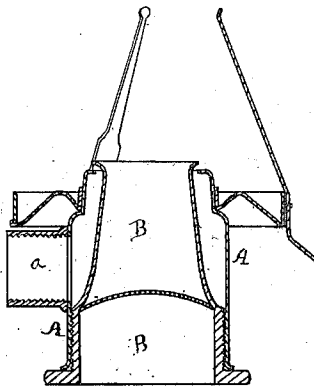


C. E. BALL.
Argand Burners.

No. 140,108

Patented June 24, 1873.



Witnesses.

J. L. Wildman
W. F. Hutchinson.

Inventor:

Chas. E. Ball
by Chas. L. Coombs
Atty.

UNITED STATES PATENT OFFICE.

CHARLES E. BALL, OF PHILADELPHIA, PENNSYLVANIA.

IMPROVEMENT IN ARGAND BURNERS.

Specification forming part of Letters Patent No. 140,108, dated June 24, 1873; application filed June 3, 1873.

To all whom it may concern:

Be it known that I, CHAS. E. BALL, of Philadelphia, State of Pennsylvania, have invented certain Improvements in Argand Gas or Vapor Burners, of which the following is a specification:

My invention relates to that class of Argand burners in which the flow of gas is regulated and controlled at the point where the gas escapes, or the point of combustion; and it consists in so constructing and arranging the two shells of which the burner is composed that the burner will be opened by an upward movement of the inner shell and closed by a downward movement of the same, as herein-after more fully set forth.

In constructing my burner I make the outer shell, as usual, with a female screw on the interior of the lower part, and I generally turn or bevel its upper edge inwardly. The inner shell I construct with a male screw on the outside of the lower part. The said inner shell is made of sufficient length to project above the upper edge of the outer shell when properly placed therein, and the upper edge of said inner shell is turned or beveled outward so as to form a valve which will have its seat on the upper edge of the outer shell. It will be seen that the burner thus constructed will be opened in the act of screwing together or tightening the two shells, and will be closed by unscrewing the same. It will be further seen that the movement of the inner shell is limited in both directions by the bevel and thumb-flange, and cannot be turned out of the outer shell by accident or carelessness.

The drawing represents a sectional view of my invention.

A represents the outer shell, having a female screw on the lower portion of its interior and provided with a short pipe, *a*, to connect with the service-pipe. This pipe is made the full size of the service-pipe in order to deliver the gas freely to the burner. B represents the inner shell, the lower portion of which is made with straight sides, the upper portion being turned in or contracted, as shown, and extending upward above the edge of the outer shell, where it is beveled or turned outward, forming a valve which has its seat on the top of the outer shell at its edge, as shown.

The burner will be opened by the act of screwing together or tightening the two shells, and closed by unscrewing the same. It will be impossible to move the inner shell too far in either direction, for the bevel or valve on the upper edge of the inner shell limits its downward movement, and the thumb-flange on its lower part limits its upward movement. It is, therefore, impossible to turn the inner shell out of the outer shell, or unscrew it, as is the case in the burners as ordinarily constructed. Across the interior of the inner shell I set a disk of wire-gauze or a perforated plate; but this may be omitted, if desired.

What I claim is—

The inner shell B extending above the top of the outer shell A, and beveled outwardly at its upper edge, forming a valve having its seat on the edge of the outer shell in combination with said outer shell, arranged to operate as described.

CHAS. E. BALL.

Witnesses:

FRANCIS D. PASTORIUS,
WM. H. RUTHERFORD.