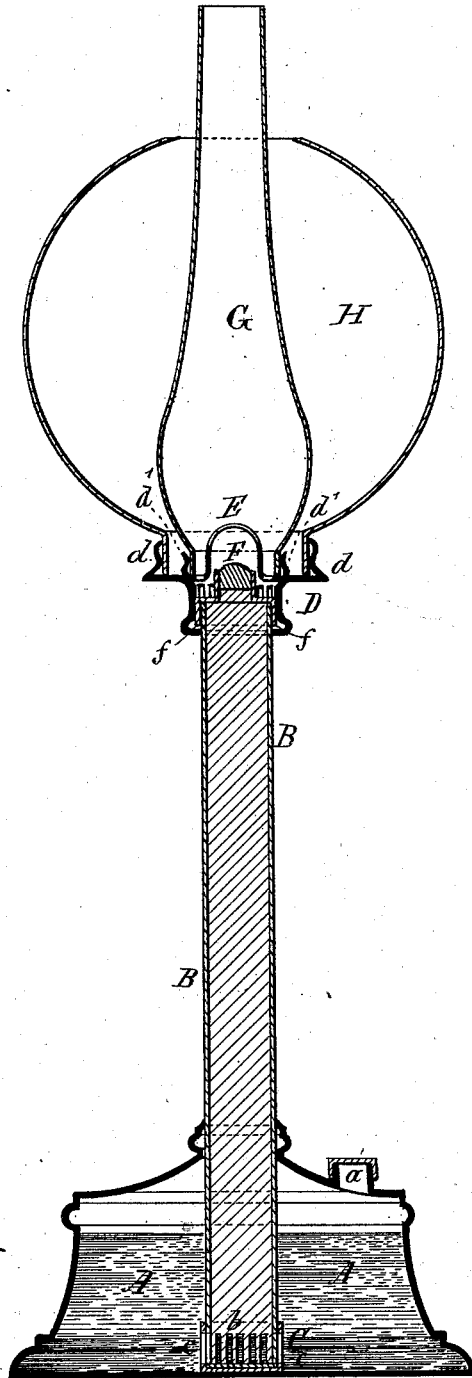


P. HAEDICKE.
Lamp.

No. 203,443.

Patented May 7, 1878.



Witnesses
Alf. L. Leonard
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att'y

UNITED STATES PATENT OFFICE.

PAUL HAEDICKE, OF BERLIN, PRUSSIA.

IMPROVEMENT IN LAMPS.

Specification forming part of Letters Patent No. **203,443**, dated May 7, 1878; application filed April 1, 1878.

To all whom it may concern:

Be it known that I, PAUL HAEDICKE, of the city of Berlin, in the Kingdom of Prussia, and German Empire, have invented new and useful Improvements in Lamps for Burning Volatile Oils; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying sheet of drawings, in which my invention is fully illustrated by a vertical section of a lamp constructed according to my invention, which consists in certain new and useful construction and arrangement of parts, as hereinafter more fully described.

In the drawing I have illustrated the ordinary lamp as embodying my invention, though it will be readily understood that the principles hereinafter described may as readily be applied to any species of illuminating devices—such as chandeliers, wall-brackets, and other like devices.

A is the foot of the lamp, and also constitutes the oil-reservoir, which is provided with a filling-mouth, *a*, and a central sleeve or step, C, having fluid-apertures *c c*. B is the supporting-column, the lower end of which has fluid-ports *b b*, so located as to register with the ports *c* of the sleeve C, in which the column B is stepped or made fast. The column B is filled with a non-combustible and non-conducting material, such as fire-proof clay, asbestos, or other similar capillary material, preferably asbestos, through which the illuminating volatile oil, such as kerosene, petroleum, camphine, or other kindred oils, are fed to the burner by capillary attraction, and are at the same time deprived of any impurities they may contain.

D is the burner, constructed in any usual or preferred manner, and provided with the usual means to support the glass and shade, as shown at *d d'*, and adapted to be slipped onto the column B by means of the sleeve *f*, which forms the wick-tube, or what usually constitutes the wick-tube, but of greatly-reduced dimensions in length, as shown. This tube, flattened as usual, carries a piece of asbestos, gypsum, or other like material, F, in lieu of the

usual wick. The burner-tip F is squared on its lower face and slightly rounded on its upper, as shown.

E is the usual deflector, G the chimney, and H the shade, all of any usual construction and arrangement.

It will be readily understood that by this peculiar construction a lamp or other illuminating apparatus perfectly safe from explosion is produced, while its cost of construction is not materially greater than that of the lamp now in use, while the incombustible wick-section F is much cheaper than the wicks usually employed, as I have found by experience that a change of this wick-section need not be made more frequently than every hundred hours of actual use, when it becomes choked up by impurities in the oil and calcined.

A further great advantage gained is, that all the disagreeable work of cleansing the burner and trimming the wick is done away with.

Having described my invention, what I claim is—

1. The combination, in a lamp, of a reservoir, A, forming the foot of said lamp, the supporting-column B, having ports *b* at its lower extremity, and being filled with a non-combustible but highly capillary material, and the burner D, substantially as described, and operating as set forth.

2. The combination of the reservoir A, provided with filling-orifice *a*, and a sleeve, C, having ports *c*, the supporting-column B, having ports *b*, registering with ports *c* of the sleeve C, a non-combustible but highly capillary material contained in said column B, the burner D, and the incombustible wick-section or tip F, all combined, constructed, and operating substantially as described.

This specification signed by me this 11th day of February, 1878.

PAUL HAEDICKE.

Witnesses:

EDWARD P. MACKEAN,
HERMANN KREISMANN,
*Consulate General of the
United States of America at Berlin.*