

No. 890,081.

PATENTED JUNE 9, 1908.

G. W. MOORE.

INCUBATOR.

APPLICATION FILED JAN. 14, 1908.

Fig. 1.

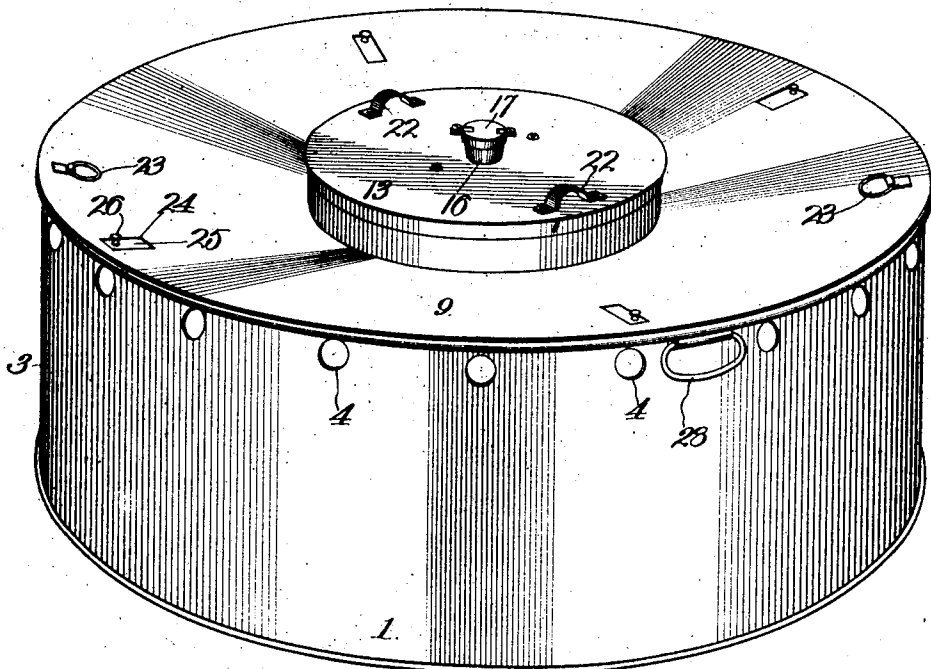
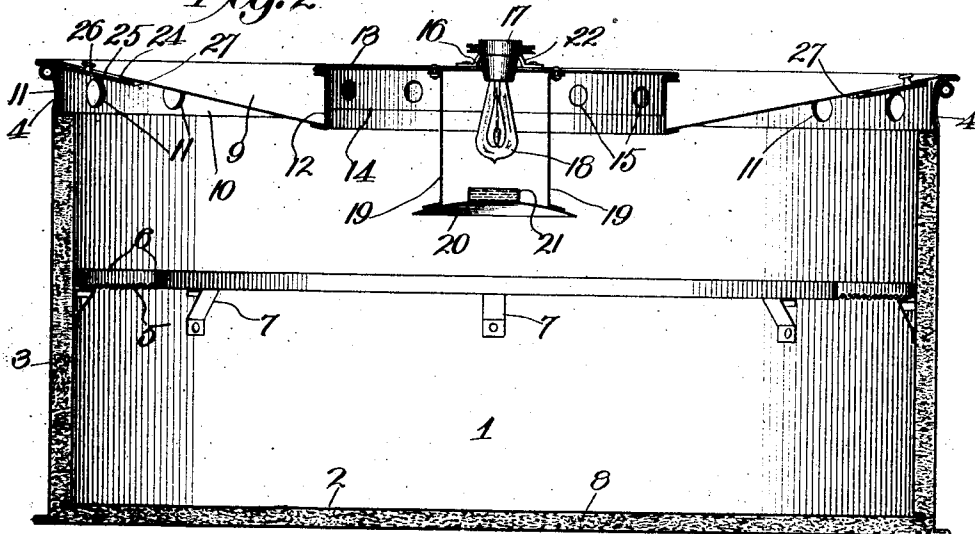


Fig. 2.



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UNITED STATES PATENT OFFICE.

GEORGE W. MOORE, OF PARSONS, KANSAS

INCUBATOR.

No. 890,081.

Specification of Letters Patent.

Patented June 9, 1908.

Application filed January 14, 1908. Serial No. 410,779.

To all whom it may concern:

Be it known that I, GEORGE W. MOORE, a citizen of the United States, residing at Parsons, in the county of Labette and State of Kansas, have invented certain new and useful Improvements in Incubators, of which the following is a specification.

This invention relates to incubators and my object is to produce an incubator in which the eggs are hatched in the light and under the heat of an incandescent lamp within the incubator.

A further object is to produce an incubator in which the hatching operation takes place without subjecting the eggs to smoke, gas or dirt or endangering them by fire.

A further object is to produce an incubator in which more or less air can be caused to circulate for ventilation and for regulating the temperature.

A still further object is to produce an incubator of simple, strong, and inexpensive construction.

With these objects in view the invention consists in certain novel and peculiar features of construction and organization as hereinafter described and claimed; and in order that it may be fully understood reference is to be had to the accompanying drawing, in which—

Figure 1, is a perspective view of an incubator embodying my invention. Fig. 2, is a central vertical section of the same.

In the said drawing, 1 indicates a sheet metal cylindrical casing, having a double bottom 2 and a double side wall 3 extending upward from the bottom to within a short distance of the top and provided above the doubled portion of the wall with a series of ventilation holes 4. If desired the casing may be equipped with a circular foraminous shelf 5 provided with upwardly projecting walls or flanges 6 at its inner and outer edges, which tend to stiffen it and the inner wall or flange also guards against the eggs placed upon said shelf from rolling off the same and falling upon the main body of eggs which in practice are placed upon bottom 2. The foraminous shelf is preferably supported upon brackets 7 secured at suitable intervals to the wall, it being also understood that dry sawdust or equivalent insulating mate-

rial 8 is packed in the doubled bottom and the wall.

9 indicates a circular cover to fit down upon the casing and provided with a flange 10 to fit snugly within the casing above the doubled wall, said flange being provided with ventilation holes 11 to be disposed in or out of line with holes 4 so as to open communication between the external air and the interior of the casing or to entirely cut off the entrance of such air, it being obvious that by turning the cover holes 11 thereof can be caused to overlap holes 4 for the purpose of varying the volume of air admitted to the casing. The cover 9 is of inverted conical form by preference, to stiffen it and also to permit the circular flange 12 projecting upward from its inner margin to lie wholly below the plane of its outer margin.

13 is a cap which fits upon said flange 12 and is provided with a depending circular flange 14 to fit snugly within the flange 12 the cap flange 14 being provided with a series of ventilation holes 15 which when said flange is forced completely into flange 12, are closed by the latter, it being understood that flange 14 will fit with sufficient friction in flange 12 to permit more or less of the holes 14 to be exposed above the upper edge of flange 12, if desired, for ventilation or heat regulating purposes. The cap is provided with a central hole 16 through which an incandescent lamp socket 17 depends, the lamp 18 depending within the casing from said socket.

19 are arms depending vertically from the cap at opposite sides of the lamp and at their lower ends supporting a plate 20 equipped with a shallow cup 21 to contain water for the purpose of supplying the necessary moisture to the air within the incubator.

The cap is provided with a pair of handles 22 of the type shown or of any other suitable construction for convenience of manipulation. The cover is also provided with handles 23 for its convenient manipulation. The cover is provided with ventilation openings 24 to be closed entirely or partially by slide plates 25 having handles 26 projecting up through the openings 24, the cleats 27 for supporting the slide plates being of the usual and well known type which are not specific-

ally claimed and therefore need no detailed description or illustration. To render the incubator as a whole conveniently portable it is provided with handles 28 of the type common in sheet metal construction.

The incandescent lamp when a current of electricity is passing through it radiates sufficient heat to insure the hatching of the eggs and the light which is necessary to all life, it being found in practice that where both heat and light is radiated from a point within the incubator the chickens produced are more vigorous and healthy than chickens hatched under the influence of heat without light. In this connection it should be stated that the best results are obtained from the use of a red or ruby lamp and it will be further understood that the incubator will be provided with the usual thermometer so that the eggs may be kept at a predetermined temperature not only by admitting more or less air but also by varying the strength of the current by throwing more or less resistance in its path. As the use of a rheostat is common for varying the strength of the current and as a thermometer in incubators is old it was not deemed necessary to illustrate such elements.

It will be understood that this incubator is designed for use in hatcheries or where there is an incandescent lighting system and is therefore not intended or adapted for use in the country where such systems are not in use.

From the above description it will be apparent that I have produced an incubator possessing the features of advantage enumerated as desirable and I wish it to be understood that I reserve the right to make all changes properly falling within spirit and scope of the appended claims.

Having thus described the invention what I claim as new and desire to secure by Letters Patent, is:—

1. An incubator comprising a casing a circular cover for the same having a central opening provided with an upwardly projecting flange, a cap resting upon said flange and closing said opening and provided with a central hole and ventilation holes, an incandescent lamp within the incubator, and a socket carrying the same and depending through the hole in the cap.

2. An incubator, comprising a casing, a circular cover for the same having a central opening provided with an upwardly projecting flange, a cap resting on said flange and closing said opening and provided with a central hole and ventilation holes, an incandescent lamp within the incubator, a socket carrying the same and depending through the hole in the cap, and a water cup sup-

ported within the incubator above the bottom thereof.

3. An incubator, comprising a casing, a circular cover for the same having a central opening provided with an upwardly projecting flange, a cap resting on said flange and closing said opening and provided with a central hole and ventilation holes, an incandescent lamp within the incubator, a socket carrying the same and depending through the hole in the cap, and a water cup suspended from the cap below the lamp.

4. An incubator, comprising a casing, having a double insulated bottom and a wall doubled and insulated for nearly its full height and provided with perforations above said doubled insulated portion, a cover fitting upon the casing and provided with a depending flange fitting snugly within the casing and equipped with corresponding holes and provided also with a central opening and an upwardly projecting flange surrounding the same, a cap fitting upon said flange and closing said central opening, an incandescent lamp depending from said cap within the incubator, and a water cup suspended from the cap below the lamp.

5. An incubator, comprising a casing having a double insulated bottom and a wall doubled and insulated for nearly its full height and provided with perforations above said doubled insulated portion, a cover fitting upon the casing and provided with a depending flange fitting snugly within the casing and equipped with corresponding holes and provided also with a central opening and an upwardly projecting flange surrounding the same, a cap fitting upon said flange and closing said central opening, an incandescent lamp depending from said cap within the incubator, arms depending from said cap, a plate secured to the lower end of said arms, and a water cup supported on said plate.

6. An incubator, comprising a casing having a double insulated bottom and a wall doubled and insulated for nearly its full height and provided with perforations above said doubled insulated portion, a cover fitting upon said casing and provided with a depending flange fitting snugly within the casing and equipped with corresponding holes and provided also with a central opening and an upwardly projecting flange surrounding the same, and with slide-covered openings, a cap fitting upon said flange and closing said central opening, an incandescent lamp depending from said cap within the incubator, arms depending from said cap, a plate secured to the lower end of said arms, and a water cup supported on said plate.

7. An incubator, comprising a casing hav-

ing a doubled insulated bottom and a wall
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said doubled insulated portion, a cover fit-
5 ting upon said casing and provided with a
depending flange fitting snugly within the
casing and equipped with corresponding
holes and provided also with a central open-
ing and an upwardly projecting flange sur-
10 rounding the same, a cap fitting upon said
flange and closing said central opening, an
incandescent lamp depending from said cap

within the incubator, arms depending from
said cap, a plate secured to the lower end of
said arms, a water cup supported on said 15
plate, and a circular shelf supported within
the incubator.

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

GEORGE W. MOORE.

Witnesses:

MYRA MAREIN.

MABEL BRISCO.