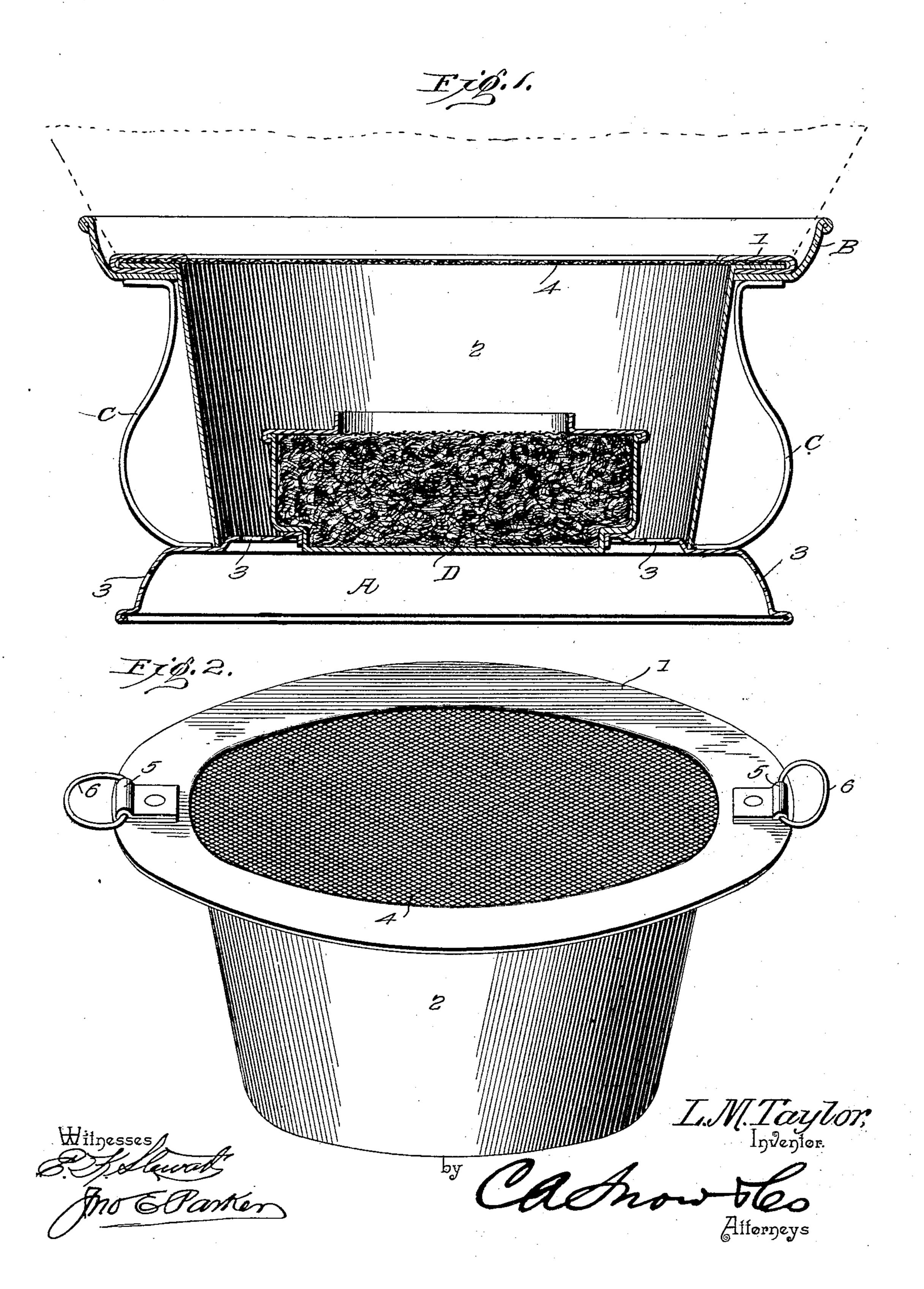
L. M. TAYLOR.

CHAFING DISH HEATER AND SUPPORT.

(Application filed Oct. 19, 1901.)

(No Model.)



IJUTTED STATES PATENT OFFICE.

LEROY M. TAYLOR, OF WASHINGTON, DISTRICT OF COLUMBIA.

CHAFING-DISH HEATER AND SUPPORT.

SPECIFICATION forming part of Letters Patent No. 713,531, dated November 11, 1902.

Application filed October 19, 1901. Serial No. 79, 290. (No model.)

To all whom it may concern:

Beitknown that I, LEROY M. TAYLOR, a citizen of the United States, residing at Browns Court, in the city of Washington, District of 5 Columbia, have invented a new and useful Chafing-Dish Heater and Support, of which the following is a specification.

My invention has for its object to provide an improved form of support and heater for 10 chafing-dishes and other vessels, in which the heating-flame is distributed and utilized to the best advantage without permitting the flame to come into actual contact with the dish and tarnish or deposit carbon thereon.

A further object is to embody the essential elements of the device in the form of an attachment which may be made and sold as a separate article and attached to chafing-dish supports and heaters in common use.

In the accompanying drawings, Figure 1 is a sectional elevation of a chafing-dish support and heater, and Fig. 2 is a detached perspective view illustrating the more essential elements of the device forming the subject of 25 my invention.

The main body of the support (illustrated in the drawings) is similar to that in general use and comprises a base A, formed of thin sheet metal, an upper dish-receiving rim B, 30 and supporting-standards C, extending bebetween the base and rim. On the base is a burner D, of the usual type, which may be filled with alcohol or other heating fluid.

1 designates a ring formed of thin sheet 35 metal and adapted to rest upon the rim B. From the ring depends a tapering cylindrical shield or guard 2, which entirely incloses the space between the rim and base and protects the flame from side drafts. The lower edge 40 of the guard may be spaced a short distance from the base to permit the entrance of the air necessary to support combustion, but preferably is in close contact with the base, openings 3 being formed in the latter to per-45 mit the passage of air. The ring 1 supports a sheet 4 of fine wire-gauze, against which the flame impinges and by which it is spread and evenly distributed throughout the entire area of said gauze. The ring 1 serves to sup-50 port a chafing-dish or other vessel, as indicated in dotted lines, the bottom of said ves-

not in actual contact therewith. To the top of the ring are secured pivot-ears 5 for lifting rings or handles 6.

In using this device it is found that the flame will gradually and evenly heat the wiregauze throughout its entire area, the gauze in some cases becoming incandescent. The gauze is made of very fine wire of fine mesh 60 and prevents the passage of flame, so that the chafing-dish is not soiled or tarnished by contact with the flame. The necessary heat for cooking purposes is secured by radiation from the heated gauze, and as the distance 65 between the gauze and the bottom of the dish is very small the heat is all utilized and is distributed evenly throughout the bottom of the dish. When the dish rests upon the ring 1, it covers or incloses the space above the 70 gauze and within the ring, and this space becomes filled with gases in a highly-heated condition and acting as a conductor between the gauze and the bottom of the vessel. The products of combustion will escape between 75 the upper surface of the ring and the bottom of the chafing-dish or other vessel; but the space is at all times filled with gases and air, which pass through said gauze.

The thorough and even heating of the gauze 80 is due in part to the cylindrical shield or guard 2, said shield preventing any drafts which would tend to sweep the flame from side to side and render its action uncertain and irregular. The air necessary to support 85 combustion passes through the openings 3 in the base A, a continuous circular row of said openings being formed in the base, so as to afford an even supply around the burner.

The device may be employed in connection 90 with a burner or chafing-dish support of any desired size or character, and the particular construction herein described and illustrated may be modified to suit any special requirement without departing from the spirit or 95 sacrificing any of the advantages of my invention.

Having thus described my invention, what I claim is—

1. An attachment adapted for removable 100 application to a chafing-dish heater, comprising an imperforate guard inclosing the burner and flame and forming at its upper end a supsel being immediately above the gauze, but I port for the chafing-dish or other vessel, and

a sheet of wire-gauze supported by said guard and forming a heat absorbing and distributing medium.

2. An attachment for a chafing-dish support, comprising a metallic ring for the support of the chafing-dish or other vessel, a sheet of wire-gauze supported by said ring and adapted to act as a heat absorbing and distributing medium, and a depending guard carried by said ring and adapted for contact with the base portion of the support, said guard being adapted to inclose the space around the burner.

3. An attachment for a chafing-dish sup15 port, comprising a cylindrical burner-inclosing guard or shield adapted for contact with the base of the support, a metallic ring secured to said guard and serving as a dishsupport, and a heat absorbing and distributing medium carried by the metallic ring

and adapted for contact with the flame to provide a heat-radiating flame-interrupting surface.

4. The combination of the perforated base, a supporting-rim, legs or standards connecting the supporting-rim and the base, a burner carried by the base, a metallic ring adapted to be seated in said rim, lifting handles or rings on said rim, a tapering circular guard depending from said ring and adapted to inclose the burner, and a sheet of fine wiregauze carried by said ring, substantially as specified.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in 35

the presence of two witnesses.

LEROY M. TAYLOR.

Witnesses:

E. E. BOYLE,

J. Ross Colhoun.