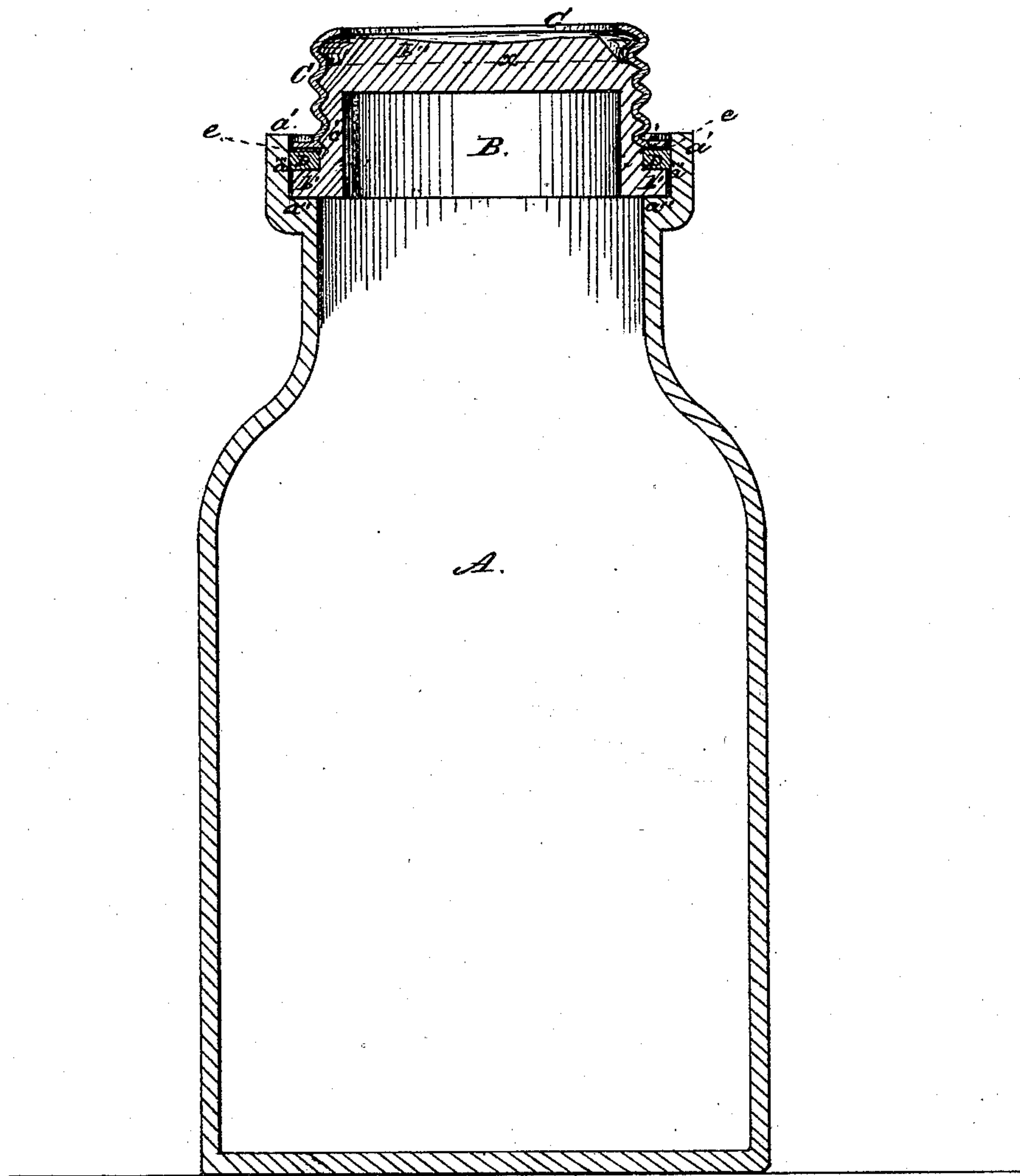


W. L. Haller,

Fruit Jar.

No. 98,586.

Patented Jan. 4. 1870.



Witnesses:

Wm. Morrison
Wm. H. Morrison

Inventor:

W. L. Haller

United States Patent Office.

WILLIAM L. HALLER, OF PHILADELPHIA, PENNSYLVANIA.

Letters Patent No. 98,586, dated January 4, 1870.

IMPROVEMENT IN FRUIT-JARS.

The Schedule referred to in these Letters Patent and making part of the same

I, WILLIAM L. HALLER, of the city of Philadelphia, in the State of Pennsylvania, have invented certain Improvements in Stoppers for Sealing Fruit-Jars and Bottles, of which the following is a specification.

Nature and Objects of the Invention.

My invention is an improvement upon the stopper patented to C. M. Alexander, as assignee of James D. Willoughby, the inventor, dated January 4, 1859; and relates to the combination, with a horizontal ledge or seat and vertical sides in the inner side of the mouth of a glass or glazed-ware jar or bottle, of a glass or glazed-ware stopper, a sheet-metal screw-cap around the outer side of the same, and an elastic air and water-proof packing-ring between, in such a manner, that as the cap is screwed down around the glass stopper, so as to compress the elastic packing-ring, while the vitreous stopper is resting down upon the ledge or seat in the mouth of the jar or bottle, the packing-ring will be increased in its external diameter, and thus pressed outward against the inner surface of the mouth of the jar or bottle to which it is intended to be applied, so as to not only render the mouth of the vessel air-tight, as by said Willoughby's invention, but, at the same time, to present a glass or glazed-ware surface only to the contents of the vessel; the object of my invention being to obviate the injurious effects which arise from oxidation or decomposition of the metallic bottom of the said Willoughby's stopper.

Description of the Accompanying Drawing.

The figure represents a central vertical section of an appropriate glass jar, having a stopper applied which embodies my invention.

General Description.

A is a glass fruit-jar, having its mouth enlarged sufficiently at its upper part, a' , to produce a flat horizontal ledge or seat, a'' , and vertical sides, a''' , around the inner side of the same.

B is the glass stopper, adapted in size to fit the jar. It is made hollow, and open on its under side, and with its lower edge flanged, so as to produce a horizontal projection, b' , of rectangular cross-section, and with its lower side in the same plane with the whole bottom edge of the stopper, and its outside diameter a little less than the inside diameter of the enlargement a' , of the mouth of the jar, above the seat a'' .

From the upper side of the flange b' , upward to the dotted line x , which indicates the top of the stopper B, the outer side is screw-cut, for the reception of the sheet-metal screw-cap C, and across the middle of its top there is a raised part, b'' , which serves as a handle, by which to conveniently adjust the stopper down upon the seat a'' .

The screw-cap C has a large opening through its top, and its screw-threads extend downward far enough to come nearly into contact with a flat external flange, c' , the external diameter of which corresponds with the external diameter of the flange b' , of the glass stopper B.

D is the elastic air and water-proof packing-ring. It is rectangular in its cross-section, fits around the outer side of the stopper B, and rests flatly down upon the flange b' , its external diameter being equal with the inner diameter of the enlargement a' , of the mouth of the jar A.

A flat friction-ring, of thin sheet-metal or paper, e , is laid upon the elastic ring D, to receive the flanged edge of the screw-cap, for the purpose of allowing the said flange to slip thereon while being screwed down upon it.

The mode of operation consists in placing the stopper B so that it will rest down upon the seat a'' of the jar A, adjusting the packing-ring D down upon the flange b' of the stopper B, the friction-ring e upon the packing-ring D, and, finally, screwing the cap C down sufficiently tight upon the latter to cause the packing-ring D to be compressed enough to cause its external edge to fit air-tight against the inner sides of the enlargement a' of the mouth of the jar, and thus seal it, leaving a glass covering only next to the contents of the jar, as represented in the drawing.

Claim.

I claim, as my invention—

In combination with the horizontal ledge or seat a'' , and vertical sides a''' , in the inner side of the mouth of the jar A, the flanged screw-threaded glass or glazed-ware stopper B, the flanged screw-threaded sheet-metal cap C, and the elastic packing-ring D, substantially as and for the purpose hereinbefore set forth.

WM. L. HALLER.

Witnesses:

BENJ. MORISON,
WM. H. MORISON.