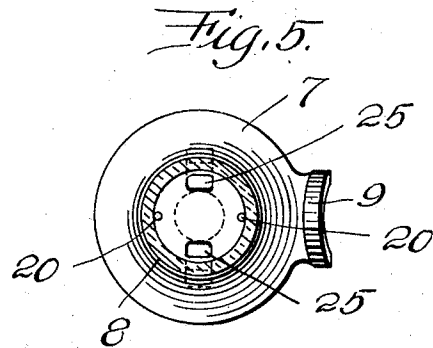
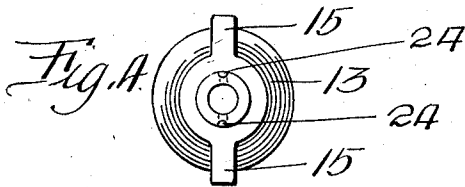
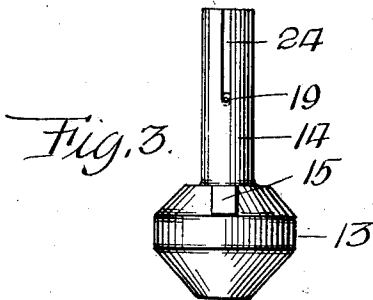
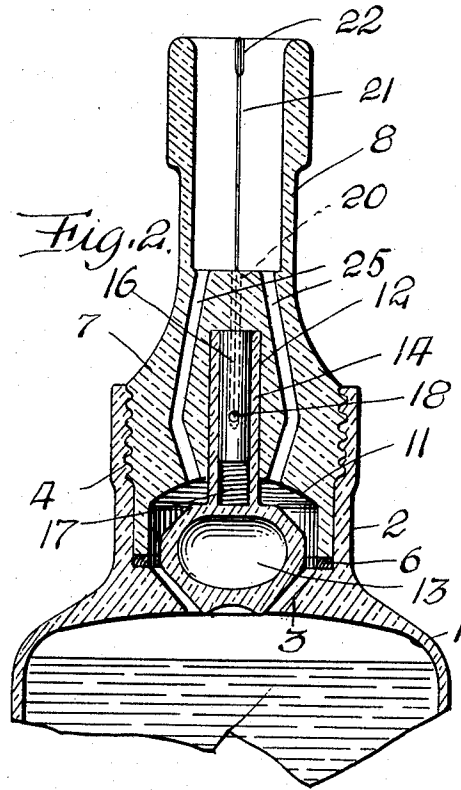
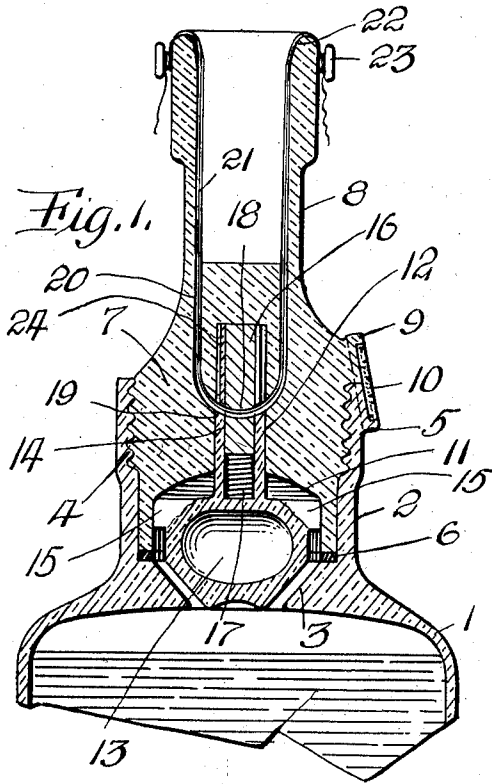


V. ZSUZSITZ.
CLOSURE FOR BOTTLES.
APPLICATION FILED FEB. 1, 1912.

1,038,260.

Patented Sept. 10, 1912.



WITNESSES:

Samuel Payne
J. P. Hoffman

INVENTOR.
V. Zsuzsitz
BY *H. C. [Signature]*
ATTORNEY

UNITED STATES PATENT OFFICE.

VINZENZ ZSUZSITZ, OF AURORA, ILLINOIS.

CLOSURE FOR BOTTLES.

1,038,260.

Specification of Letters Patent.

Patented Sept. 10, 1912.

Application filed February 1, 1912. Serial No. 674,702.

To all whom it may concern:

Be it known that I, VINZENZ ZSUZSITZ, a subject of the Emperor of Austria-Hungary, residing at Aurora, in the county of Kane and State of Illinois, have invented certain new and useful Improvements in Closures for Bottles, of which the following is a specification, reference being had therein to the accompanying drawing.

This invention relates to a closure for bottles, and the primary object of my invention is to provide a bottle or other receptacle with a closure having a novel valvular member that controls the passage of a liquid through said closure.

A further object of this invention is to accomplish the above result by a mechanical construction that is durable and highly efficient for the purposes for which it is intended.

With the above and other objects in view the invention resides in the novel construction, combination and arrangement of parts to be hereinafter specifically described and then claimed.

Reference will now be had to the drawing, wherein:—

Figure 1 is a vertical sectional view of a closure in accordance with this invention. Fig. 2 is a transverse sectional view of the same. Fig. 3 is a side elevation of a detached valvular member. Fig. 4 is a plan of the same, and Fig. 5 is a horizontal sectional view of the closure.

The reference numeral 1 denotes a portion of a bottle or receptacle having a neck 2 and an annular valve seat 3 at the base of said neck. The mouth of the neck 2 has the walls thereof interiorly screw threaded, as at 4 and provided with a semicircular seal boss 5.

6 denotes a gasket arranged upon the valve seat 3 within the neck 2 and engaging said gasket is the inner end of a closure body 7 that is screwed into the neck. The closure body has an auxiliary neck 8 and at the junction of said neck and said body there is a semicircular seal boss 9 which together with the boss 5 receives a seal 10. The closure body 7 can not be removed from the neck without detection, as the seal 10 is immediately broken when an attempt is made to unscrew the closure. Sealing wax or a similar material can be used as a seal.

The inner end of the closure body 7 has

a recess 11 and a longitudinal bore 12. Arranged within the recess 11 is a shiftable hollow valvular member 13 adapted to engage the seat 3. The member 13 has an integral tubular stem 14 extending into the bore 12 and oppositely disposed guide lugs 15 that limit the opening movement of the valvular member 13.

Within the tubular stem 14 there is plug 16 engaging the end wall of the bore 12. The stem 14 slides within the bore 12 and upon the plug 16, the latter is permanently positioned against the closed end of the bore 12. Interposed between the plug 16 and the valvular member 13 is a coiled compression spring 17 that retains the valvular member 13 upon the seat 3 when said member is not held in an elevated position. The plug 16 has a transverse opening 18 registering with openings 19 in the oppositely disposed walls of the tubular stem 14. The openings 19 are adapted to register with oppositely disposed openings 20 that have the outer ends thereof terminating in the auxiliary neck 8. Threaded in the openings 18, 19 and 20 is a thread or cord 21 that has the outer ends thereof arranged in grooves 22 at the mouth of the auxiliary neck 8, the ends of said thread being wound around the shanks of buttons 23 carried by the outer side of the auxiliary neck 8.

The tubular stem 14 has longitudinal grooves 24 extending from the openings 19 to the end of said stem, these grooves accommodating the thread 21 when the tubular stem 14 is lowered by the compression spring 17 after the thread 21 has been released.

The closure body 7 has oppositely disposed ports 25 and it is these ports that permit liquid passing through the closure body when the valvular member 13 is open.

As shown in Figs. 1 and 2 the valvular member 13 is open and consequently liquid can be poured into or out of the bottle. By untying or releasing the ends of the thread 21, the compression spring can seat the valvular member and prevent liquid from being poured from the bottle or poured into the body of the bottle.

The closure can be made of a vitreous material similar to the bottle 1.

What I claim is:—

A closure for bottles comprising the combination for the bottle having a neck formed with an annular valve seat, a clo-

sure body secured to the neck and having its inner end provided with a recess, and further having a longitudinal bore closed at its upper end and opening at its lower end
5 into said recess, an auxiliary neck integral with said closure body, said body provided with oppositely disposed openings for establishing communication between said recess and said auxiliary neck and further
10 having openings communicating with said bore, a valvular member arranged in said recess and capable of engaging said seat, a tubular stem projecting from said valve and shiftably mounted in said bore and pro-
15 vided with ports adapted to communicate

with said openings which communicate with the bore. a plug normally engaging the closed end of the bore and extending in said stem, a spring interposed between said plug and said valve, and a flexible member ex- 20 tending through said openings, ports and plug constituting means for elevating said valve against the action of said spring.

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

VINZENZ ZSUZSITZ.

Witnesses:

OTTO,

ULMER KLEIN.

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."
