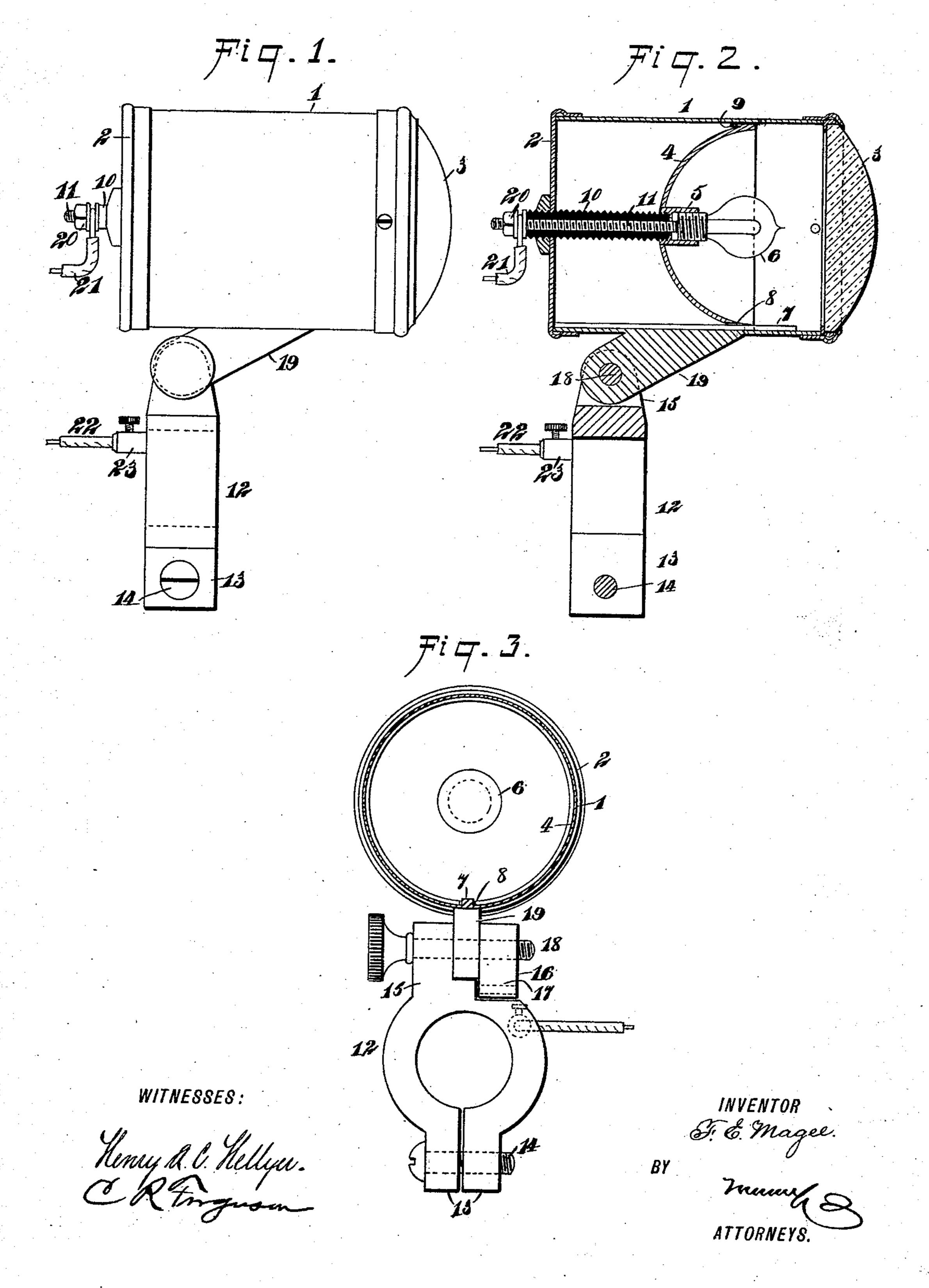
(No Model.)

F. E. MAGEE.
ELECTRIC LAMP.

No. 572,431.

Patented Dec. 1, 1896.



## United States Patent Office.

FRANCIS E. MAGEE, OF BROOKLYN, NEW YORK.

## ELECTRIC LAMP.

SPECIFICATION forming part of Letters Patent No. 572,431, dated December 1, 1896.

Application filed March 25, 1896. Serial No. 584,853. (No model.)

To all whom it may concern:

Be it known that I, Francis E. Magee, of Brooklyn, in the county of Kings and State of New York, have invented certain new and 5 useful Improvements in Electric Lamps, of which the following is a full, clear, and exact

description.

This invention relates particularly to electric lamps for traveling vehicles, such as bi-10 cycles, carriages, cars, and the like; and the object is to provide a lamp that will produce a strong and brilliant light and in which the focus may be easily and quickly adjusted.

I will describe a lamp embodying my inven-15 tion and then point out the novel features in

the appended claims.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which similar characters of reference indi-20 cate corresponding parts in all the figures.

Figure 1 is a side elevation of a lamp embodying my invention. Fig. 2 is a longitudinal section thereof, and Fig. 3 is a trans-

verse section.

The lamp comprises a metal casing 1, having a closure 2 mounted to rotate on its rear end and a lens 3 removably secured in its front end. The lens is here shown as a planoconvex lens; but the form may be changed 30 without departing from the spirit of my invention, although I find the form shown to be one giving good results.

Arranged to slide longitudinally in the casing 1 is a convex reflector 4, having a socket 35 5 in its front central portion to receive an incandescent lamp 6. The reflector is guided in its movements and prevented from rotating relatively to the casing by means of a rib 7, secured to the interior of the casing and en-40 gaging in a notch 8, formed in the edge of the reflector. To provide for a yielding frictional engagement between the reflector and casing, I provide the edge of the reflector with a spring-yielding flange 9, adapted to engage 45 against the inner side of the casing.

Attached to the reflector and extended rearward through a tapped hole in the end closure 2 is a tubular screw-shaft 10, of insulating material, and extended through this tubular 50 shaft is a conductor-rod 11, the front end of which is in electrical engagement with one

lead of the lamp 6.

To secure the lamp to a support, such, for instance, as the front bar of a bicycle-frame, I employ a clamp-ring 12, open at its ends 55 and having outwardly-extended perforated lugs 13, through which a clamping-screw 14 passes. Obviously by turning the screw 14 the ring may be securely clamped to a support. Extended radially from the clamping- 60 ring is a jaw portion 15, and mounted to slide relatively to the jaw portion 15 is a jaw portion 16. This jaw portion 16 is held from rotary motion by means of a pin 17, extended from the ring into an opening in the jaw portion 65 16, and upon this pin the said jaw portion is adapted to slide. A set-screw 18 passes transversely through a hole in the fixed jaw portion 15 and engages in a tapped hole in the jaw portion 16, and on this set-screw between 70 the jaws is pivotally mounted an arm 19, extended downward and rearward from the lamp-casing 1. It will be seen that by this construction the lamp may be adjusted and clamped in any desired position, either to 75 throw the light directly forward or at any vertical inclination.

It may be here stated that to reduce the weight of the lamp to a minimum all the metal

parts may be made of aluminium.

The conductor-rod 11 is provided with a binding-nut 20 for engaging a wire 21, leading from a generator, and the other lead-wire 22 is here shown as connected to a bindingpost 23 on the clamp-ring 12. The current, 85 therefore, will be conveyed to the lamp 6 through the lamp-casing and reflector and through the conductor-rod 11.

By rendering the lamp 6 adjustable with relation to the lens it is evident that the fo- 90 cus, and consequently the intensity of the light thrown out, may be adjusted.

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

1. An electric lamp comprising a metal casing, a lens in its forward end, a reflector adjustable longitudinally in the casing, an incandescent-lamp socket carried by the reflector, means for causing the adjustments of 100 the reflector, and means for carrying an electric current to a lamp in the socket, substantially as specified.

2. An electric lamp, comprising a metal cas-

ing, a lens in the casing, a concave reflector adjustable longitudinally in the casing, a rib in the casing, engaging in a notch in the reflector, a lamp-socket carried by the reflector, and means for adjusting the reflector, substantially as specified.

3. An electric lamp adapted for adjustable connection with a support, and comprising a metal casing, a lens in one end thereof, a closure mounted to rotate on the other end thereof, a reflector mounted to move longi-

tudinally in the casing, a lamp-socket on said reflector, a tubular screw-rod of insulating material, extended from the reflector through a tapped hole in the end closure, and a conductor - rod passing through said tubular screw-rod, substantially as specified.

FRANCIS E. MAGEE.

Witnesses:

JNO. M. RITTER, C. R. FERGUSON.