

H. D. QUARRIER.
CLOSURE FOR JARS AND THE LIKE.
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1,341,382.

Patented May 25, 1920.

Fig. 1.

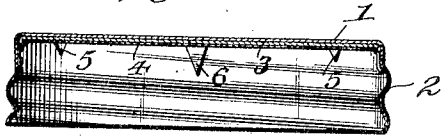


Fig. 2.

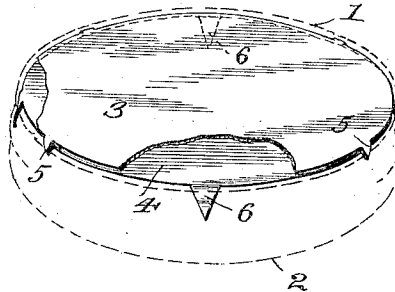


Fig. 3.

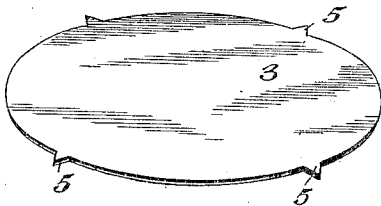
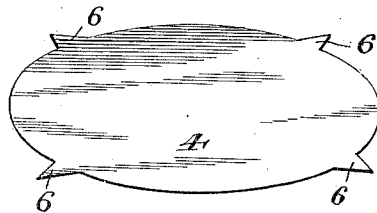


Fig. 4.



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CLOSURE FOR JARS AND THE LIKE.

1,341,382.

Specification of Letters Patent.

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To all whom it may concern:

Be it known that I, HULLIHEN DEWEY QUARRIER, a citizen of the United States, residing at Woodsdale, Wheeling, in the county of Ohio and State of West Virginia, have invented certain new and useful Improvements in Closures for Jars and the like, of which the following is a specification.

This invention pertains to improvements in jar caps or closures and has reference more particularly to means employed for retaining the cardboard and oiled paper liners in place within the cap. In the packing of certain classes of materials it is essential that such liners be employed to prevent contact of the material packed with the metal of the cap, and it is a common practice to employ liners which overlie the entire face of the cap to prevent such contact when the cap is screwed or otherwise secured in place. Such liners have, however, been generally loosely inserted within the cap and consequently more or less trouble has been experienced by reason of the fact that such liners readily become displaced and frequently it happens that a jar will be closed with the liner absent. The present invention seeks to overcome this inherent defect and to provide means whereby the liners when once positioned within the cap will under normal conditions maintain their position up to the time of placement of the cap upon the jar or other receptacle.

The invention is illustrated in the accompanying drawings, wherein,—

Figure 1 is a transverse vertical sectional view of a screw cap with the liners positioned therein;

Fig. 2 a perspective view of the two liners, the innermost liner being partly broken away and the cap or closure element shown in dotted lines; and

Figs. 3 and 4 perspective views of the two liner elements employed in the preferred embodiment of the invention.

In the drawings the cap may be said to comprise a top 1, preferably flat, with a downwardly projecting screw-threaded flange 2 adapted to engage the threads upon a jar or like receptacle. Within the cap there is positioned one or more liners, and preferably two, one liner 3 being formed of cardboard and the other liner 4 being produced from a sheet of oiled paper, or paper

so treated as to be impervious to the liquid content of the receptacle. The cardboard element 3 forms a packing, and the liner 4, which is comparatively light and thin, forms the sealing element which is adapted to contact the mouth of the jar and effects a tight union therewith. The liner 3 is provided with a plurality of outwardly projecting tabs 5 and the liner 4 is likewise provided with a plurality of such tabs as indicated by 6, all preferably pointed or angular in form. The liners are preferably of such diameter as that the edges thereof will make a relatively close fit with the side wall of the cap and inasmuch as the tabs or projections 5 and 6 normally lie in a plane with said liners, said tabs, when the liners are positioned, will be turned downwardly at substantially right angles to the body of the liners and will contact the side wall and hug the same with more or less of a spring action. The tabs, moreover, may be long enough to contact the threads formed in the cap and consequently they will serve to retain the liners in place against any ordinary impact to which the cover may be subjected and which would tend to throw the liners out of position within the cap.

As will be seen upon reference more particularly to Figs. 1 and 2, the tabs formed upon the liner 4 are somewhat longer than those formed upon the liner 3 in order that there may be greater frictional area between such tabs and the cap and between the tabs of the heavier element 3 and the cap. This is preferable for the reason that the liner 4, being formed of light material, the short tabs would not produce as good a contact as do the longer tabs.

What is claimed is:

1. A closure for jars and the like, comprising a cap having a downwardly extending flange, a liner located within the cap, said liner being provided with marginal tabs bearing against the inner side wall of the flange and maintaining the liner in place by frictional contact therewith.

2. A closure for jars and the like, comprising a cap having a downwardly extending flange; a liner therefor formed from a sheet of paper and of a diameter substantially equal to that of the interior diameter of the cap, said liner being provided with a plurality of outwardly projecting tabs or fingers normally lying in the plane of the

body thereof and when positioned within the cap being turned downwardly and lying in close contact with the inner wall of the cap.

5 3. In a closure for jars and the like, the combination of a cap provided with a downwardly extending flange and a plurality of liners, said liners having a diameter approximating that of the interior of the cap
10 and each of said liners being provided with a series of integrally formed tabs or fingers extending outwardly from the marginal portion thereof and contacting the inner wall of the cap and being bent downwardly from
15 the plane of the liners when the liners are forced to position within the interior of the cap.

4. In a closure for jars and the like, the combination of a cap provided with a downwardly extending flange; a liner formed of
20 relatively heavy material and provided with a plurality of outwardly extending tabs or fingers which contact the inner wall of the flange when the liner is forced to place; and
25 an overlying liner formed of oiled paper, said liner likewise being provided with a

series of outwardly projecting tabs which contact the inner wall of the flange.

5. In a closure for jars or like receptacles, the combination of a cap provided with
30 a downwardly extending screw-threaded flange; a packing liner formed of cardboard, said liner being of a diameter substantially equal to that of the interior diameter of the cap; a plurality of fingers extending out-
35 wardly from said cardboard liner and lying in the plane of the body of the liner prior to the placement of the liner in the cap and contacting the inner wall of the flange of the cap when the liner is forced to position;
40 and a second liner overlying the cardboard liner, said second liner being formed from oiled paper and likewise provided with a series of tabs extending outwardly from the margin thereof and contacting the wall of
45 the flange when positioned, whereby the superposed liners will be held in proper position to each other and to the cap.

In testimony whereof I have signed my name to this specification.

HULLIHEN D. QUARRIER.