No. 738,230. PATENTED SEPT. 8, 1903.

C. B. OVERBAUGH.

CLOSURE FOR BOTTLES OR THE LIKE.

APPLICATION FILED JUNE 16, 1903.

NO MODEL.

Fig. 4.

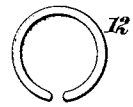


Fig. 1.

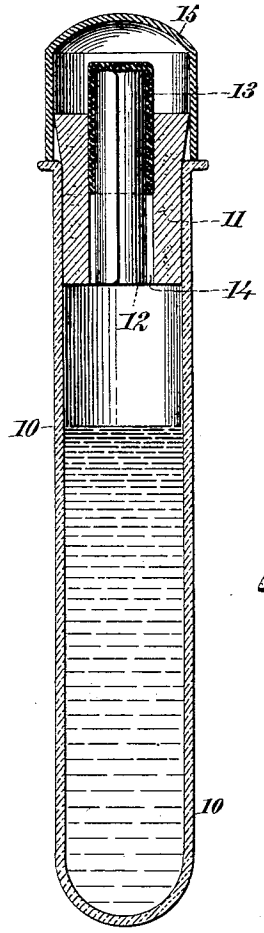


Fig. 2.

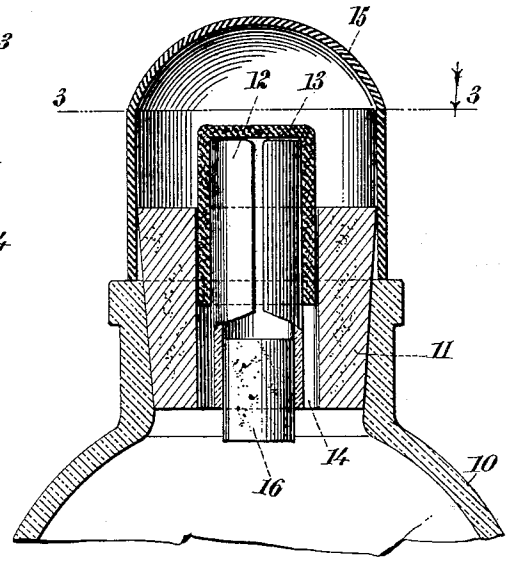
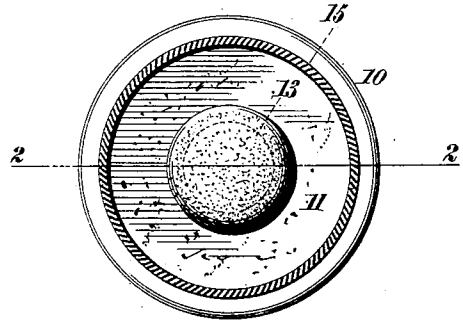


Fig. 3.



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No. 738,230. Patented September 8, 1903.

UNITED STATES PATENT OFFICE.

CHARLES B. OVERBAUGH, OF NEW YORK, N. Y.

CLOSURE FOR BOTTLES OR THE LIKE.

SPECIFICATION forming part of Letters Patent No. 738,230, dated September 8, 1903.

Application filed June 16, 1903. Serial No. 161,647. (No model.)

To all whom it may concern:

Be it known that I, CHARLES B. OVERBAUGH, a citizen of the United States, and a resident of New York, in the county of New York and State of New York, have invented certain new and useful Improvements in Closures for Bottles or the Like, of which the following is a specification.

The invention relates to improvements in closures for bottles and the like; and it consists in the novel features hereinafter described, and particularly pointed out in the claims.

My invention is not limited to the special nature of the liquid to be contained within the bottle employing the closure; but in this application I present the invention in connection with a bottle for holding mucilage, and the purpose of the invention is to afford a suitable closure for the mouth of a bottle containing mucilage and which closure is of a nature to at the proper time permit of the escape of the mucilage in regulated quantities through the closure, the latter affording means for spreading the mucilage upon the surface of a piece of paper or other substance without the employment of a brush.

In accordance with my invention in its preferred form I provide a stopper having a central vertical aperture through it and within this aperture place a tube whose upper portion is covered with felt or other suitable substance, the mucilage being enabled to pass through this tube and escape through the felt covering on the end thereof and the said felt being projected beyond the top of the stopper, so that it may be used for spreading the mucilage upon a sheet of paper or other material. The stopper will closely fit the mouth of the bottle, and when the bottle is not in use the upper end of the stopper will receive a closely-fitting cap.

The invention will be fully understood from the detailed description hereinafter presented, reference being had to the accompanying drawings, in which—

Figure 1 is a central vertical section through a bottle equipped with a closure constructed in accordance with and embodying my invention. Fig. 2 is a like section of a slightly-modified form of bottle equipped with a closure embodying my invention. Fig. 3 is a sectional view of same on the dotted line 3 3 of Fig. 2 and indicates by the dotted line 2 2 the section on which Fig. 2 is taken, and Fig. 4 is a detached top view of the inner tube applied within the stopper.

In the drawings, 10 designates the bottle, which, as illustrated, may be of any usual or suitable form or construction, and within the mouth of the bottle 10 is applied the closure, comprising the stopper 11, the inner tube 12, and the felt or other soft porous material 13, the said stopper 11 having a central vertical aperture 14 to receive the said tube and felt and the said tube and felt being projected beyond the top surface of the said stopper. The stopper 11 may be formed of cork, and by preference the tube 12 will be a split metal tube, so that it may exert a yielding binding force in an outward direction against the felt 13 and stopper 11, the said tube 12 being relied upon as the means for applying and securing the felt 13. I do not limit the invention, however, to the tube 12 being in the form of a split tube nor to its being constructed of metal, since it may be formed of glass, celluloid, or other material. The felt 13 constitutes a porous cap for the outer end of the tube 12, and this felt 13 may, prior to its application to the stopper 11, be in the form of a flat disk of suitable diameter, which will be first placed against the lower end of the stopper 11 and then pressed through the stopper by means of the tube 12, the latter following the central portion of the disk through the stopper and binding the edge portions of the disk against the inner walls of the aperture 14 in the stopper.

When the bottle employing the closure of my invention is not in use, a cap 15 will be applied upon the upper end of the stopper 11, as shown in Figs. 1 and 2, the said cap being preferably free of the felt 13, but closely engaging at its vertical sides the upper edges of the stopper 11, the upper end of the stopper 11 being preferably tapered downwardly and inwardly, as clearly shown in Fig. 1, so that the cap 15 will only engage the stopper 11 along the exterior upper edges of the latter.

The construction shown in Fig. 2 differs from the construction shown in Fig. 1 only in the shape of the bottle 10 and in the size of the parts of the closure, and in Fig. 2 I

illustrate a small cork stopper 16 as being inserted within the lower end of the split tube 12, the purpose of this cork 16 being during the shipment of the bottle containing the mucilage or other substance to prevent the leakage of the substance through the tube 12 and felt 13. When the bottle is delivered to the consumer, he will remove the closure, extract the cork 16, and return the closure to position within the mouth of the bottle, and thereupon the bottle and closure will be in condition for use. The cork 16 is thus merely an incidental feature, and it may or may not be used, as may be required. When the closure is placed in a bottle of smaller size than that illustrated in Fig. 2, it may be shipped with an ordinary solid-cork stopper within its mouth and delivered to the consumer with the closure of my invention, so that the consumer may remove the solid cork and introduce into its place the said closure. It is not, therefore, necessary that the cork 16 be employed within the lower end of the tube 12, but it may be there employed or it may be employed directly in the mouth of the bottle prior to the delivery of the latter, with the closure of my invention, to the consumer.

The cap 15 produces an air-tight closure about the felt 13 and when withdrawn from off the upper end of the stopper 11 creates a suction which aids in starting the mucilage through the felt 13.

When it is desired to use the bottle containing mucilage and equipped with the closure of my invention, the cap 15 will be removed and the inversion of the bottle, which may be performed either before or after the removal of the cap 15, will result in permitting the mucilage to enter the tube 12 and escape in limited quantities through the felt 13 at the outer end of said tube, the mucilage percolating through the felt 13 and being applied to the paper or other substance by moving said felt, using the bottle as a handle, upon the same. During the application of the mucilage to the paper or other substance the felt 13 is employed to spread the mucilage upon the surface receiving the same and dispenses with the use of the ordinary mucilage-brush. After the proper quantity of mucilage has been applied to the surface receiving it the bottle 10 will be restored to its upright position and the cap 15 returned upon the upper end of the stopper 11, said cap protecting the felt 13 and forming a substantial air-tight chamber about the same.

In the foregoing description I have described the invention as being applicable for use in connection with bottles containing mucilage; but I do not desire to limit the invention to its employment in connection with a mucilage-bottle, since it is also useful when applied to bottles containing liquids other than mucilage. For illustration, the bottles shown may be made use of for moistening surfaces with water instead of mucilage, and, if desired, the felt 13 may be utilized not only for applying water to a surface, but as a means for rubbing such surface so as to clean the same.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. A closure comprising the stopper 11 having the vertical aperture, combined with the tube and soft porous material within said aperture and projecting beyond the top surface of said stopper; substantially as set forth.

2. A closure comprising the stopper 11 having the vertical aperture, combined with the tube and soft porous material within said aperture and projecting beyond the top surface of said stopper, and the cap 15 adapted to fit upon the upper end of said stopper; substantially as set forth.

3. A closure comprising the stopper 11 having the vertical aperture, combined with the split tube and soft porous material within said aperture and projecting beyond the top surface of said stopper; substantially as set forth.

4. A closure comprising the stopper 11 having the vertical aperture, combined with the tube and soft porous material within said aperture and projecting beyond the top surface of said stopper, and the cap 15 adapted to fit upon the upper end of said stopper, the upper end of said stopper having downwardly-converging sides so as to contact with the inner walls of said cap only along a narrow line; substantially as set forth.

5. The closure comprising the stopper 11, having the vertical aperture through it, combined with the cap of soft porous material 13 at the upper end of said aperture and projecting outwardly beyond said stopper, and means for securing said porous cap; substantially as set forth.

6. The closure comprising the stopper 11 having the vertical aperture 14, combined with the tube 12 and the porous material 13 upon the outer end of said tube and extending downwardly within said aperture, said tube securing said material in position; substantially as set forth.

Signed at New York, in the county of New York and State of New York, this 11th day of June, A. D. 1903.

CHARLES B. OVERBAUGH.

Witnesses:
ARTHUR MARION,
CHAS. C. GILL.