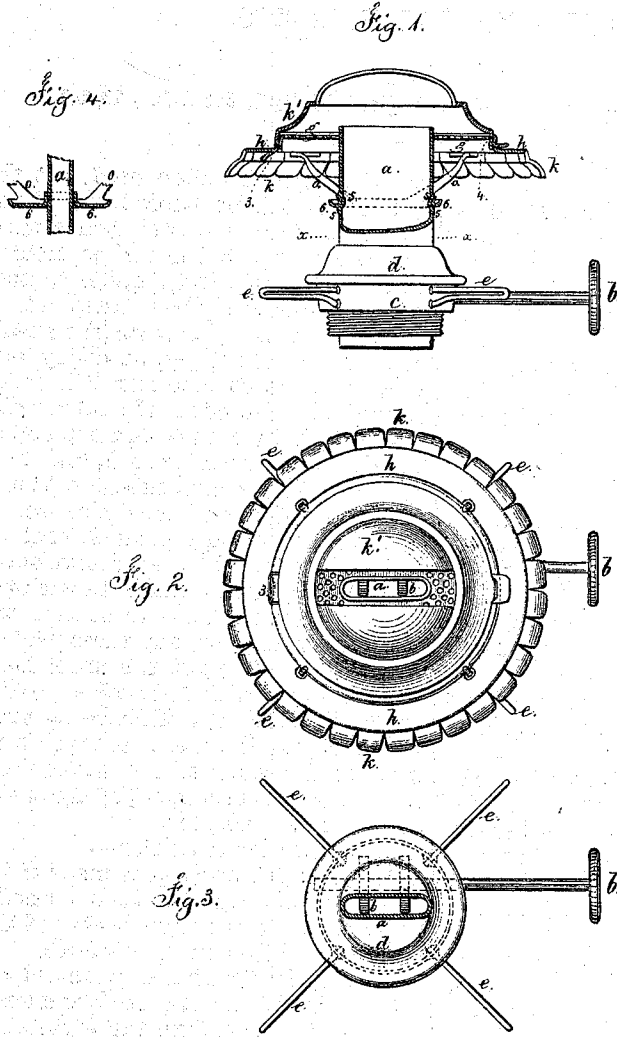


H. W. HAYDEN.

Lamp.

No. 129,821.

Patented July 23, 1872.



Cha H Smith
Geo P McKney

Witnesses.

INVENTOR
Hiram W. Hayden,
Per Lemuel M. Terrell
ATTY.

UNITED STATES PATENT OFFICE.

HIRAM W. HAYDEN, OF WATERBURY, CONNECTICUT, ASSIGNOR TO HOLMES,
BOOTH & HAYDENS, OF SAME PLACE.

IMPROVEMENT IN LAMPS.

Specification forming part of Letters Patent No. 129,821, dated July 23, 1872.

To all whom it may concern:

Be it known that I, HIRAM W. HAYDEN, of Waterbury, in the county of New Haven and State of Connecticut, have invented an Improvement in Lamps; and the following is declared to be a correct description of the same.

Before my invention an air-distributor and elevated draught plate or deflector had been sustained within a glass chimney upon the wick-tube, and the lower edges of that chimney had been supported by a ring or by arms. My present invention relates to a lamp-burner of the general character aforesaid; and consists in improvements in the construction of the parts for lessening the expense of manufacture and avoiding difficulties heretofore experienced.

In the drawing, Figure 1 is a vertical section of the said burner complete. Fig. 2 is a plan of the same. Fig. 3 is a sectional plan at the line *x x*, and Fig. 4 is a section of the wick-tube and the central disk of the supporting-arms.

The wick-tube *a* is provided with the ordinary wick-adjuster *b*, and this is within the screw-socket *c*, over which is the ratchet-cap *d*. Difficulty has been experienced in attaching the arms upon which the glass chimney rests. In some instances they have been of sheet metal, extending from the ratchet-cap, and in other instances wire hooks have been used. These are costly, or else liable to be bent. I make the arms *e e* each of a folded wire, branching apart sufficiently at the inner ends to enter two holes in the upper part of the sheet metal of the screw-socket *c*, and the ends are soldered or similarly attached inside said socket previous to the parts being put together; and in consequence of the divergence of the ends of these arms the wires brace each other firmly and make a strong support for the chimney. The perforated air-distributor *g* and draught-plate *h* are made of the same piece of sheet metal, and around the edges of the draught-plate are springs *k*, that rest against the interior of the chimney. These

parts have been before used, but the air-distributor has been sunk lower than the surrounding draught-plate; hence there was a recess, into which the carbon from the wick and from matches was liable to accumulate, and could not easily be cleaned out. To avoid these difficulties I elevate the air-distributor so that it can be wiped off easily, and the removable cone or deflector *k'* is guided in its position by the edge of said air-distributor, and is held by a hook, 3, upon one side passing through a mortise in *h*, and by a projection at 4, at the opposite side, entering a recess in the flange of the deflector. The arms *o*, projecting from a disk, 6, that surrounds the wick-tube, hold the air-distributor and deflector in position around the wick-tube, there being projections at 5 to sustain these arms upon the wick-tube, and these projections are made by forcing out the sheet metal above and below the disk 6 at each edge of the wick-tube. The disk 6 is stiffened by a rim around its edge, and the metal thereof is folded up against the sides of the wick-tube so as to make a very firm support by the said disk and arms for the deflector.

I claim as my invention—

1. The chimney-support made of the folded-wire arms diverging at the inner ends, and entering holes in the screw-socket of the burner, and secured therein, as set forth.

2. The air-distributor *g*, raised above the surrounding draught-plate *h*, and sustained by arms that extend from the wick-tube, in combination with the removable deflector, secured when in place as set forth.

3. The disk 6 with a rim around its edge, and secured to the wick-tube in the manner specified, in combination with the arms *o*, air-distributor, and deflector, as and for the purposes set forth.

Signed by me this 24th day of May, 1872.

H. W. HAYDEN.

Witnesses:

AUGUSTUS W. BLAKESLEY,
JAMES M. ABBOTT.