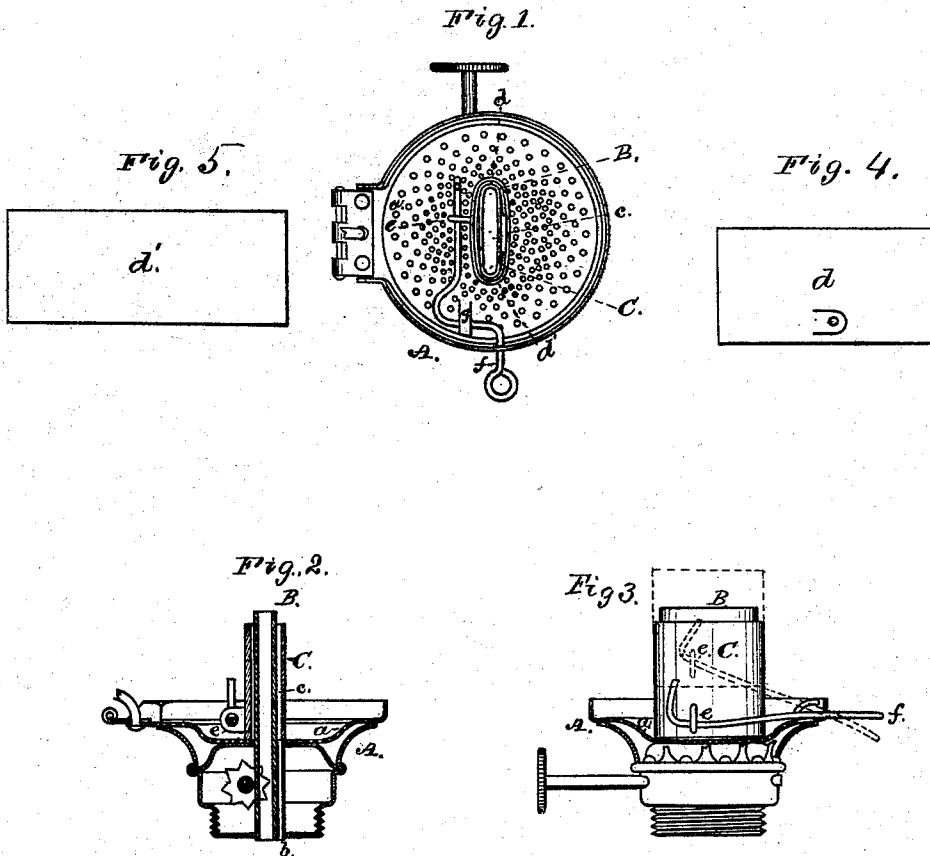


G. W. MARTIN.
LAMP-EXTINGUISHER.

No. 177,947.

Patented May 30, 1876.



Witnesses.
Geo Gray
Ed. L. Halse

George W. Martin
by his attorney
A. P. Halse

UNITED STATES PATENT OFFICE

GEORGE W. MARTIN, OF CHELSEA, ASSIGNOR TO HIMSELF AND JOSEPH W. HASKINS, OF BOSTON, MASSACHUSETTS.

IMPROVEMENT IN LAMP-EXTINGUISHERS.

Specification forming part of Letters Patent No. 177,947, dated May 30, 1876; application filed March 28, 1876.

To all whom it may concern:

Be it known that I, GEORGE W. MARTIN, of Chelsea, in the county of Suffolk and State of Massachusetts, have invented certain new and useful Improvements in Lamp-Extinguishers; and I do hereby declare that the following is a full, clear, and exact description thereof, which will enable others skilled in the art to which it pertains to make and use the same, reference being had to the accompanying drawing, and to the letters of reference marked thereon, which form a part of this specification.

In such drawing, Figure 1 is a top view of the base portion of an ordinary lamp-burner provided with my invention. Fig. 2 is a central and vertical section taken transversely through the wick-tube. Fig. 3 is a vertical section taken through the burner in rear of the wick-tube, the dark lines showing the sleeve in its lowest position, while the dotted lines show the sleeve as elevated into a position to extinguish the flame of the burner.

The main object of my invention is to produce a simple, cheap, and effective device to be applied to the wick-tube of a lamp or burner for extinguishing the flame thereof—one which, under ordinary circumstances, can be readily operated, and which, in case of accidental upsetting of the lamp, will automatically extinguish the flame; and my invention consists in the peculiar construction and arrangement of the parts, as will be hereinafter described and claimed.

In the drawing, A denotes the base or lower portion of a lamp-burner of the ordinary construction; B, the wick-tube extending up through the same; C, is a sleeve which envelops the sides of the wick-tube, its lower end resting upon a foraminous plate or diaphragm, *a*. This sleeve is slightly larger than the wick-tube, in order to enable it to slide freely thereon. It is also made of sufficient weight that its own gravity will readily cause it to slide upon the tube, whether the latter be in its normal position, or be reversed or inclined by the upsetting of the lamp. *b* is a small tube or pipe, which extends up from the lower end of the part A, (which screws into the neck of the lamp,) and terminates at the top

surface of the diaphragm *a*. Within the inner wall of the sleeve I form a vertical passage, *c*, having an area in cross-section corresponding with that of the tube *b*, such passage being so arranged as to form a continuation thereof, and thereby serving to conduct any gas generated in the reservoir of the lamp up to the flame or top of the wick-tube. This sleeve I prefer to make of two blanks or plates, *d d'*, of the form as shown in Figs. 4 and 5, the inner one, *d*, having a portion cut out, which is to be bent out at a right angle to the plane of its outer surface to constitute an ear, *e*, which is perforated to receive the inner end of an actuating-lever, *f*, the adjacent or abutting edges of the outer portion of the slider, and being supported in position thereby. The part *d*, it will be seen, is of a less length than the part *d'*, and is bent around so that its ends constitute the side walls of the passage *c*, while the part *d'* is bent around so as to break joints therewith, the two parts being pressed together into shape, and thereby require no soldering.

I would remark that the sleeve, if desirable, may be made of a single piece, and the perforated ear *e* be soldered thereto, and the passage *c* stamped or filed out; but I prefer the first-mentioned mode of construction.

The actuating-lever *f* extends through the rim of the part A, which serves as a fulcrum, the said lever being bent, and having the form as shown in Figs. 1 and 3. The inner end of the lever *f* extends through the perforated ear *e*, and has its extremity bent up or formed with a knob or stop, so as to limit the movement of the sleeve when it has reached the desired altitude, and thus prevent it from becoming detached from the wick-tube. *g* is a curved lip, which extends over the lever *f* near the rim, which, although not essential, may be used to prevent any tendency of the lever to move out of its proper path of motion.

From the above it will be seen that, in operating the sleeve or extinguisher, while provision is made for moving the same both up and down on the wick-tube, it will, under all ordinary circumstances, when raised, fall by its own gravity, its elevation being effected by simply pressing the thumb or finger down upon the outer end of the lever *f*. In

case it should become clogged by the carbon of the wick, by pressing the finger on the under face of the lever the sleeve will be readily moved to its lowest position.

Having described my invention, what I claim is—

1. The sleeve formed with the gas-receiving passage *c*, and arranged with respect to the gas-tube *b*, (disposed in the base of the burner,) as shown and described, and for the purpose set forth.

2. The sleeve composed of two plates, *d d'*, with the perforated ear *e*, formed integral with the plate *d*, the whole being constructed and arranged as shown and described.

3. The combination of the gas-escape tube *b* (located in the base of the burner, as described) and the sleeve, formed with the gas-passage *c*, and the perforated ear *e*, with the lever *f*, the whole being constructed and arranged as shown and described.

In testimony that I claim the foregoing as my own invention I affix my signature in presence of two witnesses.

GEO. W. MARTIN.

Witnesses:

F. P. HALE,
F. C. HALE.