

(No Model.)

H. CLAYTON.
ALCOHOL STOVE.

No. 319,955.

Patented June 16, 1885.

Fig. 1.

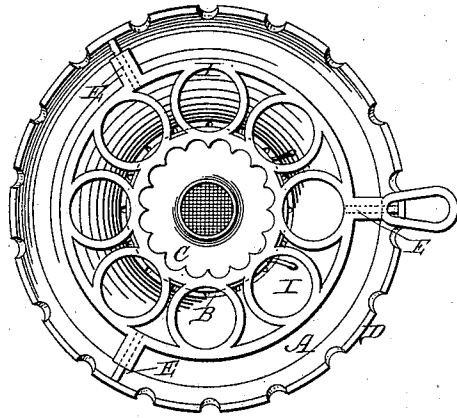
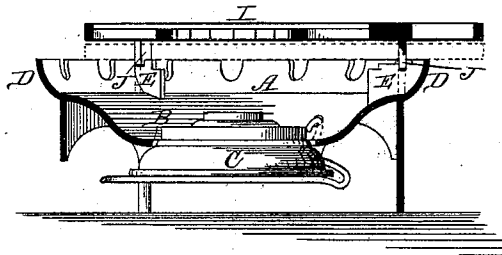


Fig. 2.



Witnesses:

J. W. Garner
E. M. Kenoyer

Inventor:

Herbert Clayton,
per
J. A. Lehmann,
att'y

UNITED STATES PATENT OFFICE.

HERBERT CLAYTON, OF CINCINNATI, OHIO.

ALCOHOL-STOVE.

SPECIFICATION forming part of Letters Patent No. 319,955, dated June 16, 1885.

Application filed September 22, 1884. (No model.)

To all whom it may concern:

Be it known that I, HERBERT CLAYTON, of Cincinnati, in the county of Hamilton and State of Ohio, have invented certain new and useful Improvements in Alcohol-Stoves; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to an improvement in alcohol-stoves; and it consists, first, in the metallic frame, which is open at its top, and has an opening through its center through which the upper portion of the lamp projects, the frame being made to fit closely around the top of the lamp, and being raised above the table or support by suitable legs or feet; second, the combination of an alcohol-lamp with the metallic frame to which the lamp is applied, and which is provided with suitable flanges upon which the cooking-utensil is placed, and with a griddle, which can be raised and lowered in relation to the flame of the lamp, as will be more fully described hereinafter.

The object of my invention is to provide an alcohol-lamp in which the heat is prevented from radiating downward upon the table or support upon which it is placed, and in which the griddle can be raised or lowered in relation to the flame.

Figure 1 is a plan view of a stove embodying my invention. Fig. 2 is a vertical section showing the griddle raised upon the flanges or ribs.

A represents the metallic body or frame of the stove, which is open at its top, and which has an opening, B, through its bottom just large enough to permit the top of the alcohol-lamp C to be inserted. Around the top edge of the frame is formed the flange D, which has a series of perforations for the free escape of the heat, and inside of this flange, extending toward the center of the frame, are a suitable number of ribs or flanges, E, provided with shoulders upon which the cooking-utensils are to be placed. If the cooking-utensil is large enough to cover the whole top of this frame A, the heat and products of combustion will

escape through the notches or perforations in the flange D. The ribs or flanges upon which the cooking-utensils are supported are made shouldered, as shown, so that a small utensil, which will fit inside of the shoulders, will be prevented from having any lateral movement. From the bottom of the flanges or ribs the frame inclines downward, as shown, so as to just touch the sides of the lamp, and through this lower edge, which is in contact with the lamp, are made suitable small perforations through which air passes to feed combustion.

By having the alcohol-lamp fit snugly inside of the opening in the bottom of the frame, the heat is prevented from being radiated down upon the table or other support upon which the lamp is placed, and the lamp itself is prevented from being heated to such a degree as to cause it to burn too rapidly. No claim is here made for the lamp, because that is conceded to be old, and hence no further description will be given of it.

This lamp is held in position by means of the wire holder, which is attached to the frame and which presses the lamp tightly into position, but which will allow the lamp to be removed from the frame at any time.

When articles are to be heated which are too small to be placed upon the ribs or flanges, or when it is desired to raise the article above the flame to a greater or less degree, the griddle I is used. This griddle is provided with a suitable number of notched feet, J, corresponding to the number of shouldered ribs or flanges, and which feet are adapted to either rest upon the top of the frame inside of the flange C or upon the top of the ribs, as may be desired. When the article is to be brought closer to the flame of the lamp, the feet of the griddle will be allowed to rest upon the top of the frame; but when it is desired to raise the article upward, then the feet J of the griddle will be made to catch upon the top of the ribs, as shown. By notching the feet the griddle is held rigidly in position, and thus prevents it from slipping off, as it otherwise would be liable to do.

By means of the construction above described a lamp is produced which can be used in a house or sick room at any time, with-

out producing any smell, smoke, or vapor, and which can be readily moved around from one place to another, as necessity may require.

5 As the heat cannot be radiated downward, there is no danger of placing the lamp upon tables or wooden supports of any kind, even if they are covered with inflammable material. The inclined bottom of the frame A is polished and plated upon its upper surface, so as to radiate or reflect the heat against the bottom of the cooking-utensil, thus utilizing a greater proportion of the heat than can be done where this surface is left rough.

10 Having thus described my invention, I claim—

15 1. The combination of an alcohol-lamp with a metallic frame provided with feet or supports of its own, and which is open at its top, and which has an opening through its bottom just large enough to allow the upper end of the lamp to be inserted, the lamp C being held in position

by means of a suitable spring, substantially as shown.

2. The combination of an alcohol-lamp, the metallic frame A, provided with a notched flange around its upper edge which tapers downward toward its bottom so that its lower edge comes in contact with the sides of the lamp, and thus prevents the radiation of heat downward, substantially as described.

3. The combination of the lamp-frame having ribs upon its top, with the griddle, having feet which are adapted to rest either upon the frame or upon the ribs, substantially as set forth.

In testimony whereof I affix my signature in presence of two witnesses.

HERBERT CLAYTON.

Witnesses:

HARRY MILLER,
GEO. W. BLUM.