

upper end of the vertically disposed rod is 10 connected.

In testimony whereof I affix my signature in presence of two witnesses.

JAMES BULGER.

Witnesses:

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Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."
