No. 661,836.

Patented Nov. 13, 1900.

F. A. WILMOT.

CAPSULE BOTTLE TOP.

(Application filed Apr. 12, 1900.)

(No Model.)

Fig. 1

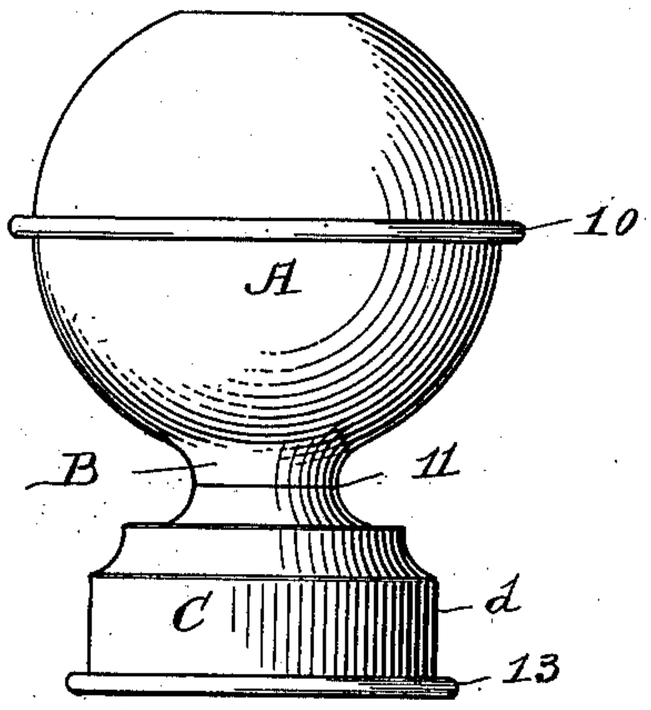
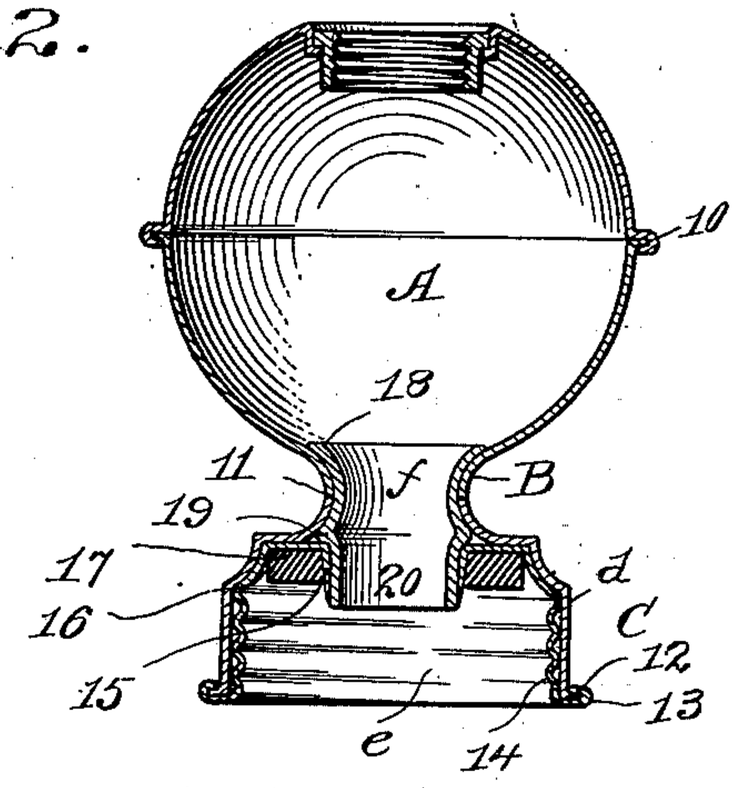


Fig. 2.



WITNESSES

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CAPSULE-BOTTLE TOP.

SPECIFICATION forming part of Letters Patent No. 661,836, dated November 13, 1900.

Application filed April 12, 1900. Serial No. 12,598. (No model.)

To all whom it may concern:

Be it known that I, FRANK A. WILMOT, a citizen of the United States, residing at Bridgeport, county of Fairfield, State of Connecticut, have invented a new and useful Capsule-Bottle Top, of which the following is a specification.

My invention relates to a class of bottles which I term for convenience "capsule-bottles"—that is, bottles used for aerating beverages by means of "sparklets" or capsules charged with carbon dioxid or other gas; and my invention has for its object to provide a bottle-top—that is, the metallic cover which is rigidly secured to the neck of the bottle and is provided with means for holding the capsule securely while the cap is perforated and the gas let out and which also holds the gas so that it cannot escape and the water or other beverage contained in the bottle must become charged therewith—which shall be made entirely from sheet metal and the parts of which shall be made wholly by presswork and by simple and inexpensive operations and shall be so constructed that they may be assembled and secured together in a manner that will secure durability and a degree of strength far in excess of the greatest possible requirements and at a minimum expense.

With these ends in view I have devised the novel capsule-bottle top which I will now describe, referring to the accompanying drawings, forming part of this specification, and using reference characters to designate the several parts.

Figure 1 is an elevation of my novel bottle-top detached, and Fig. 2 is a central vertical section thereof.

A denotes the gas-chamber, which is usually approximately spherical in shape and is made of two pieces of sheet metal secured together by a joint 10. Below the gas-chamber is a neck B, and below the neck is a base C, which is adapted for attachment, ordinarily by screw-threads, to a bottle-neck. (Not shown in the drawings.) My invention lies in the construction of the base and in the attachment of the gas-chamber to the base at the neck. The metallic parts below the gas-chamber are three in number—viz., the outer shell *d* of the base, the inner shell *e* of the base, and the locking-tube *f*. The upper edge of shell *d* abuts against the lower edge of the gas-chamber at the neck, the joint being indicated by 11. At the lower edge of shell *d* is a flange 12. Inner shell *e* is curved about flange 12, forming a bead 13 at the lower end of the base. The inner shell *e* is corrugated to form a screw-thread 14, which is adapted to engage a corresponding screw-thread (not shown) on the bottle-neck. It will of course be understood that the special contour—*i. e.*, the design—of either the gas-chamber, the neck, or the base is not of the essence of my invention, but may be varied to any extent without departing from the principle of my invention. The inner shell in practice follows the contour of the outer shell, excepting, of course, that the inner shell is threaded and is provided at its upper end with a downwardly-turned flange 15, whereby a pocket 16 is formed to receive a gasket or other packing 17. The locking-tube *f* is shown as extending through the neck and upward into the gas-chamber and downward parallel with flange 15. The upper end of the locking-tube is upset—*i. e.*, flared outward above joint 11, as at 18—so as to form a tight joint with the wall of the gas-chamber, and is again upset or flared outward below joint 11, as at 19, so as to form a tight joint with the upper end of the base. The neck is preferably a concave curve, as shown in the drawings, and the locking-tube between upset portions 18 and 19 is caused to conform closely to the curvature of the neck, so as to make a tight joint between the parts. Below upset portion 19 of the tube is a straight portion 20, which lies closely in engagement with downwardly-turned flange 15 of the inner shell. After the parts are assembled the completed bottle-top is usually immersed in molten tin and is thus tinned over both internally and externally, which prevents oxidation.

Having thus described my invention, I claim—

1. A bottle-top of the character described comprising a gas-chamber and a base, said base consisting of inner and outer shells and

the base and gas-chamber being secured together by a locking-tube which is upset above and below their point of intersection.

2. A bottle-top of the character described comprising a gas-chamber and a base, said base consisting of an outer shell having a flange 12 and an inner shell whose lower end is curved about said flange whereby a bead 13 is formed, the base and gas-chamber being secured together by a locking-tube which is upset above and below their point of intersection.

3. A bottle-top of the character described comprising a gas-chamber and a base, said base consisting of an outer shell having a flange 12 and an inner shell whose lower end is curved about said flange whereby a bead 13 is formed and whose upper end is provided with a flange 15, the base and gas-chamber being secured together by a locking-tube which is upset above and below their point of intersection and lies in contact with flange 15.

4. A bottle-top of the character described comprising a gas-chamber and a base, said base consisting of an outer shell and an inner shell secured together at their lower ends by a bead, the upper end of said inner shell having a downwardly-turned flange whereby a pocket 16 is formed and the base and gas-chamber being secured together by a locking-tube which is upset above and below their point of intersection and whose lower end lies in contact with the flange upon the inner tube.

5. A bottle-top of the character described comprising a gas-chamber, a neck and a base, said base consisting of inner and outer shells and said neck consisting of the abutting ends of the gas-chamber and the outer shell and a locking-tube lying within said abutting ends and upset both above and below their point of intersection.

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

FRANK A. WILMOT.

Witnesses:
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S. W. ATHERTON.