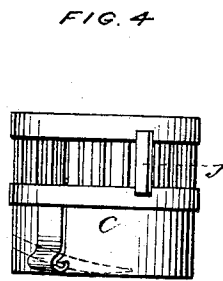
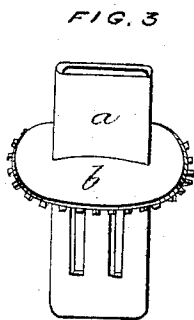
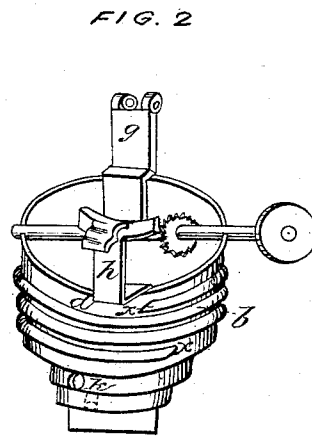
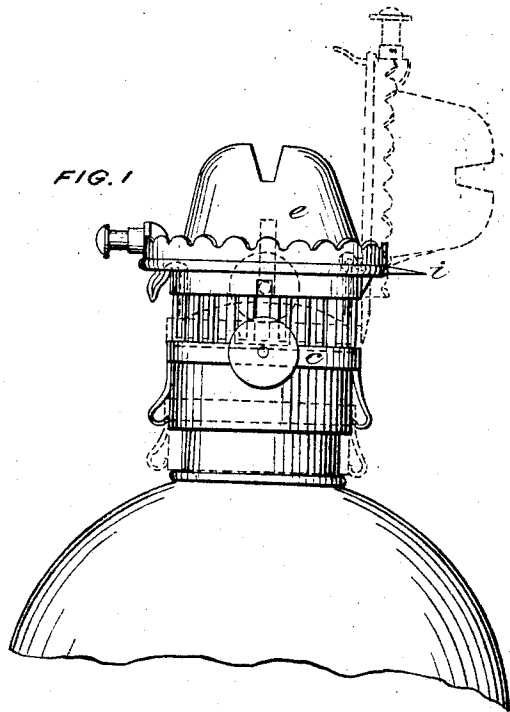


J. B. WORTHAM.

Lamp Burner.

No. 65,322.

Patented May 28, 1867.



WITNESSES:

*Wm. L. Parker*  
*Thos. D. Everett*

INVENTOR:

*J. B. Wortham*

# United States Patent Office.

JOHN B. WORTHAM, OF HUNTSVILLE, ALABAMA.

Letters Patent No. 65,322, dated May 28, 1867.

## IMPROVEMENT IN LAMP-BURNERS.

The Schedule referred to in these Letters Patent and making part of the same.

### TO ALL WHOM IT MAY CONCERN:

Be it known that I, JOHN B. WORTHAM, of Huntsville, in the State of Alabama, have invented a certain new and useful Improvement in Lamps; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawings, and to the letters and marks thereon, which said drawings form part of this specification, and show my improvement as applied to a lamp, and in detail—

Figure 1 thereof being a view in elevation of a burner attached to the upper part of the lamp.

Figure 2 being a view of an inner part of the burner.

Figure 3 being a view of the wick-tube and plate; and

Figure 4, a view of the ventilating collar or cylinder.

In each of these figures like parts are indicated by like letters.

My invention is more particularly intended to be used on lamps for burning coal oil, but may be used in lamps of any construction and designed for any other oil or illuminating fluids. My improvement will render any lamp safe and non-explosive, and will afford a clear and good flame, and free and fully supply of air thereto.

The wick-tube *a* is firmly fixed to the plate *b*, so that its joint is air-tight. This may be produced by having the two pieces fitting closely together and then burnished, or, in case the tube is round, by finely-cut screw-threads. Upon the edge of the plate *b* are teeth, which, as the ventilating collar or cylinder *c* is moved up or down, fit into the slots of that cylinder, and free them from any soot or other matter that usually tends to fill up or clog the ventilator. This cylinder *c* surrounds the body part *d* of the burner, and may be moved up and down thereon, so that the lamp may be lit without elevating the cap *e*. A coiled spring, *f*, surrounds the body part *d*, the upper end of which is affixed to the body at *x*, while the lower end *x'* is affixed to the lower end part of the ventilating cylinder *c*. The fitting of the lower end of this spring to the cylinder *c* is indicated by the dotted lines in fig. 4. The tendency of this spring is to elevate the cylinder *c*, and to keep its upper edge in contact with the cap *e*. Other means than this spring may be used in some cases, and on some lamps only friction-plates or springs would answer. To the body part *d* are affixed plates, the one, *g*, being for the hinge of the cap, and the other, *h*, for the catch. A small plate, *i*, on the cap, when the cap is thrown fully up, as is represented by the red lines in fig. 1, will fit into the space between the plate *j* on the cylinder *c* and the sides of the cylinder, and thus hold the cap up. As this burner will be air-tight, holes *k* through the body part, as indicated in fig. 2, will allow air to pass into the lamp as the oil is consumed, and hence there can be no chance for explosion. When the cylinder *c* is pressed down, the plate *b* can easily be brushed off, and the interior of the burner readily be cleaned. The different positions of the cap and the cylinder and the parts of the burner are fully indicated by the black lines in the one case, and the red lines in the other case of fig. 1. In globe or stationary lamps the burner can be readily lit without disturbing the cap or chimney or globe.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. The ventilating collar or cylinder *c*, constructed and operated and for the purposes substantially as herein recited.

2. In combination with the cylinder *c*, the toothed edge of the plate *b* or its equivalent.

3. The plates *i* and *j* for holding the cap open, as described.

This specification signed this 5th day of April, 1867.

J. B. WORTHAM.

Witnesses:

THOS. T. EVERETT,

JOHN C. PEDRICK.