The present invention relates to improvements in sealed transparent containers for bottles, and constitutes certain improvements over my prior Patent No. 1,732,099, granted October 15, 1929.

In the case of the prior patent aforesaid, a sealed container for bottles of whiskey and the like was provided to assure the integrity of the contents at a time when "bootlegging" was rampant with the result that spurious liquor of inferior grade and age was being substituted on a large scale for the fine bottled bond whiskies of reputable distilleries. At that time great injury and damage was being done not only to the business of the reputable distilleries, but also to the patients in hospitals and the sick and convalescent generally who were buying impure and deleterious substances under the guise and dress of the trade-marks, labels and bottles of honest manufacturers.

A similar, if not more aggravated, condition exists today, and the present invention has for its objects generally the same objects as heretofore stated in connection with my earlier patent, although it is no longer necessary to provide one or more windows in the side wall of the container as proposed in said patent. These windows were for the purpose of enabling the druggists to affix a prescription label, which was required by the regulations passed pursuant to the Volstead Act, directly to the bottle, as well as for the purpose of enabling the druggist to record the number on the revenue stamp, which record he was required to keep under the same regulations.

While those regulations no longer have the effect of law and it is unnecessary to comply with same, so that a window can now be dispensed with, it is highly important that an attractive package be offered the purchasing public, and that purchasers be enabled to inspect the bottle and all of the reading matter on the trade-mark labels and the distiller's labels, as well as the revenue stamp to enable one to judge of the brand, source of manufacture, age of the liquor, and other facts which move buyers to purchase particular varieties of liquors.

It is, therefore, an object of the invention to produce an improved container for bottles, which will be transparent as to its side wall, although having a continuous side wall uninterrupted by openings, to reveal the shape and character of the bottle, the reading matter on the labels and revenue stamp and the attractiveness of the bottle itself, while at the same time rendering that bottle proof against tampering or substitution of its contents, whereby the purchaser is assured of the quality and integrity of the liquor contained in the bottle.

With the foregoing and other objects in view, the invention will be more fully described hereinafter, and will be more particularly pointed out in the claim appended hereto.

In the drawing, wherein like symbols refer to like or corresponding parts throughout the several views,

Figure 1 is a perspective view of an improved sealed transparent container for bottles constructed in accordance with the present invention.

Figure 2 is a fragmentary vertical section taken on the line 2—2 of Figure 1.

Figure 3 is a horizontal section taken on the line 3—3 in Figure 2.

Figure 4 is an enlarged fragmentary vertical section showing the construction of attachment between head and side wall.

Figure 5 is a fragmentary vertical view, with parts broken away and parts shown in section, of the top head, side wall and joint of the latter, and

Figure 6 is an enlarged fragmentary sectional view, as in Figure 3, showing more particularly the side wall joint.

Referring more particularly to the drawing, the bottle is designated at 7, and may be of any particular form, for instance a quart bottle of demijohn general configuration adapted to contain whiskey, brandy, gin, wines and the like, in which vintage and age is of great value. The bottle is closed by a stopper, cork, or closure of any desired character, and an internal revenue stamp, indicated at 8, is affixed over the closure and secured to the bot- tleneck in accordance with the usual custom.

The trade-mark label is shown at 9, and if desired, a scroll or other label 10 may be also applied to the bottle in any appropriate position for the purpose of indicating that the bottle contains one full quart, or one full pint, or whatever the liquid capacity of the bottle may be. On the opposite side of the bottle, the usual distiller's label is affixed showing the name of the distiller or producer, the volume, proof and such other information as may be deemed desirable to convey to the purchaser.

The bottle 7 is placed within the container, which container consists of a tubular side wall 11 and top and bottom ends or heads 12. In the instance shown, the tubular wall 11 is cylindrical to agree with the rounded quart bottle; but where flat pint bottles are used, the wall 11 may include...
be rectangular in cross section, or of any other form desired. This wall is transparent throughout except at the joint, and is preferably made from “cellophane,” a well-known product on the market constructed of regenerated cellulose. Such material has advantages of toughness, clear transparency which it maintains for a long period of time, and other features desirable in a package of this character.

10 The “cellophane” is preferably of substantial thickness. As compared with “cellophane” in which products are ordinarily wrapped, such as boxes of candy, cigarette packages, etc., the “cellophane” used herein is of much greater thickness, so that it will have an inherent stability which will be increased by forming it into cylindrical shape.

15 Particularly is this true with regard to the upper and lower edges of the tube, which are connected with the heads 12, such heads being preferably of metal, for instance tin.

20 The joint between the meeting ends of the “cellophane” body 11 of the container is shown more particularly in Figures 3 and 6, and consists of a metallic or other flexible or elastic sheet folded to form a double channel member, in which the outer walls are represented at 13 and 14, and the inner walls at 15 and 16, while the bights or connecting parts are designated at 17 and 18. The inner walls 15 and 16 are connected by a yoke or connecting strip 19, which lies in contact with the inner faces of the inner walls 15 and 16 throughout the length and width of the same. The connecting strip 19 is made from an intermediate portion of the metal joint member, the inner channel walls 15 and 16 being folded over in opposite directions upon the outer face of the connecting strip 19, and the outer channel walls 13 and 14 being folded over in opposite directions upon the respective inner walls 15 and 16 after the material is bent to form the two bights 17 and 18, which bights are disposed opposite to one another and in contact with one another. The outer walls 13 and 14 are longer circumferentially of the cylindrical wall 11 as compared with the inner walls 15 and 16 and the connecting strip 19, to the end that the extending portions of such walls 13 and 14, which lie beyond the ends of the connecting strip 19, are tightly pinched together and thus are not capable of being forced apart. The “cellophane” wall 11, which portions are unsupported on their inner sides to the end that a pinching of the “cellophane” material may be had over and above the clamping effect imposed by the pair of jaws of the channel members, such pinching effect being due to the pressing of the extended ends of the outer walls 13 and 14 radially inward with respect to the arc on which the walls 13 and 14 are struck. The cylindrical form of the heavy stiff “cellophane” will react against the inwardly pressed extension portions of the outer walls 13 and 14 and, thus a tight pinching action between the inner and outer walls at the open ends of the channels will result. Such joint is staunch as required by the weight of a quart bottle with its liquid contents.

50 The “cellophane” body 11, the connecting portion 19, and the metal joint member are made of such material that the original part 11 of the tubular “cellophane” body will be rocked outwardly by reason of the pressure imposed thereupon by the intumesced edge 23. It will be understood that these parts are greatly enlarged in Figure 4 in order to bring out the construction, but the heads will be made of a very light gage, so that the infolded edge 23 will be very small indeed and its uppermost intumesced portion will approach a knife edge, which while it will not ordinarily cut into the “cellophane” material, nevertheless will exert a strong pressure there against indenting such material or producing so great a pressure there upon that the material outwardly beyond the circumferential line of this applied pressure will tend to bend radially outward, speaking with reference to the diameter of the cylinder 11. In this way the 20 heads are bound firmly to the container, making it impossible to pull off the heads without mutilating the body 11.

55 In the use of the device, the bottom head of the container may be put in place with the 30 bottle in the case 20, the joint 19 being made and joined together by the joint shown in Figure 4 or some other form of joint adapted to “cellophane” or like material of a character or construction to hold the body wall 11 secured against being 35 pulled apart. The bottle is then placed through the opening in the case so that the outer faces of the bottle are put in place and secured to such body in the manner indicated in Figure 4. The head may be spun on to the body by the peculiar spinning operation necessary to form the infolded part 32. Thus the metallic heads or closures 12 are secured in permanent and tight manner on the wall of the carton 11 by the spinning or other operation. The machinery necessary to accomplish this operation is large and heavy, and is expensive, being found only in factories in the hands of a few responsible manufacturers who could not afford to deal with the bootleggers and venders of spurious goods. For this reason, the 45 packaging of whiskey in a carton, such as described, is from a practical and commercial standpoint the highest guarantee available of the purity of its contents. The bottles are filled with a certificate to the effect that the bottle is one of the legitimate bottle makers, and resembling in the least the mark of the counterfeiters. After the closures have been put in place, the revenue stamp 8 is applied. The bottle is then immediately placed in the improved container and the heads 12 sealed on the body 11.

55 The entire device then becomes an article of commerce and may be packed in cases ready for shipment to the trade where it is sold directly to the consumer while in the sealed condition within the container 11. The transparent wall enables the prospective customer to view the bottle, the trade-mark, the label, and the revenue stamp in as clear a manner as it would be possible to do if the bottle were not encased in such a container. In fact the container 11 protects the bottle from dust and moisture. The 80 bottle and the labels in a clean, polished and attractive appearance, and the bottle and the labels which would reduce the commercial desirability of the package as an article of commerce. Moreover, the “cellophane” tube 11, particularly where it is round in form, will acquire a certain glaze which adds to the attractiveness of the display. The joints shown in Figures 4 and 6 are of such character as to make it impractical to remove same for the purpose of getting 75
at the bottle to withdraw its genuine contents and replace same by a counterfeit. It is only possible to open the package by cutting all around the "cellophane" side wall 11 and bending the head 12 back upon the joint strip 13 as a hinge.

The necessity for sealing whiskey arises from the fact that, without a protective seal, the ultimate consumer has no assurance of its integrity. The more effective the seal the more certain the integrity of the whiskey. All metal seals and caps which are applied directly over the cork are capable of ready imitation and duplication. The present device cannot be readily duplicated because of its inherent construction, and the control over the machinery necessary to make this carton by responsible manufacturers adds a further guarantee that these packages and the machinery for making the same will not fall into the hands of those who would stoop to counterfeit the contents of the bottles.

Of course, instead of "cellophane", mica or some other transparent material might be substituted.

It is obvious that various changes and modifications may be made in the details of construction and design of the above specifically described embodiment of this invention without departing from the spirit thereof, such changes and modifications being restricted only by the scope of the following claim.

What is claimed is:

A sealed transparent container for bottles comprising a body of substantially thick, tough and resilient material shaped into tubular forms, and end heads having internal flanges fitting within end portions of the tubular body and external flanges lying upon the exterior of such portions, said external flanges having enfolded parts with edges adapted to bite into the material of the body for rocking the terminal portions of the body outwardly, said internal and external flanges being parallel, and an arched web portion connecting said flanges and providing above the enfolded part of the external flange a space of a width greater than the thickness of the body through which space the terminal portion of the body may rock.

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