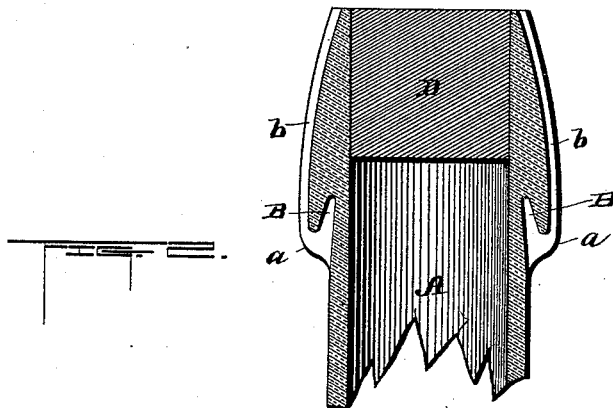
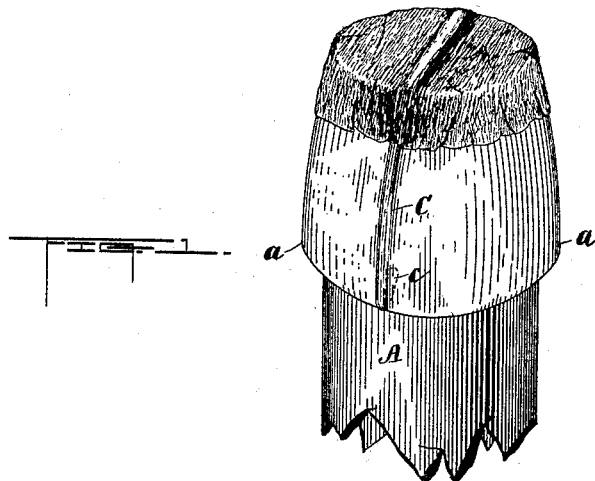


(No Model.)

J. J. HEIM.
BOTTLE STOPPER FASTENING.

No. 421,402.

Patented Feb. 18, 1890.



Witnesses

R. B. Seward.
James E. Young.

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UNITED STATES PATENT OFFICE.

JOSEPH J. HEIM, OF KANSAS CITY, MISSOURI.

BOTTLE-STOPPER FASTENING.

SPECIFICATION forming part of Letters Patent No. 421,402, dated February 18, 1890.

Application filed November 29, 1889. Serial No. 331,869. (No model.)

To all whom it may concern:

Be it known that I, JOSEPH J. HEIM, a citizen of the United States, residing at Kansas City, in the county of Jackson and State of Missouri, have invented certain new and useful Improvements in Bottle-Stopper Fastenings; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to an improvement in bottle-stopper fastenings.

The object is to provide simple, convenient, and effective means for securing the corks of bottles in their positions within the nozzle, and is particularly well adapted for use in connection with bottles employed in the shipment of bottled wine, liquor, and beer, and in all instances where it is desirable to have the cork held, whether the pressure from the contents of the bottle be gentle or strong, and at the same time have the fastener readily removable.

With these ends in view my invention consists in certain features of construction and combinations of parts, as will be hereinafter described, and pointed out in the claims.

In the accompanying drawings, Figure 1 is a view of the nozzle of a bottle, showing the fastener adjusted thereto; and Fig. 2 is a vertical central section through the nozzle and through the retaining-sockets for the ends of the fastener.

A represents the neck of a bottle reinforced, as is usual, at its nozzle by an annular ring or bulge *a*. At two opposite points of the lower edge of the ring or bulge *a* the neck is provided with sockets B, extending obliquely inward and upward, and forming seats for the reception of the ends of the wire fastener C.

From the upper portions of the outer ends of the sockets B grooves *b* extend toward the mouth of the bottle, the said grooves forming seats for the wire fastener when in position, and serving to hold it against accidental displacement, and also admit of an exterior covering of tin-foil, for example, being smoothly and evenly adjusted to the neck, so as to effectually shut out any dampness.

The wire fastener C is of bail form, its body portion intended to extend about centrally over the end of the stopper D, and its ends *c* being bent at a sharp angle to the body portion to seat in the sockets B.

The parts are assembled by inserting the ends *c* of the fastener C partially into the sockets B, the body of the fastener being swung to one side of the mouth of the bottle. When the stopper has been inserted, the fastener C is swung into position over the end of the stopper, the sides of the fastener dropping into the grooves *b*.

It is found expedient to employ wire of a fairly-good quality and having elasticity enough to cause it to seat snugly in the grooves. Small wire of such character has been found by experiment to effectually withstand the pressure required in effervescing wines and beer without displacement.

The removal of the wire in uncorking may be readily effected by inserting a pointed instrument between the wire and the neck near the end *c* and withdrawing the end from the socket.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. In a bottle-stopper fastening, the combination, with a nozzle having oppositely-located upwardly-extending sockets and grooves leading from the mouths of the sockets to the mouth of the nozzle, of a wire fastener having its ends bent to engage the sockets and its sides fitted to engage the grooves, substantially as set forth.

2. A bottle-stopper fastening comprising a neck having a bulge around its nozzle and provided with upwardly-extending sockets located at the lower edge of the bulge and at opposite points thereof, and grooves leading from the mouths of the sockets toward the mouth of the nozzle, and a wire of bail form having its ends bent to engage the sockets and its sides fitted to engage the grooves, substantially as set forth.

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

JOSEPH J. HEIM.

Witnesses:

BESSIE E. YOUNG,
OLETTA LOWELL.