

(No Model.)

C. A. KINNEY.
LAMP BURNER.

No. 263,534.

Patented Aug. 29, 1882.

fig. 1

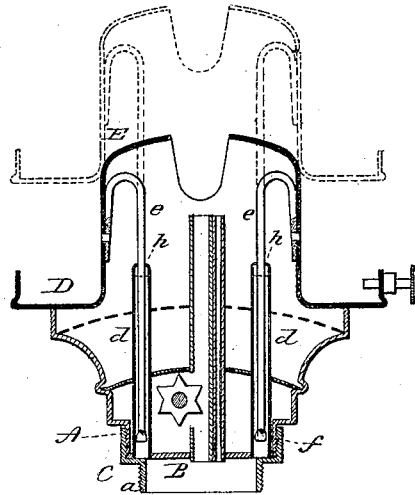
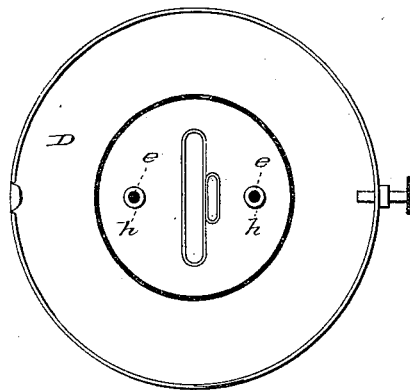


fig. 2



Witnesses.

J. A. Hummer.
Jos. C. Earle

Chas. A. Kinney
Inventor

By Atty.

J. C. Earle

UNITED STATES PATENT OFFICE.

CHARLES A. KINNEY, OF MERIDEN, CONNECTICUT, ASSIGNOR TO EDW. MILLER & CO., OF SAME PLACE.

LAMP-BURNER.

SPECIFICATION forming part of Letters Patent No. 263,534, dated August 29, 1882.

Application filed July 31, 1882. (No model.)

To all whom it may concern:

Be it known that I, CHARLES A. KINNEY, of Meriden, in the county of New Haven and State of Connecticut, have invented a new Improvement in Lamp-Burners; and I do hereby declare the following, when taken in connection with accompanying drawings and the letters of reference marked thereon, to be a full, clear, and exact description of the same, and which said drawings constitute part of this specification, and represent, in—

Figure 1, a vertical central section; Fig. 2, a transverse section above the chimney-rest and wick-tube.

This invention relates to an improvement in that class of lamp-burners for kerosene-lamps in which the chimney-rest and deflector are arranged to slide vertically to and from the base, so as to expose the wick below the deflector, as for lighting, trimming, filling, &c.

In the usual construction of this class of burners two rods have been attached to the deflector and extended down through the base of the burner to the extent at which the deflector was intended to rise, the lower end of the rods headed, so as to be arrested when they strike the under side of the base, and thus prevent the entire separation of the deflector from the burner. This construction presents several difficulties: First, the projection of the rods through the base increases the height of the burner to that extent. Hence in packing just that much more room is required—a large item in the transportation of burners. Again, it is desirable to employ upon a lamp as large a burner as possible, frequently much larger than the collar of the lamp, and in so doing what is called a “reducer” is formed. Such reducer is shown in Fig. 1.

A represents the screw part of the lamp-base, and B its bottom. C is the reducer. Its upper end is internally threaded corresponding to the thread on the base. Below this screw portion it is offset, and its diameter reduced and threaded upon its outside, as at *a*, corresponding to the neck of the lamp. Hence with this reducer applied this large burner will fit the small neck; or with the reducer removed the same burner will fit a large neck. Hence the burner is adapted to various sizes of lamps, it only being necessary that a corre-

sponding reducer shall be employed; but with such a reducer the previous construction, with the rods extending down through the base, cannot be employed, because the reducer would cover the openings through which the rods would pass, as seen in Fig. 1.

To obviate these difficulties is the object of my invention; and it consists in constructing the base of the burner with vertical tubes combined with the cone and chimney-rest, provided with vertical rods within said tubes, so as to work freely up and down thereon, the tubes serving as guides for the rods, and forming stops at their upper end to prevent the entire removal of the cone, as more fully hereinafter described.

D represents the chimney-rest, and E the cone, arranged upon the base in the usual manner. The base, chimney-rest, and cone may be of any of the known constructions, the chimney-rest and cone, however, being separate and detached from the base. Within the base are two vertical fixed tubes, *d*, and from the cone two rods, *e*, extend downward into said tubes, and so as to move freely up and down therein. These tubes and rods serve to locate the chimney-rest and cone in proper relative position to the wick-tube and base below, and permit it to be raised, as indicated in broken lines, so as to expose the wick for lighting or other purposes, and then drop down to place in the burner. The tubes extend up from the base to a height at least as great as the height desired for the cone, and so that when the cone is down upon the base the lower ends of the rods will not pass through the base. To avoid the accidental separation of the cone and chimney-rest from the burner, I make the tubes of larger diameter than the rods *e*, and form a head, *f*, on the ends of the rods, which should practically fill the tubes, or so as to form a bearing therein. The upper end of the tubes is turned inward close against the rods, and so as to form an internal flange, *h*, against which the heads *f* will strike when the cone is lifted, as seen in broken lines.

By this construction the burner is of no greater length than it would be were it not extensible. Hence the heretofore increased length for such extension is avoided and the burner is adapted to a reducer. Again, the wire rods

are not liable to be bent, as they are when they extend down through the base of the burner, and which bending interferes with their working.

5 Instead of making the tubes fixed in the base and the rods in the cone, this may be reversed, the rods fixed in the base and the tubes in the cone, so that the tubes in that case would slide upon the rods; but I prefer to
10 make the tubes fixed to the base and the rods to the cone, as before described.

I claim—

1. The herein-described improvement in that
15 class of lamp-burners in which the chimney-rest and cone are removable from the base, consisting in the tubes *d*, attached to the one

part and corresponding rods attached to the other part working in said tubes, substantially as described.

2. The herein-described improvement in that
20 class of lamp-burners in which the chimney-rest and cone are removable from the base, consisting of the tubes *d*, attached to the one part and corresponding rods attached to the
25 other part working in said tubes, the ends of the said rods headed within the tubes and the end of the tubes turned inward to form a stop, substantially as described.

CHAS. A. KINNEY.

Witnesses:

BENJ. C. KENNARS,
LEWIS E. FROST.