(No Model.)

W. H. ROBBINS.

LAMP BURNER ATTACHMENT.

No. 500,255. Patented June 27, 1893.

FIG. 1.

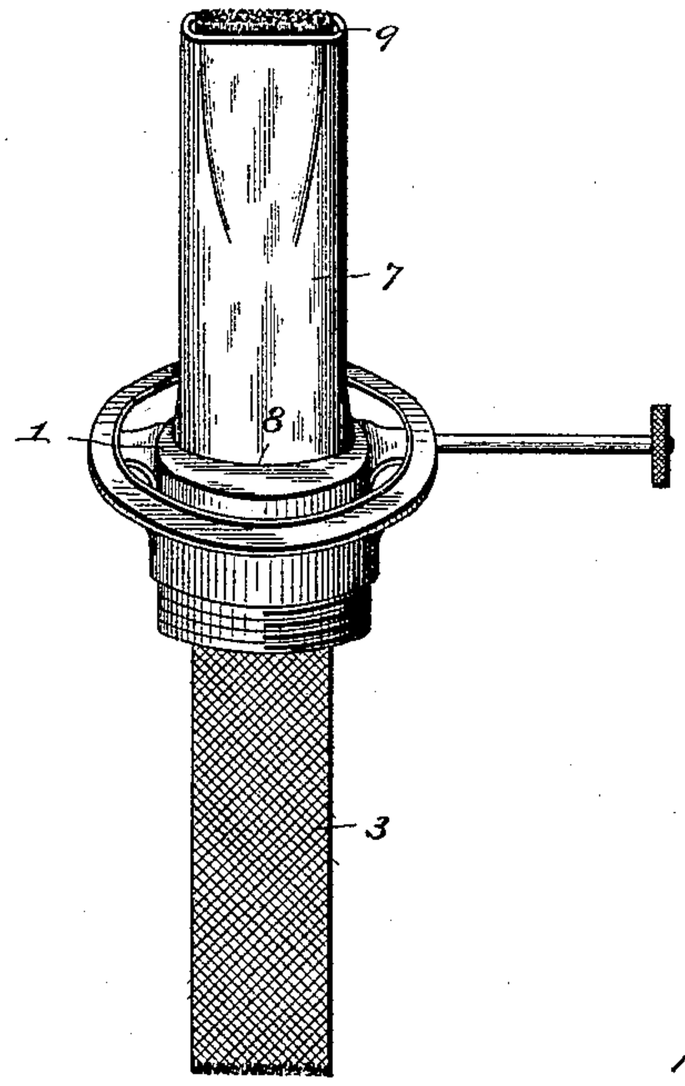


FIG. 2.

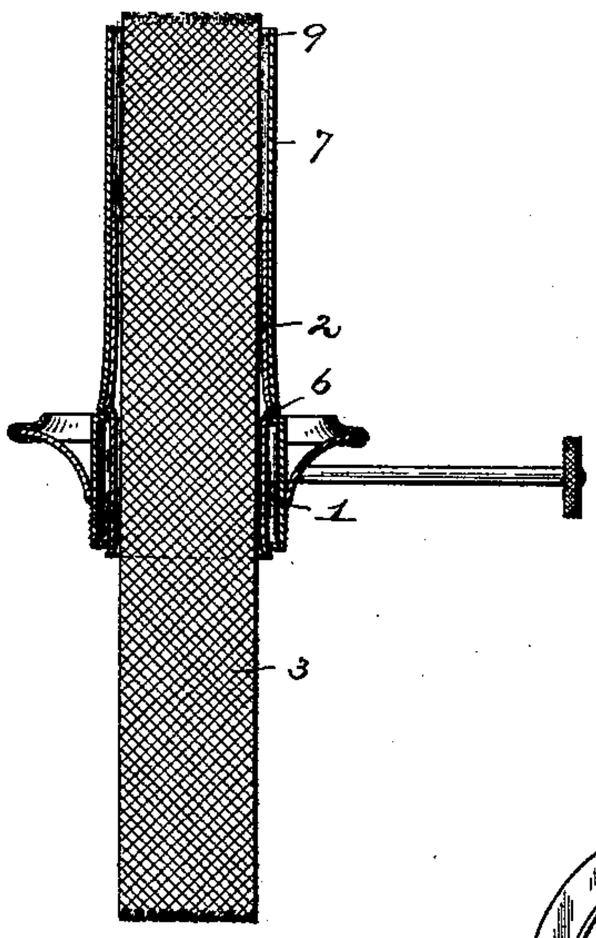


FIG. 3.

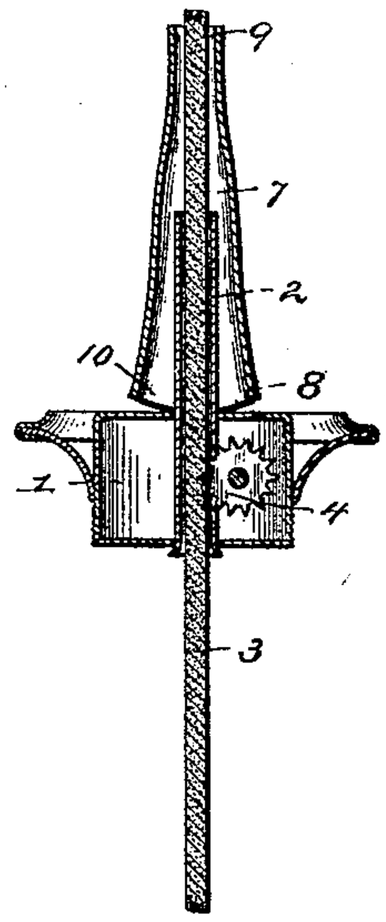
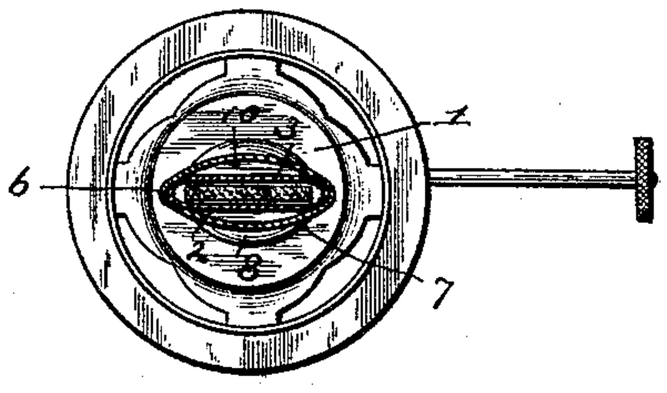


FIG. 4.



Witnesses

Harry L. Amer.

W. S. Duvall.

Inventor

William H. Robbins.

By his Attorneys,

C. A. Snow & Co.

THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

WILLIAM H. ROBBINS, OF MILL GROVE, INDIANA.

LAMP-BURNER ATTACHMENT.

SPECIFICATION forming part of Letters Patent No. 500,255, dated June 27, 1893.

Application filed January 21, 1893. Serial No. 459,191. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM H. ROBBINS, a citizen of the United States, residing at Mill Grove, in the county of Blackford and State of Indiana, have invented a new and useful Lamp-Burner Attachment, of which the following is a specification.

My invention relates to an attachment for lamps, the same being designed to be applied to those already in use or manufactured in connection therewith, and especially to that class of lamp-burners employed in railway-signals, targets, and other uses wherein it is desirable to obtain a burner so constructed as to require but slight attention, infrequent cleaning of the burner and snuffing of the wick, though, as will hereinafter appear, the same is useful and will perform its functions in connection with lamps for domestic and other uses; and furthermore to provide a device that will effect a saving in the consumption of the oil, for which purpose the burner-attachment is so constructed as to expose to the action of a current of cool air the wick and oil impregnating the same at a point some distance below that of combustion.

The objects of the invention are to provide an attachment of the above class to be employed for the purpose specified, and to provide the same with convenient means for securing the burner in position.

With these objects in view the invention consists in certain features of construction hereinafter specified and particularly pointed out in the claims.

Referring to the drawings:—Figure 1 is a perspective view of an ordinary burner provided with my attachment. Fig. 2 is a transverse vertical section through the burner and attachment. Fig. 3 is a similar section at a right angle thereto. Fig. 4 is a transverse horizontal section.

Like numerals of reference indicate like parts in all the figures of the drawings.

1 designates the usual supporting-cap for the wick, and 2 the wick-tube or guide, which in ordinary lamps serves as the burner and in which the wick 3 is adjustable through the medium of the usual adjusting device 4. The wick-tube or guide may be of any ordinary construction, and in this instance, is shown in cross-section as being elliptical. It is preferably provided near its base and at its narrower edges or sides with superficially formed lugs or projections 6.

7 designates the burner-attachment, and it is of a length somewhat greater than the wick-tube, that is to say it is longer than the distance between the cap and the upper end of said wick-tube, and this difference may be of any desired degree deemed most expedient by the manufacturer, and as the different constructions and uses to which the lamps are to be put may dictate. The tube is preferably cylindrical or nearly so at its base, so that it appears flared as indicated at 8, and at opposite sides of its base is provided with indentations or grooves, which receive the superficial projections heretofore described as being formed upon the wick-guide or tube of the burner. The upper end or portion of this tubular burner attachment is flattened so as to substantially agree in cross-section with the wick-guiding tube, thus forming the burner-tip or end 9. It is, however, slightly larger than the wick-guiding tube in cross-section and therefore receives the wick in a loose manner, forming around it in this instance a space. By the flaring of the lower end of the tube 7 air-inlets 10 are provided through which currents of cool air may pass into the tube 7.

It will be seen that when my attachment is in position the wick will at its upper end reach the upper end of said attachment, and hence that portion of the wick which is between the upper end of the attachment and the upper end of the wick-guiding tube will be exposed to the contact and resulting action of the currents of air as they pass upwardly between the wick and the burner-tube attachment. The result of this is that the oil impregnating the wick is cool at a point considerably below and up to within a short distance of the point of combustion, so that I avoid the warm oil being fed to the point of combustion, which, as is well known, is conducive to the production of smut and the consumption of the wick or a charring of the same and also to a consumption of the oil, and in this manner in lieu of such disadvantages, the consumption of oil is reduced, the charring of the wick is reduced, and the production of smut is reduced, whereby a saving

is effected in the wick and the oil, and in the attendance and labor that would otherwise be necessarily involved, wherein frequent new supplies of oil, trimming of wicks and cleaning of burners is required.

It will be seen that this burner-attachment, as before stated, may be manufactured in connection with that of the cap and wick-tube, or it may be applied to such burners as will permit by reason of their construction and that are now in use. Of course the tube would be varied in its form in order to accommodate itself to the different makes of wick-tubes, all of which I contemplate as being within my invention.

Having described my invention, what I claim is—

The combination with a lamp-cap and wick-tube, the latter provided at its opposite narrowest sides and at its lower end with superficial projections and being elliptical in cross-section, of a burner-tube attachment in cross-section at its upper end agreeing with that of the wick-tube but larger than the same and at its base being flared to produce opposite openings, the base having formed therein at its opposite narrowest sides and at its lower end shallow grooves for receiving the projections of the wick-tube, and the burner as a whole extending above the upper end of the wick-tube, substantially as specified.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in the presence of two witnesses.

WILLIAM H. ROBBINS.

Witnesses:

WILLIAM J. CONSTANT,

HERMON E. ROBBINS.