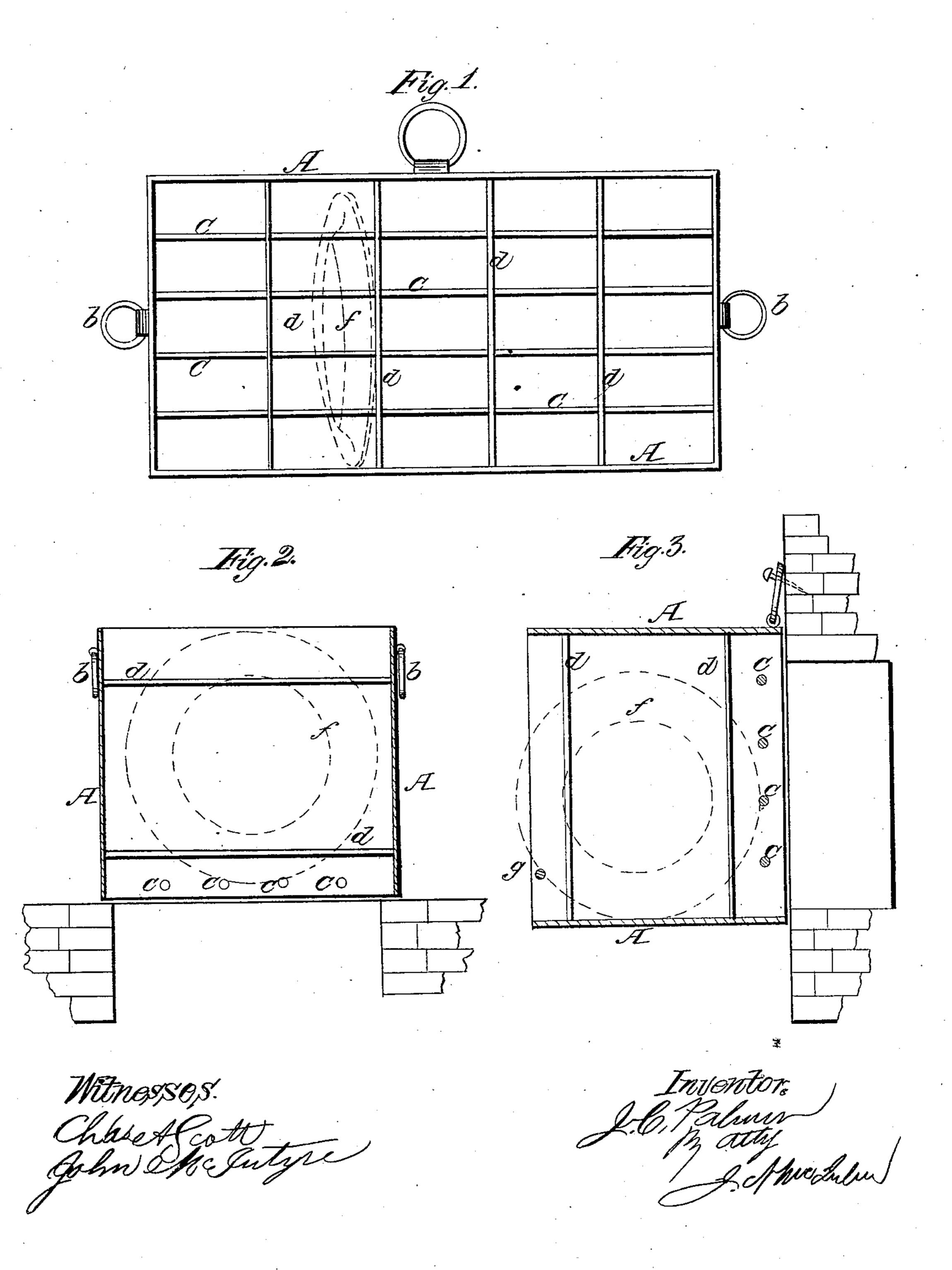
J. C. PALMER.

Plate Warmer.

No. 68,229.

Patented Aug. 27, 1867.



## Anited States Patent Pffice.

## JAMES C. PALMER, OF NEW YORK, N. Y.

Letters Patent No. 68,229, dated August 27, 1867.

## IMPROVEMENT IN PLATE-WARMERS.

The Schedule referred to in these Vetters Patent and making part of the same.

## TO ALL WHOM IT MAY CONCERN:

Be it known that I, J. C. Palmer, of New York city, of New York county, in the State of New York, have invented certain new and useful Improvements in Plate-Warmers; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, making part of this application.

My invention relates to a new and useful improvement in plate-warmers.

Previous to my invention it has been customary to construct plate-warmers in the form of a case or box adapted to stand over the "register," (from which heat is supplied,) and to receive the plates in a flat or horizontal position upon wire shelves. In some instances these apparatus have been made with a door, so that the plates could be shut in, while others have been made with one side open, so that the hot air might more readily escape into the room; but in all cases the supply of hot air from the register to the room would be more or less diminished.

The great defect or objection found to exist in the practical working of plate-warmers, however, is the uneven heating of the plates placed therein, the plates on the lower shelves receiving the full effect of the current of hot air as it escapes through the register, and becoming thoroughly heated, while (in the same time required to warm the plates so placed) those placed above will not be sufficiently heated. To overcome this great defect and provide for use a simple, economic, and convenient apparatus or utensil in which all the plates will be heated alike, and in which the current of hot air supplied to the rooms will not be obstructed at all, are the main objects of my invention, which consist in a plate-warmer so constructed that the plates placed and held therein shall stand with their edges toward the register, (that is to say, in such position that the blast or current of hot air from the register will pass through the apparatus in the direction of the planes in which the plates stand,) while at the same time the apparatus shall not obstruct the free passage of the hot air from the register into the room, as will be hereinafter more fully explained.

To enable those skilled in the art to make and use my invention, I will proceed to describe it more particularly, referring by letters to the accompanying drawings, in which—

Figure 1 is a top view of one of my improved plate-warmers, illustrated as placed over a register in the floor of the room.

Figure 2 is a cross-section of the same, and

Figure 3 is a similar section, showing the apparatus as if hung up against the wall and over a register placed in the side of the room.

In the several figures the same parts are designated by the same letters of reference.

A is a short metal case or box-frame, which may be made of about the form shown, and of about the usual size of a plate-warmer. This frame A is provided with suitable handles b b at either end, by which it may be lifted and carried, and is also supplied with one or more rings, or the equivalent means, by which it may be suspended against the side of the room, when the furnace-register is arranged in the wall and above the floor. e c, &c., are wires or bars running longitudinally through the case A and near one edge thereof, and d d, &c., are wires or rods running crosswise, and so as to constitute partitions or supports between the plates f, which latter rest either on the bars c c, when the apparatus is placed over a register in the floor, as seen at fig. 1, or upon the lower side of frame A, when the apparatus is hung up against the wall, as seen at fig. 2. g is a retaining-rod to hold the plates in when the warmer is placed as seen at fig. 2.

It will be seen and understood that in either of the applications or modes of using the warmer shown, the currents of hot air pass right through the frame A, as indicated by the arrows in the drawings, without being materially impeded, and out into the room, the hot air impinging upon the surfaces of the plates in its passage, and heating them; and it will also be understood that all the plates in the warmer will be subjected to the same intensity of heat, and all will be warmed alike. It will be seen that by the arrangement of the plates shown they can be most conveniently placed in and taken out of the apparatus.

Of course, in carrying out my invention various modifications may be adopted and derived; for instance, in lieu of the rods c c, a perforated sheet of metal or wire gauze might be employed, and the size and design may be changed without departing from the spirit of my invention.

It will be seen that my improved plate-warmer may be applied with equal facility and advantages to

either a register in the floor or one in the side of the wall, which is a great desideratum, since many housekeepers frequently move into different houses in which the dining-room registers are differently arranged or located, (being sometimes in the floor and sometimes in the side of the room.)

Having fully described my invention so that one skilled in the art can make and use my improved plate-

warmer, what I claim as new, and desire to secure by Letters Patent, is-

A plate-warmer so constructed and operating as to present the plates edgewise to the heater-register, substantially as and for the purposes described.

I also claim so constructing a plate-warmer that it can be applied either to a register in the floor or one in the wall, by merely shifting its position, substantially as described.

In testimony whereof I have hereunto set my hand and seal this

day of June, 1867.

JAS. C. PALMER. [L. s.]

Witnesses:

J. N. McIntire,

C. A. Scott.