G. LEININGER.

VAPORIZER FOR DISINFECTANTS.

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930,977.

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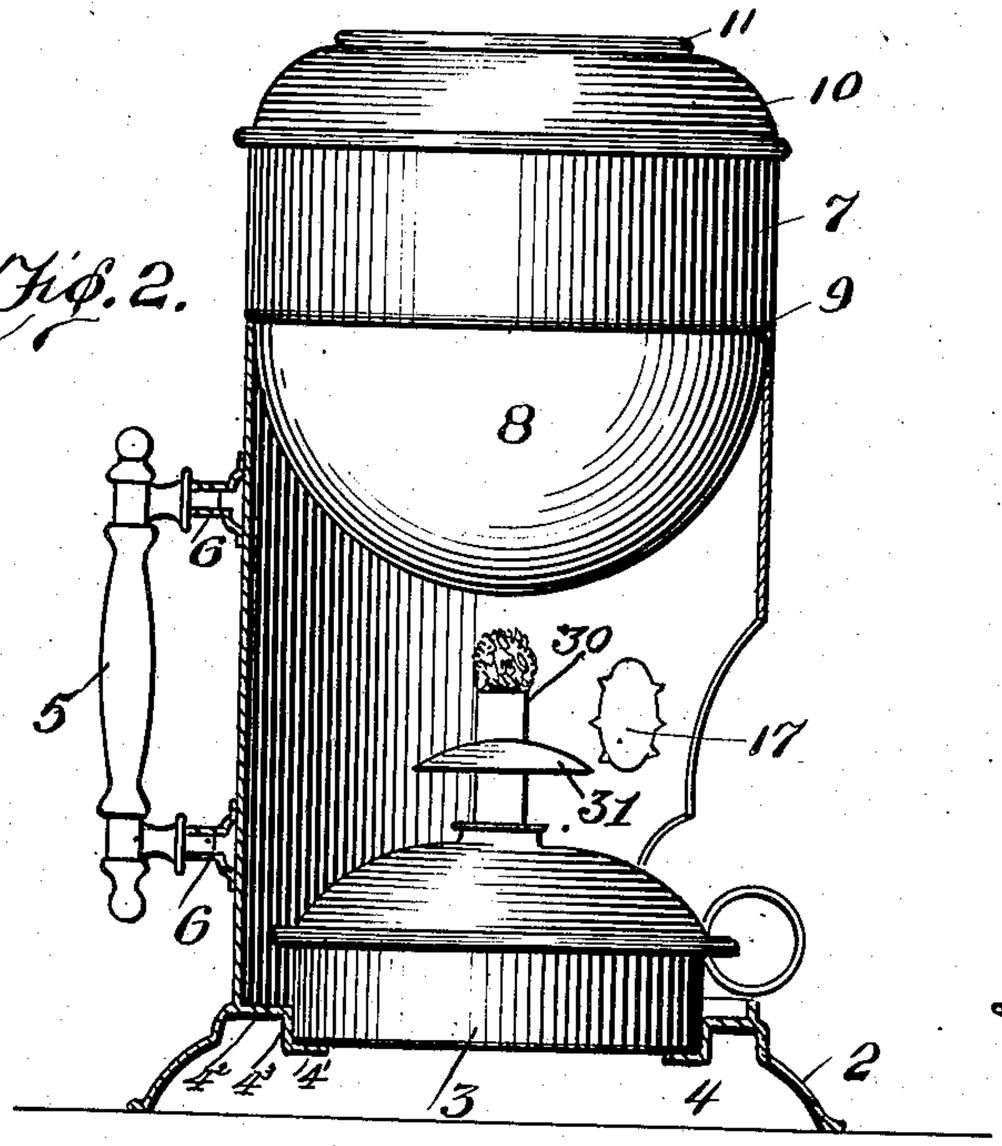
Fig. 2.



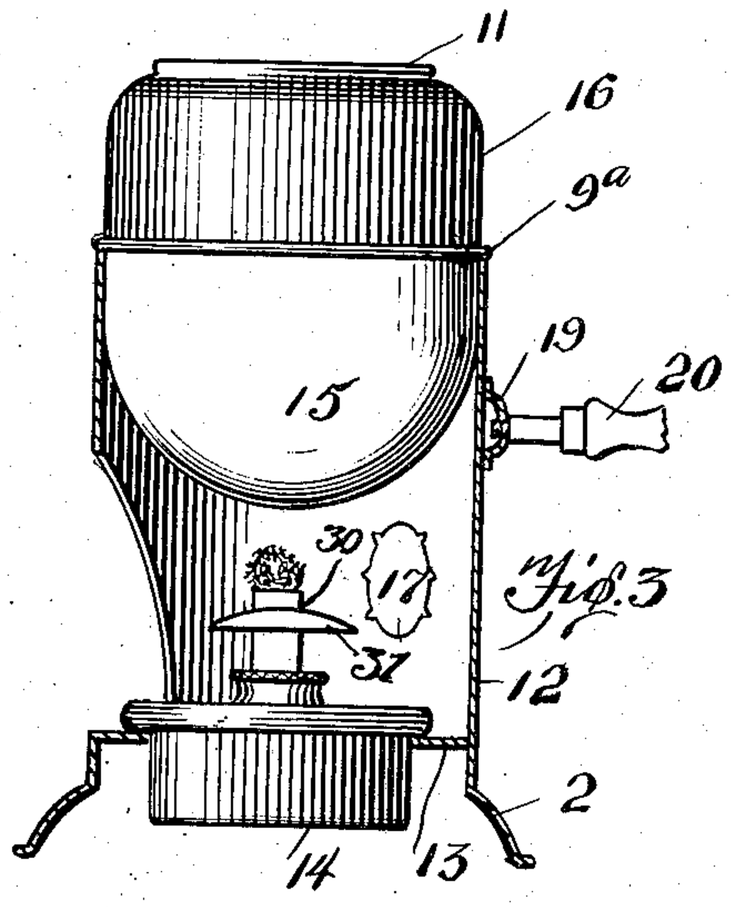


Fig. 3.

Fig. 1.

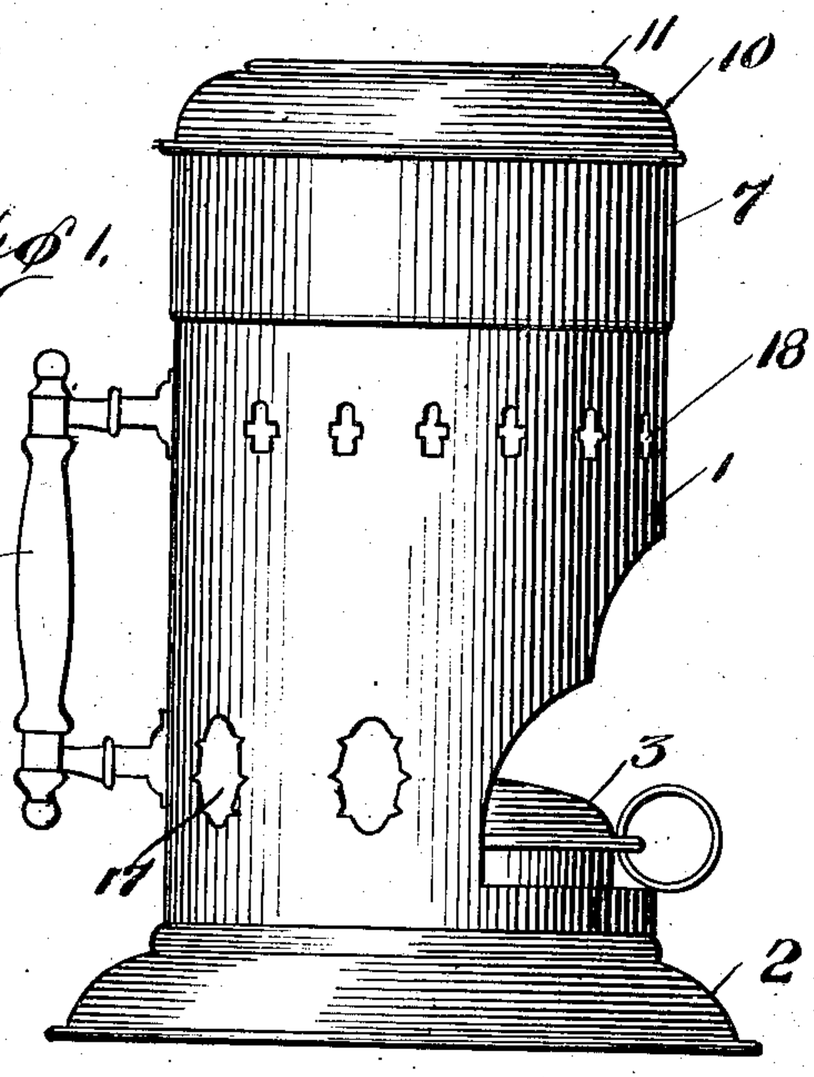
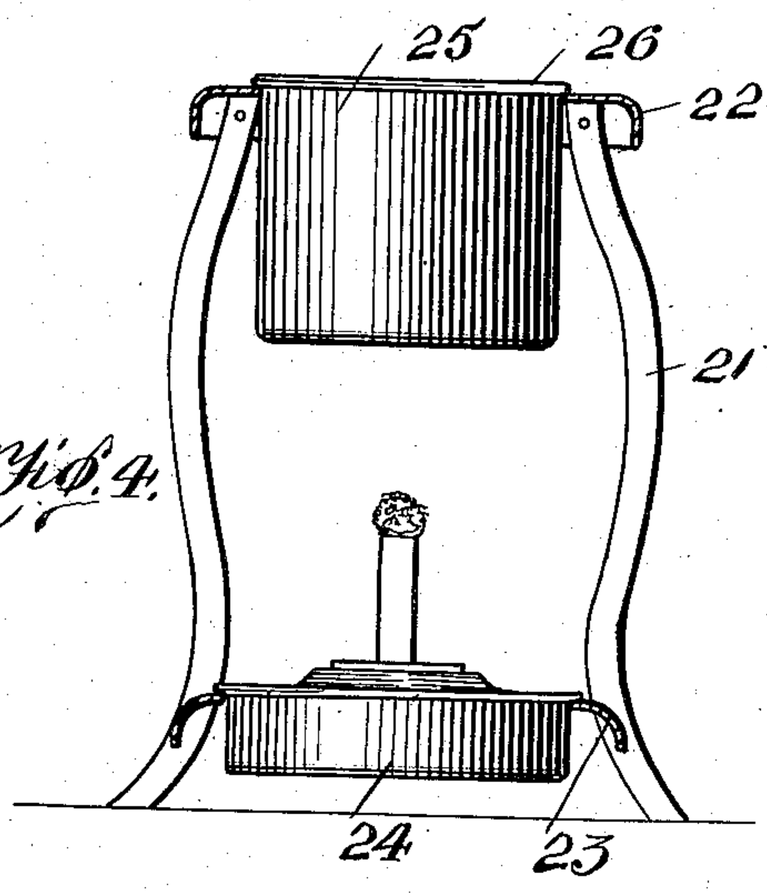


Fig. 4.



Witnesses

A. E. Wilson

E. E. Crooman.

Inventor

George Leininger,

By Mason, Fennick & Lawrence,

Attorneys.

UNITED STATES PATENT OFFICE.

GEORGE LEININGER, OF CHICAGO, ILLINOIS, ASSIGNOR, BY MESNE ASSIGNMENTS, TO INTERNATIONAL CHEMICAL COMPANY, OF CHICAGO, ILLINOIS, A CORPORATION OF ILLINOIS.

VAPORIZER FOR DISINFECTANTS.

No. 930,977. Specification of Letters Patent. Patented Aug. 10, 1909.

Application filed August 22, 1905. Serial No. 275,304.

To all whom it may concern:

Be it known that I, GEORGE LEININGER, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Vaporizers for Disinfectants; 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 appertains to make and use the same.

This invention relates to improvements in generators, and particularly to formaldehyde generators.

The object of the invention is the provision of means for facilitating the generation of gas from solidified formaldehyde.

With this and other objects in view, the invention consists of certain other novel constructions, combinations, and arrangements of parts, as will be hereinafter fully described, illustrated in the accompanying drawings, and more particularly pointed out in the claim hereto appended.

In the drawings: Figure 1 is a view in side elevation of a generator constructed in accordance with the present invention. Fig. 2 is a view similar to Fig. 1, showing the stand in vertical, central section. Fig. 3 is a view of another embodiment of my invention shown partly in side elevation and section. Fig. 4 is a vertical, central sectional view of the stand and showing the receptacle and lamp in side elevation, of another embodiment of my invention.

Referring to the drawings by numerals, 1 designates preferably a cylindrical stand, constituting the body of the generator. The cylindrical stand is provided with a base 2 and with an opening at its front, which permits of the positioning of a lamp 3 within said stand. The lamp 3, constituting heating means, is supported within the stand upon a depending, annular flange 4, substantially L-shaped in cross section. The burner 30 of the lamp is provided with a dished deflector 31, which prevents the soot which accumulates on the semi-spherical bottom of the generator from dropping into the filling opening of the lamp. A handle 5 is secured upon the side of the stand 1. The handle 5 comprises a vertical grip carried by hollow ears 6, 6, which are secured to the side of the stand 1.

The receptacle of the generator comprises a cylindrical body 7 and a semi-spherical bottom 8. The upper edge of the bottom 8 is of less diameter than the cylindrical body, thereby forming a shoulder or bead 9. The upper edge of the body 1 engages the annular shoulder of the receptacle and produces a structure which, when the receptacle and stand are assembled, resembles an integral structure, as the thickness of the wall of the stand is of substantially the same as the width of the shoulder. The cylindrical body 7 of the receptacle converges at 10 and terminates in a beaded edge 11. It will be obvious that the receptacle is provided with a reduced, upper portion, which produces an aperture of less diameter than the cylindrical body portion 7.

In the embodiment depicted in Fig. 3, the stand 12 is constructed similarly to the stand 1 with the exception that the base 2 is provided with a horizontal flange 13, constituting a support for a lamp 14. In the embodiment depicted in Fig. 2, the flange 4 depends from the stand which is not true of the flange 13.

As shown in Fig. 2 the bottom of the stand 1 is open and is provided with an angular flange having an inner horizontal portion 4^1 and an outer horizontal portion 4^2, and also having an intermediate vertical portion 4^3, whereby when the lamp is inserted through the enlarged opening in the side of the stand the horizontal portion 4^2 permits of a space being provided on the inner surface of the stand so that the side and bottom wall of the lamp will contact respectively with the vertical portion 4^3 and horizontal portion 4^1 of the angular flange 4. The receptacle in this embodiment is of similar structure to the receptacle depicted in Fig. 2, except that a portion of the side of the receptacle is pressed outwardly for forming an integral, annular shoulder or bead 9^a, which normally engages the upper edge of the stand 12 for supporting the receptacle. It is to be noted that this annular shoulder is formed intermediate the semi-spherical bottom 15 and the cylindrical body 16. Each of the stands 1 and 12 is provided

with ventilating openings 17, which are formed near the bottom of the stand and contiguous to the lamp. Comparatively small openings 18 are formed in the stands near their upper edge, or end.

Owing to the semi-spherical structure of the bottom of the receptacle, the flame from the lamp, or any suitable heating means, is permitted to play over a comparatively large area of the bottom of the receptacle, as compared with a receptacle provided with a flat bottom. The heat from the lamp, owing to the structure of the bottom of the receptacle is permitted to pass up between the inner wall of the stand and the outer wall of the bottom of the receptacle near to the annular shoulder, and thence it returns downward and passes out of the openings 18. That is to say, there will be some of the heat passed between the bottom of the receptacle and the stand and above the openings 18, which eventually is discharged through the openings or apertures. The stand 12 is provided with an apertured ear 19, upon which is removably secured a straight handle 20.

In Fig. 4, I have shown a stand which comprises angular legs 21, which are preferably formed of sheet metal, the legs being connected at their upper end by means of a ring 22, and near their lower end by a similarly constructed ring 23. Each of these rings is provided with a horizontal portion which is integral with a vertical, depending portion. A lamp 24 is removably positioned upon the ring 23. Supported upon the ring 22 is a receptacle 25, which is provided with an annular shoulder or bead 26. The shoulder 26 engages the ring 22.

What I claim is:

A structure of the character described comprising an elevated cylindrical stand with an enlarged opening in the side wall and provided with an open bottom having an angular surrounding flange, said flange providing an inner annular horizontal portion and an outer annular horizontal portion, and also an intermediate vertical portion, the outer horizontal portion of the flange adapted to permit of a lamp being inserted through said enlarged opening so that the side portion and bottom of the lamp will contact respectively with the vertical and inner horizontal portion of said flange, a generator removably connected to the top of the stand and having a hemi-spherical bottom projecting downwardly into the same, said stand having a series of inlet openings arranged around the lamp, and also having a series of outlet openings arranged around the bottom of the generator, and a dished deflector on said lamp adapted to receive the accumulation of soot from the hemi-spherical bottom of the generator.

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

GEORGE LEININGER.

Witnesses:
C. J. BUSLEE,
L. J. LEININGER.