

(No Model.)

D. E. DAVIDSON.
ATTACHMENT FOR LANTERNS.

No. 575,333.

Patented Jan. 19, 1897.

Fig. 1.

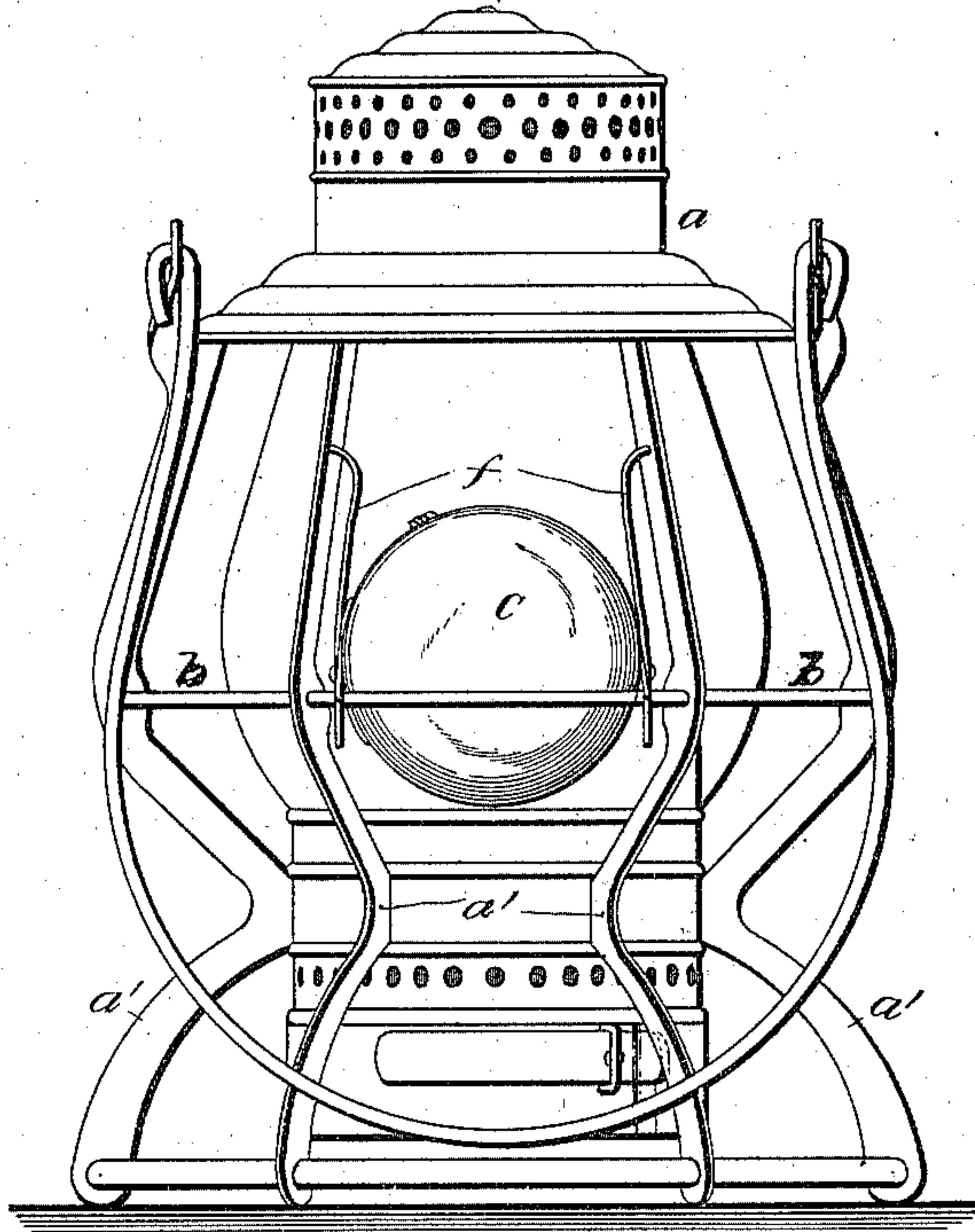


Fig. 2.

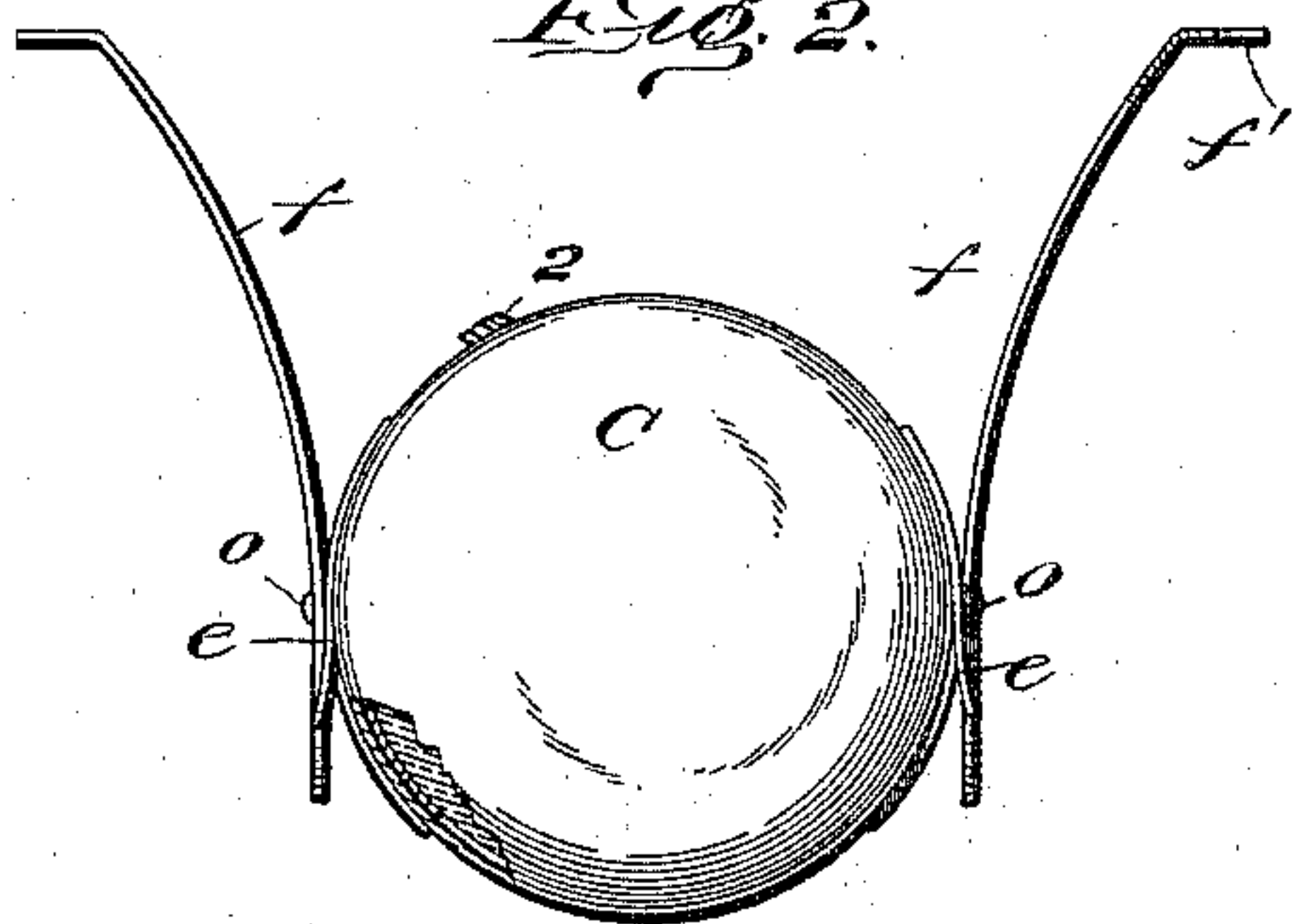


Fig. 3.

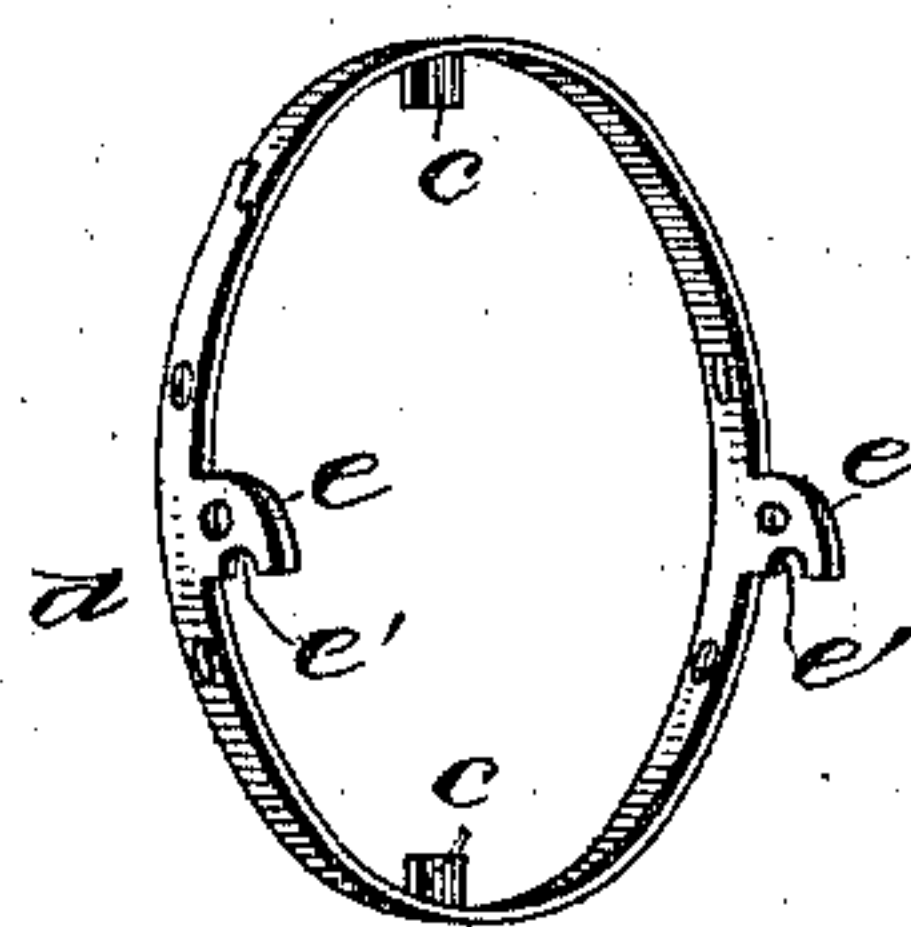
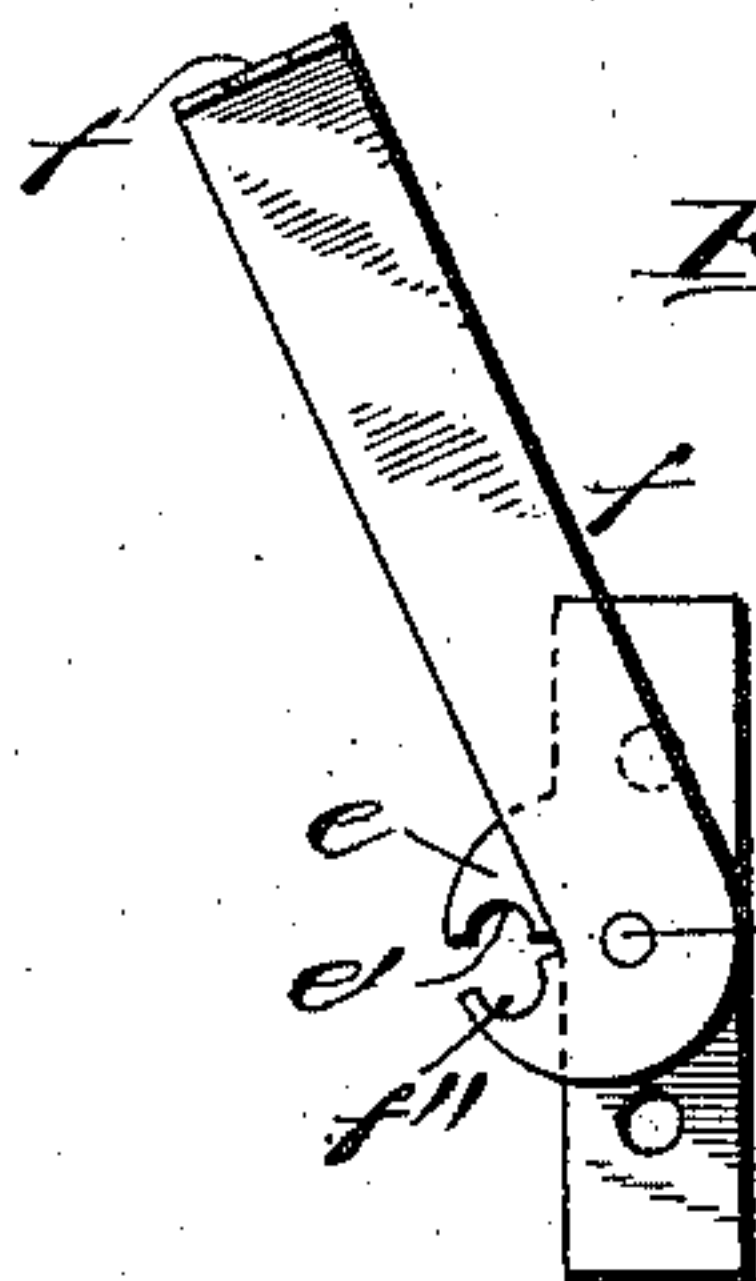


Fig. 4.



Witnesses:

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UNITED STATES PATENT OFFICE.

DAVID EDWARD DAVIDSON, OF HARRISBURG, PENNSYLVANIA.

ATTACHMENT FOR LANTERNS.

SPECIFICATION forming part of Letters Patent No. 575,333, dated January 19, 1897.

Application filed May 14, 1896. Serial No. 591,471. (No model.)

To all whom it may concern:

Be it known that I, DAVID EDWARD DAVIDSON, a citizen of the United States, residing at Harrisburg, in the county of Dauphin and State of Pennsylvania, have invented certain new and useful Improvements in Attachments for Lanterns; and I do hereby 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 lanterns, and especially to the kind of lanterns used in connection with railroad service.

The object of my invention is to equip an ordinary lantern having a white or clear glass globe with colored-glass lenses, so that the lantern may be used readily for danger or other signals required by railroad use, and thus the necessity of buying expensive colored-glass globes will be avoided.

A further object of my invention is to provide an attachment for the purpose described which may be cheaply made and quickly and easily applied to or removed from the lantern.

The construction of my invention will be fully set forth in the following description and is illustrated in the accompanying drawings, in which—

Figure 1 shows a lantern supplied with my invention. Fig. 2 shows my invention detached from a lantern. Fig. 3 shows a modified form of my invention, and Fig. 4 is a detail of one of the locking-levers which I employ in my improved attachment.

Like letters of reference indicate like parts in the several views.

In the drawings, *a* represents a lantern of ordinary form, having a frame braced by vertical ribs *a'* and a central horizontal rib *b*.

C is a concavo-convex lens which may be red, green, or blue color, or, if magnifying conditions are required, may be of clear glass. The under side may be flat, but I prefer to have it concave, that the lens may be more readily adapted to the shape of the lantern-globe. Encircling the lens *C* in a peripheral groove provided therefor is a metallic band *d*, which may be of wire, as shown in Fig. 2, or of thin flat metal, as shown in Fig. 3. Said band may be secured about the lens by twisting

the ends together, as shown in Fig. 2, or by means of lugs *c*, bent down over the faces of the lens, as shown in Fig. 3. Secured to said band *d* or formed therewith are lugs *e*, which are placed at opposite points on the edge of the lens *C* and extend forwardly or toward the convex face of the lens. Said lugs are cut out on their under side at *e'*.

Pivoted at *o* to the lugs *e* are levers *f*, made of spring metal. The upper end of these levers is cut out at *f'*, and the lower end, which extends forwardly, is cut out at *f''* to correspond with the cut-out portion of the lugs *e*. Said spring-levers are normally bent outwardly or tangentially from the lens and their spread at their outer ends is slightly greater than the distance between any two of the vertical ribs *a*.

In adjusting my improved attachment to a lantern the levers *f* are thrown forwardly and the cut-out portions of the lugs are placed over the horizontal rib *b*. The upper ends of the levers *f* are then pushed backwardly toward the globe and inwardly toward the lens until they are in line of and between the vertical ribs *a*, when they are released, and the tension of their spring forces them against said ribs, the latter fitting into the cut-out portions *f'* at the upper ends of said levers.

It will be apparent that when the levers are thrown backwardly their lower ends are brought upward, the rib *b* enters the cut-out portion *e'*, and the attachment is thus effectually locked in position on the lantern-frame.

To remove the attachment, the levers are pressed together until freed from the vertical ribs and then thrown forward, so that the jaws formed by the lower end of said levers and the lugs *e* are opened, so that they may be taken from the rib *b*.

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

1. An attachment for lanterns consisting of a lens supported by a metallic band secured to said lens and having lugs or extensions adapted to embrace the horizontal rib of a lantern, and spring-levers, pivoted to said band, and adapted to embrace the horizontal rib and the vertical ribs of a lantern, substantially as and for the purposes set forth.

2. An attachment for lanterns consisting of a lens, a metallic band secured thereto, pieces *e* secured to, or formed as a part of the metallic band, levers pivoted to the pieces *e*, and
5 having their upper and lower ends cut out to embrace the vertical and horizontal ribs respectively of a lantern, substantially as described.

3. An attachment for lanterns consisting of
10 a lens, a metallic band having a series of lugs formed therewith and adapted to embrace the

lens, pieces *e* secured to said bands and levers pivoted to said pieces, substantially in the manner and for the purposes set forth.

In testimony whereof I have signed this 15 specification in the presence of two subscribing witnesses.

DAVID EDWARD DAVIDSON.

Witnesses:

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