L. B. ROBB.
DRY CLOSET.

No. 384,932. Patented June 19, 1888. FIG.3. FIG.1. B FIG.2. J FIG.4. 1  $\mathbf{L}'$  $\boldsymbol{L}$ S. Stabutes Just.

## UNITED STATES PATENT OFFICE.

LUCIAN B. ROBB, OF CINCINNATI, OHIO.

## DRY CLOSET.

SPECIFICATION forming part of Letters Patent No. 384,932, dated June 19, 1888.

Application filed May 7, 1888. Serial No. 273,000. (No model.)

To all whom it may concern:

Be it known that I, LUCIAN B. ROBB, a citizen of the United States of America, residing at Cincinnati, in the county of Hamilton and State of Ohio, have invented certain new and useful Improvements in Dry Closets, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to the peculiar construction of cremating-closet seen in Letters Patent No. 376,550, granted to me January 17, 1888; and the present improvement consists in providing the deposit-chamber with a flue or flues whose discharging end communicates with the furnace and near the front of the same, in order that all offensive gases, vapors, &c., generated within said chamber may be discharged into said furnace, so as to be consumed when the closet is fired up, as hereinafter more fully described.

In the annexed drawings, Figure 1 is a vertical section of my improved closet, said section being taken at the line 5 5 of Fig. 3 and looking toward the diving flue F. Fig. 2 is a similar section taken at the line 6 6 and looking toward the furnace B. Fig. 3 is another vertical section, said section being taken at the line 7 7 of Fig. 2 and looking toward the rear of the closet. Fig. 4 is a horizontal section taken at the line 8 8 of Fig. 1.

A represents the outer walls of the structure, and B is the furnace, which furnace is preferably covered with an arched casting, C, having horizontal flanges c c', resting upon the side walls, D D', of said furnace. Furthermore, this casting has in front a horizontal extension or plate, E, beneath which openings f f' are located, which openings communicate both with the furnace B and the diving-flues F F', said flues being carried up almost to the top of the deposit-chamber G.

H is a fire-door at the front of the furnace, and I is a chimney at the rear of the closet.

J is a soil-pipe for conducting exereta, sew-45 age, and other waste substances into the chamber G, to which latter access is afforded by the door K.

L L' are pits formed between the side walls, D D', of the furnace and the outer walls of the 50 structure, said pits being filled with a non-

combustible absorbent-bed, M,(seen in Fig. 2,) the level of said beds being indicated by the dotted lines  $m\,m'$  in Fig. 3. This closet is managed in practically the same manner as the apparatus seen in my patent previously referred 55 to—that is to say, the doors H K are normally closed and the waste substances are dropped down the soil-pipe J and gradually accumulate within the deposit-chamber G, the gravel-beds M absorbing the fluids and thereby separating 60 the latter from the more solid portions of the sewage.

When the deposit-chamber is filled about as high as the dotted line g, (seen in Figs. 1, 2, and 3,) the lower door, H, is opened and a fire is 65 then started in the furnace B for the double purpose of evaporating the fluids from the absorbent-beds and initiating the drying of the solid contents of said chamber. Previous to starting this fire the privy seats or other in- 70 lets attached to the soil-pipe J must be securely closed, in order that all vapors generated within the closet will escape only by the way of the chimney I. After thus evaporating the fluids the door K is opened and a fire 75 is then started at the bottom of the solid contents of the chamber, which fire is maintained until these contents have been reduced to ashes or charcoal. During this burning or charring of the solid sewage the most offensive 80 gases would escape from the closet were it not for the provision of one or more diving-flues, F or F', which flues may in some cases be on the outside of the structure. These flues draw off the foul vapors from the upper part of the 85 chamber, as indicated by the arrows in Figs. 1 and 3, the gases, &c., being conducted down said flues to the openings f f', and thence through the latter into the furnace B. Here the gases are brought into intimate contact 90 with the mass of incandescent fuel in the furnace and are at once completely consumed, the vapors escaping from the chimney or other exit I being free from any offensive or noxious odors.

It will thus be apparent that the present 95 closet is automatically ventilated, and on this account it can be burned out in the summer season without creating a nuisance in the neighborhood.

In the drawings the exact proportions of the 100

different parts of the closet have not been adhered to, the furnace being considerably longer than is illustrated either in Figs. 1 or 4. I claim as my invention—

1. The combination, in a cremating-closet, of a deposit chamber having means of leading sewage, &c., into the same, a furnace for drying the sewage, an exit for said furnace, and a diving-flue communicating with said chamto ber and discharging into the furnace at or near the front of the same, for the purpose described.

2. The combination, in a cremating-closet, of

furnace B, diving flues F F', openings ff', deposit-chamber G, doors H K, exit I, inlet J, and pits L L', which latter are charged with a 15 non-combustible absorbent-bed, as M, for the purpose described.

In testimony whereof I affix my signature in

presence of two witnesses.

LUCIAN B. ROBB.

Witnesses:

JAMES H. LAYMAN, SAML. S. CARPENTÉR.