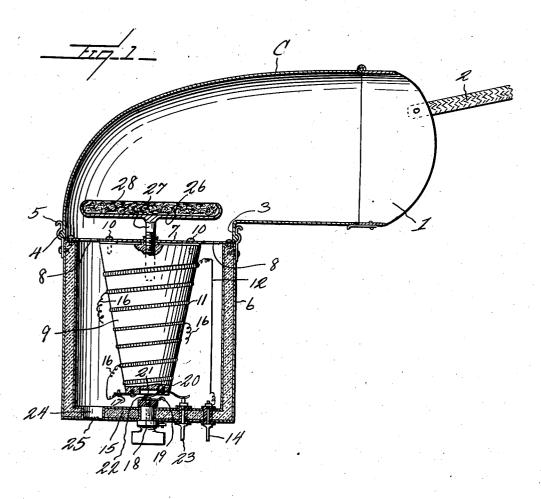
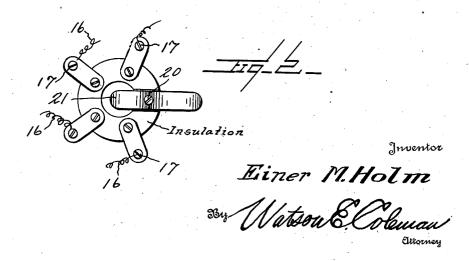
INHALER

Filed March 6, 1941





# UNITED STATES PATENT OFFICE

2,309,846

## INHALER

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Application March 6, 1941, Serial No. 382,082

1 Claim. (Cl. 128-192)

This invention relates to an inhaler and it is primarily an object of the invention to provide a device of this kind to be used in the treatment of colds and other ailments of the respiratory type.

It is also an object of the invention to provide a device of this kind having a cone-like member to be disposed over the mouth and nostrils of a person, together with means for heating the air as it is drawn into the cone-like member.

A still further object of the invention is to provide an inhaler wherein is provided means for medicating the air as it is drawn through the inhaler.

The invention consists in the details of con- 15 struction and in the combination and arrangement of the several parts of my improved inhaler whereby certain important advantages are attained, as will be hereinafter more fully set forth.

In order that my invention may be the better 20 understood, I will now proceed to describe the same with reference to the accompanying drawing, wherein:

Figure 1 is a longitudinal vertical sectional view taken through an inhaler constructed in ac- 25 cordance with an embodiment of my invention with the electric circuit comprised therein diagrammatically illustrated.

Figure 2 is a somewhat diagrammatic view in bottom plan of the heating unit as herein em- 30 bodied.

As disclosed in the accompanying drawing, C denotes a cone-like member or hood having one end open with said open end of such dimensions as to be effectively placed over the mouth and 35 nostrils of a person so that as the person breaths, air will be drawn through the member C. At the outer or induction portion, the member C has associated therewith a hinge section I and suitably secured to this section I are the extremities 40 of a head strap 2 or the like to facilitate the maintenance of the inhaler in working position. The smaller end portion of the member C is provided with a laterally disposed short neck 3, the outer marginal portion of which being provided 45 with a surrounding bead 4. This bead 4 has detachably engaged therewith the spring clips 5 carried by the upper open end of a cup-like casing 6. The walls of this casing 6 are formed from a suitable material non-conductive of elec- 50 tricity and disposed over the upper and open end of this casing 6 is a plate 7 provided therearound with the relatively large openings 8.

Depending from the central portion of the plate 7 is a core 9 of porcelain or other suitable 55

material. This core 9 as herein disclosed is in the form of a truncated cone with the smaller end downwardly disposed and its upper or larger end secured to the plate 7 by the screws 10 or otherwise, as may be preferred.

Spirally disposed around the core 9 is a conventional type of resisting coil 11 one end portion of which being in electrical connection through a conductor 12 with a contact plug 14 extending out through the bottom wall 15 of the casing 6. This resistance coil 11, at desired points therealong, is in electrical connection through the conductors 16 with the contact members 17 carried by the lower end of the core 9 and spaced circumferentially therearound.

Rotatably disposed through the bottom wall 15 of the casing 6 is a knob 18. The inner end of the knob 18 carries a contact arm 19 which upon requisite turning of the knob 18 may be brought into desired selective electrical engagement with one of the contact members 17. This contact arm 19 is in electrical connection with a contact 20 carried by the inner end of the knob 18 at the axial center thereof. In engagement with this contact member 20 is an end portion of a contact arm 21. This contact arm 21 has its central part secured, as at 22, to the lower end of the core 9 and the opposite end portion of the arm 21 is in contact with a second plug 23 also extending through the bottom wall 15 of the casing 6 at a point closely adjacent to the plug 14. These plugs 14 and 23 are to be engaged in the usual manner within an electric socket whereby said plugs may be coupled to a suitable source of electrical energy.

The bottom wall 15 of the casing 6 is provided with a suitably positioned and relatively large induction opening 24 over which is disposed a suitable filtering element 25. Positioned within the inner end of the member C and above the core 9 is a receptacle 26. This receptacle is of a diameter to be readily inserted into the member C through the neck 3 and when the casing 6 and the member C are connected. This receptacle 26 at its axial center is provided with a depending stem 27 which is disposed through the plate 7 and threaded into the upper end of the core 9 at the axial center thereof. As disclosed in the accompanying drawing, the receptacle 26 has placed therein an absorbent pad 28 adapted to be saturated with the medicament to be used in the treatment for a cold or kindred ailment.

It is believed to be apparent that as the air is drawn through the casing 6 it will be heated to a temperature determined by the heat created by

the coil 11 and which degree of heat is controlled or regulated by the knob 18.

From the foregoing description it is thought to be obvious that an inhaler constructed in accordance with my invention is particularly well adapted for use by reason of the convenience and facility with which it may be assembled and operated.

#### I claim:

An inhaler comprising a casing having one end 10 open, a plate disposed over the open end portion of the casing, means for securing the plate in position, said plate having openings, a member within the casing and carried by and depending from the plate, said member being of a material 15 non-conductive of electricity, a resistance coil carried by and encircling the member, contact plugs carried by a wall of the casing, one of said plugs being in electrical connection with the inner extremity of the resistance coil, contact 20

members carried by the inner end of the first member and arranged in an annular series, adjacent contact members being spaced apart, a contact arm secured to said inner end of the first member and in electrical engagement with the second contact plug, said arm extending inwardly across the inner end of the first member, a knob rotatably carried by the wall of the casing opposed to the inner end of the first member and substantially at the axial center of the annular series of contact members carried by the inner face of the first member, a contact arm carried by the knob for selective electrical connection with the annular series of contact members upon turning of the knob, the contact arm carried by the inner end of the first member being at all times in electrical contact with the contact arm carried by the knob, and a medicament holder carried by the plate and outwardly thereof.

EINER MARIUS HOLM.

# CERTIFICATE OF CORRECTION.

Patent No. 2,309,846.

February 2, 1943.

## EINER MARIUS HOLM.

It is hereby certified that error appears in the above numbered patent requiring correction as follows: In the grant, lines 1 and 13, and in the heading to the printed specification, name of inventor, for "Einar Marius Holm" read --Einer Marius Holm--; and that the said Letters Patent should be read with this correction therein that the same may conform to the record of the case in the Patent Office.

Signed and sealed this 9th day of March, A. D. 1943.

(Seal)

Henry Van Arsdale,
Acting Commissioner of Patents.