

(No Model.)

A. D. LEWIS & C. S. IRISH.
BUNG AND VENT.

No. 421,732.

Patented Feb. 18, 1890.

Fig. 1

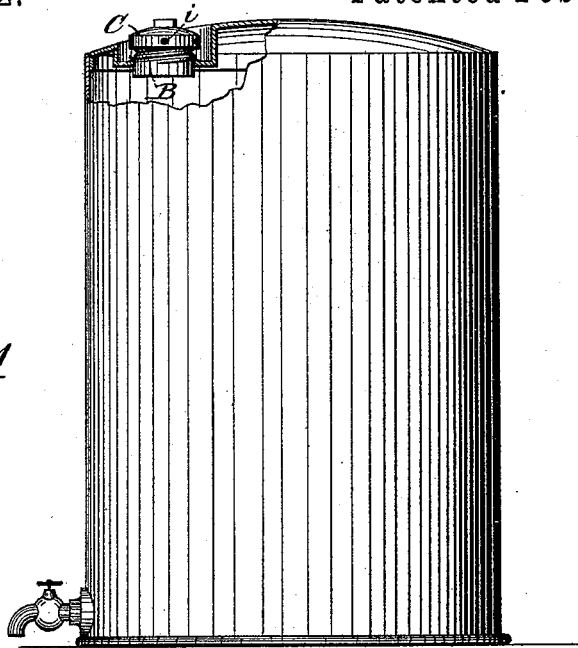


Fig. 2

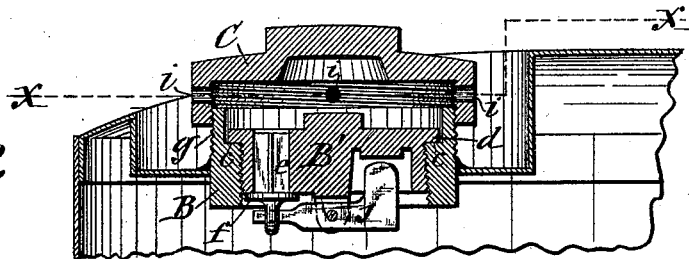
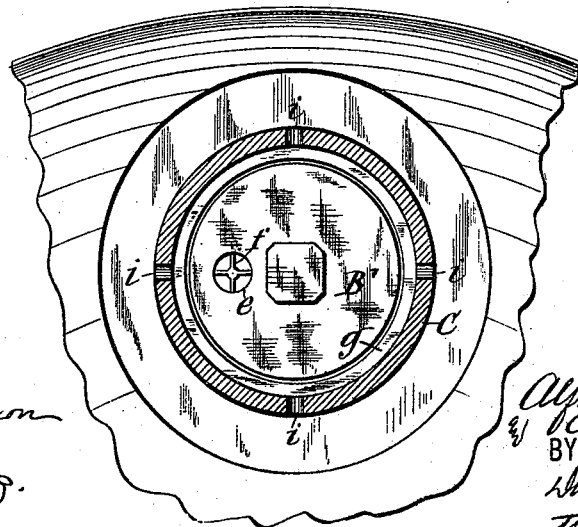


Fig. 3



WITNESSES:

C. L. Bendixon
J. J. Laasy.

INVENTORS:

Alfred D. Lewis
& Charles S. Irish
BY
Wm. Laasy & Co.
THEIR ATTORNEYS

UNITED STATES PATENT OFFICE.

ALFRED D. LEWIS AND CHARLES S. IRISH, OF JORDAN, NEW YORK.

BUNG AND VENT.

SPECIFICATION forming part of Letters Patent No. 421,732, dated February 18, 1890.

Application filed December 6, 1889. Serial No. 332,752. (No model.)

To all whom it may concern:

Be it known that we, ALFRED D. LEWIS and CHARLES S. IRISH, of Jordan, in the county of Onondaga, in the State of New York, have invented new and useful Improvements in Bungs and Vents, of which the following, taken in connection with the accompanying drawings, is a full, clear, and exact description.

This invention consists in a novel construction and combination of a bung provided with an automatically opening or closing vent, which is normally closed and opens to admit air to the interior of the tank or barrel while liquid is being drawn therefrom, and a cap over said bung is provided with ports in such positions as to be covered when the cap is tightened on its seat, and then said cap serves to cover the bung and guard against its being disturbed and against leakage during transportation of the tank or barrel, all as hereinafter more fully described, and specifically set forth in the claims.

In the annexed drawings, Figure 1 is a side elevation of a tank provided with our improved bung and vent. Fig. 2 is an enlarged vertical transverse section of our invention; and Fig. 3 is a horizontal transverse section on line *x x*, Fig. 2.

Similar letters of reference indicate corresponding parts.

B represents a metal collar, which is firmly secured to the bung-orifice of the tank or barrel. This collar is formed with a circumferential ledge *c* on its interior and is preferably screw-threaded internally below said ledge. Said collar is also formed with an upward extension *g* above the ledge *c*, which extension is screw-threaded and has connected to it the screw-cap C, which is provided with ports *i i* in its sides, or in such positions as to be covered by the extension *g* when the cap is screwed down tightly.

B' denotes the bung, which is preferably screw-threaded externally and screwed in the screw-threaded lower portion of the collar B, and is formed with a collar *d*, which is brought to bear on the ledge *c* when the bung is screwed or forced in tight. The bung has a ventiduct *e* extending vertically through it,

and on the inner end of said duct is seated the valve *f*, which opens inward, or toward the interior of the tank or barrel, and is held normally in its closed position by a lever *j*, which is pivoted to the under side of the bung and connected at one end to the valve and weighted at the opposite end to over-balance the valve.

During transportation of the tank or barrel the screw-cap C is to be screwed down tightly, and when the tank or barrel is to be tapped the cap C is to be partly unscrewed to allow air to enter through the ports *i i*.

In drawing liquid from the tank or barrel the vacuum produced therein causes the external air to force open the valve *f* and enter the tank or barrel, and as soon as the drawing of the liquid from the latter is stopped the weighted lever *j* closes the valve, and thus prevents evaporation of the liquid contained in the tank or barrel, and also obviates the danger of explosion of the gases in the same by bringing a lighted lamp or candle in proximity thereto.

What we claim as our invention is—

1. In combination with the collar B, the bung B', provided with the ventiduct *e*, the inwardly-opening and normally-closed valve *f*, and the cap C, provided with the ports *i i*, as set forth.

2. The combination of the collar B, screw-threaded, the bung B', seated in said collar and provided with the ventiduct *e*, the valve *f*, seated on the inner end of said duct, the lever *j*, pivoted to the under side of the bung and connected at one end to the valve and weighted at the opposite end, and the screw-cap C, connected to the aforesaid collar and provided with the ports *i i*, substantially as described and shown.

3. The combination of the collar B, formed with a ledge *c* in its interior, screw-threaded internally below said ledge and having the upward extension *g* screw-threaded externally, the bung B', formed with the collar *d* and screw-threaded externally and connected thereby to the interior of the collar B, and provided with the ventiduct *e*, the valve *f*, seated on the inner end of said duct, the

lever *j*, pivoted to the under side of the bung
and connected at one end to the valve and
weighted at the opposite end, and the screw-
cap C, connected to the exterior of the afore-
5 said collar and provided with ports *i i*, sub-
stantially as described and shown.

In testimony whereof we have hereunto

signed our names this 4th day of December,
1889.

ALFRED D. LEWIS. [L. S.]
CHARLES S. IRISH. [L. S.]

Witnesses:

R. E. GREENE,
EMMETT SMITH.