

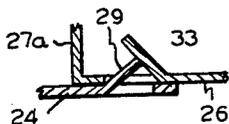
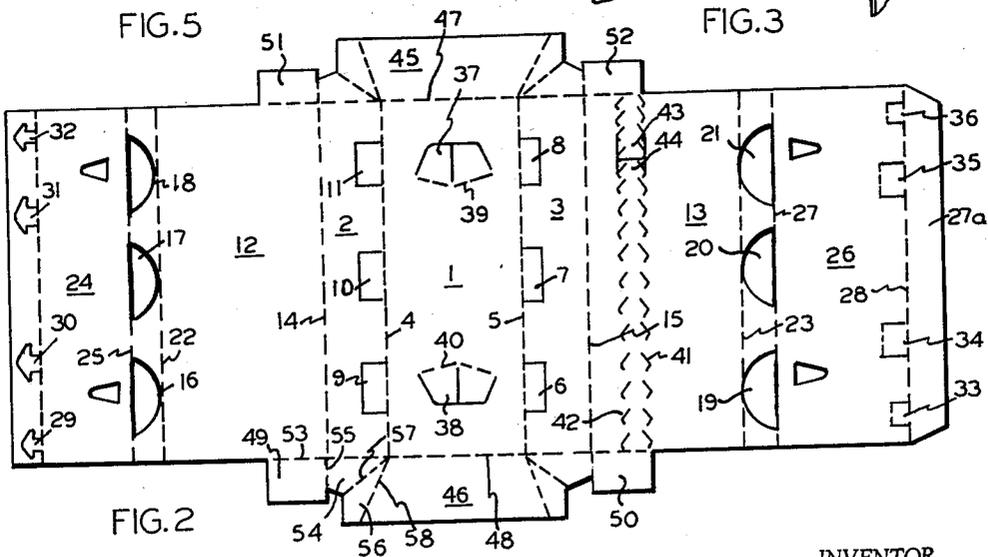
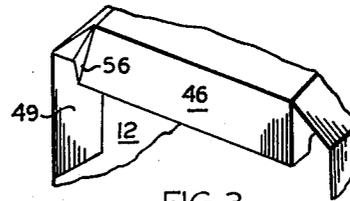
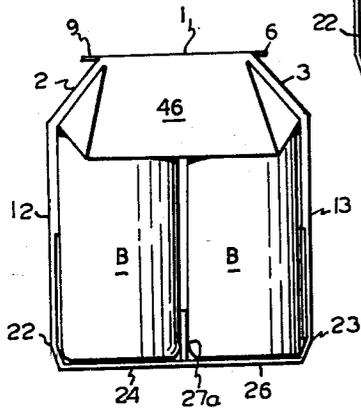
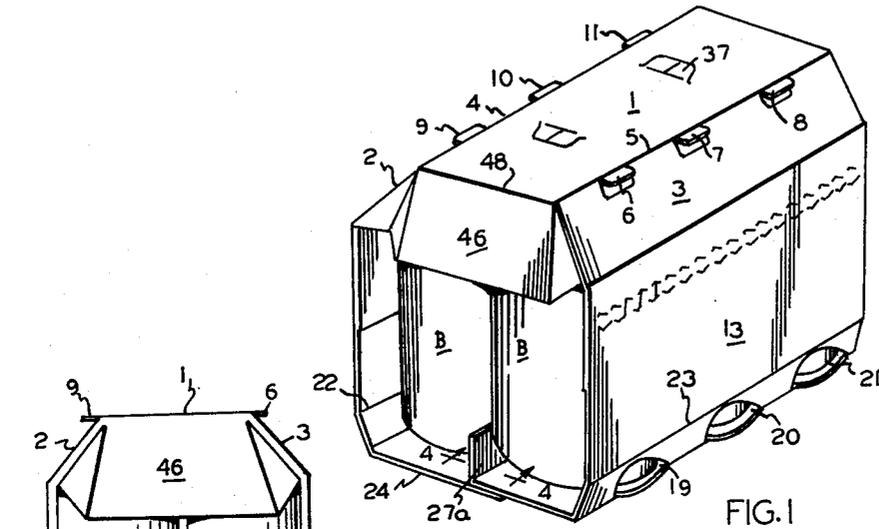
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BOTTLE CARRIER

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3,128,010

BOTTLE CARRIER

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This invention relates to bottle carriers and more particularly to bottle carriers of the wrap-around type and is directed toward adapting such a carrier so as to afford more than the usual amount of billboard advertising space and so as to render the carrier effective to hold the bottles in a secure manner without imparting undue compressional stress to the bottles.

In retail outlets it is customary to display packages of bottled goods by arranging the packages in a variety of positions. Frequently where wrap-around type packages are used, only the open ends of the package are exposed to view. In such a situation the shopper may not be aware of the nature or brand of the contents of the wrapper.

In one type of known wrap-around packages for bottles it has been customary to provide a wrapper which is so tight as to form a unitary package which imposes substantial stress on the bottles.

A principal object of this invention is the provision of an improved carrier of the wrap-around type wherein advertising panels are provided at each end of the wrapper and wherein such panels are arranged so as to aid in retaining the bottles within the wrapper.

The invention in one form comprises a wrapper in which a longitudinally disposed generally rectangular top center portion is provided together with sloping panels foldably joined along the side edges of the top center panel. The side walls of the carrier are foldably joined to the lower edges of the sloping panels and end panels are foldably joined to end edges of the top center panel. For the purpose of enabling a machine to fold the end panel into its desired assembled position, tucking panels are provided along the end edges of the side panels and suitable collapsible web structure is interconnected between the tucking panels and the adjacent ends of the end panels and of the sloping panels. When assembled by suitable machine operations, the tucking panels are disposed flat against the inside surfaces of the side panels and the end panels are substantially vertical and in perpendicular relationship to the top center panel. Of course, the web structure aids in holding the end panel in its vertical position and by so doing aids in holding the packaged bottles within the carrier.

For a better understanding of the invention reference may be had to the following detailed description taken in conjunction with the accompanying drawings in which FIG. 1 is a perspective view of a carrier of the wrap-around type which embodies the invention; FIG. 2 is a blank from which the carrier of FIG. 1 is formed; FIG. 3 is a perspective fragmentary view of a portion of the carrier during an intermediate stage of the carrier forming operation; FIG. 4 is a fragmentary view taken generally along the line 4-4 designated in FIG. 1 and in which FIG. 5 is an end view of the carrier depicted in FIG. 1 and showing the packaged bottles "B" mounted within the carrier.

With reference to FIGS. 1 and 2 the numeral 1 generally designates the top center portion of the carrier while the numerals 2 and 3 generally designate the sloping panels which are respectively foldably joined along the side edges of the center panel 1 along fold lines 4 and 5, respectively. Suitable openings 6-11 are formed in the sloping panels 2 and 3. As can best be seen in FIG. 1 the tabs which define the openings 6, 7 and 8 as well as

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the openings 9, 10, and 11 simply form a continuation along the edges 4 and 5 of the top center panel 1. These openings 6-11 receive the caps of the bottles packaged within the carrier as is well understood.

The side walls of the carton are designated by the numerals 12 and 13. Panel 12 is foldably joined along the fold line 14 to the sloping panel 2 while side panel 13 is foldably joined along the fold line 15 to the lower edge of the sloping panel 3.

For the purpose of receiving the lower rim portions of the bottles packaged within the carrier a plurality of openings 16, 17 and 18 are formed in the lower portion of the side panel 12 while similar openings 19, 20 and 21 are formed in the lower portion of side wall 13.

For the purpose of enabling the lower corners of the carrier to conform to the general contour of the lower rims of the bottles, a score line 22 is formed in the lower portion of the side panel 12 and a similar score line 23 is formed in the lower portion of the side panel 13.

The bottom of the carrier is formed of a pair of lap panels, one of which is designated by the numeral 24 and is foldably joined along a fold line 25 to the side panel 12. A similar lap panel 26 is foldably joined along a fold line 27 to the side panel 13. Foldably joined to the edge of bottom lap panel 26 is a medial panel designated in the drawing by the numeral 27a. This panel is foldably joined along a line 28 to the lap panel 26. As is best shown in FIG. 1 the panel 27a is disposed in perpendicular relation to the bottom lap panel 26 when the carrier is assembled. In this manner the panel 27a affords a cushioning partition which separates the two rows of bottles packaged within the carrier.

For the purpose of securing the lap panel 24 to the lap panel 26 a plurality of locking tabs 29-32 are formed along the edge of the lap panel 24 and these locking tabs are received within openings defined by retaining tabs 33-36 formed in the edge of lap panel 26. The particular relationship between the locking tabs and the retaining tabs is depicted in the fragmentary structure shown in FIG. 4. Such locking arrangement is more fully disclosed and is claimed in Patent 2,786,572, issued March 26, 1957, and assigned to the owner of this invention.

For the purpose of providing apertures by which the package may be carried, tabs 37 and 38 are formed within the top panel 1. These tabs are simply pressed inwardly along the fold lines 39 and 40 to provide finger gripping apertures.

For the purpose of facilitating opening of the package, a pair of perforated lines 41 and 42 are formed in parallel relation across the side panel 13. Pull tabs 43 and 44 are provided if desired to facilitate opening the carton by tearing along the perforated lines 41 and 42.

In accordance with this invention the end panels 45 and 46 are foldably joined to the ends of center panel 1 along fold lines 47 and 48, respectively.

For the purpose of holding the end panels 45 and 46 in the vertical position and also for facilitating the setting up of the carton by machine, tucking panels are foldably joined to the side wall. Such tucking panels are designated in the drawing by the numerals 49, 50, 51 and 52. Tucking panel 49 is foldably joined to side panel 12 along fold line 53 and tucking panel 49 is foldably joined to web panel 54 along fold line 55. Web panel 54 is foldably joined to web panel 56 along a fold line 57 and web panel 56 is foldably joined to end panel 46 along fold line 58. Tucking panels 50, 51 and 52 are interrelated with their adjacent web panels and end panels in a manner identical to that just described. Web panels 54 and 56 are generally triangular in shape and, of course, constitute the web structure of this invention.

It will be apparent that the carton of this invention

may be used with or without cushioning panels between adjacent bottles. One suitable cushioning structure is disclosed and claimed in U.S. patent application Serial Number 52,648 filed August 2, 1960, now Patent No. 3,064,871, and assigned to the assignee of this invention.

A machine for setting up the carrier of this invention is disclosed and claimed in U.S. patent application Serial No. 173,581, filed February 15, 1962. As explained in application Serial No. 173,581, a wrapper is placed atop a bottle group and suitable machine elements engage the tucking panels such as 49, 50, 51 and 52 and force these panels downwardly as the wrapper progresses through the various machine operations. Downward movement of the tucking panels is accompanied by downward folding movement of the side panels and collapsing movement of the web structure comprising the web panels 54 and 55. As is shown in FIG. 3 the side panel 12 is substantially vertically disposed and the other side panel is simultaneously being drawn downwardly. When the package is tightened the tucking panels and the web panels force the end panels 46 and 47 to be maintained in the vertical position.

It will be understood that the end panels form billboard space and in addition aid in holding the packaged bottles within the wrapper.

While I have shown and described a particular form of the invention, I do not wish to be limited thereto and intend in the appended claims to cover all such changes and modifications as fall within the true spirit and scope of the invention.

What I claim as new and desire to secure by Letters Patent of the United States is:

1. A carrier of the wrap-around type for packaging a plurality of articles arranged in side-by-side rectilinear relation, said carrier comprising a single continuous top center panel overlying the tops of the articles within the carrier, a pair of sloping top panels foldably joined to said center panel along opposite side edges thereof, a pair of side panels having their top edges respectively foldably joined to the edges of said sloping panels remote from the edges thereof which are foldably joined to said center panel said sloping panels being disposed at obtuse angles with respect to said top and side panels and said side panels being in generally normal disposition relative to said top center panel, end panels foldably joined to the end edges of said center panel, tucking panels foldably joined to the end edges of said side panels, and collapsible web structure foldably interconnecting each tucking panel with the adjacent ends of the adjacent end panel and sloping panel.

2. A carrier of the wrap-around type for packaging a plurality of tubular articles arranged in side-by-side rectilinear relation, said carrier comprising a single continuous top center panel completely overlying the top ends of the articles within the carrier, a pair of sloping top panels foldably joined to said center panel along opposite side edges thereof, a pair of side panels having their top edges respectively foldably joined to the edges of said sloping panels remote from the edges thereof which are foldably joined to said center panel, said sloping panels being disposed at obtuse angles with respect to said top and side

panels and said side panels being in generally normal disposition relative to said top center panel, end panels foldably joined to the end edges of said center panel, tucking panels foldably joined to the end edges of said side panels, and a pair of web panels interconnected by a fold line and forming a collapsible web structure interconnecting each end of each end panel with the adjacent end of the adjacent sloping panel and with an edge of the adjacent tucking panel, one panel of each of said pairs of web panels being foldably joined to one end of each end panel and the other web panel of each pair of web panels being foldably joined to the adjacent end of the adjacent sloping panel and to the adjacent edge of the adjacent tucking panel.

3. A carrier of the wrap-around type for packaging a plurality of tubular articles having tapered shoulders and arranged in side-by-side rectilinear relation, said carrier comprising a single continuous top center panel overlying the tops of the articles within the carrier, a pair of sloping top panels foldably joined to said center panel along opposite side edges thereof, a pair of side panels having their top edges respectively foldably joined to the edges of said sloping panels remote from the edges thereof which are foldably joined to said center panel, said sloping panels being disposed at obtuse angles with respect to said top and side panels and said side panels being in generally normal disposition relative to said top center panel, end panels foldably joined to the end edges of said center panel, and web structure foldably interconnecting the adjacent ends of each end panel and of each sloping panel so as to hold the end panels at an angle to the top panel and thereby to render the outer surfaces thereof readily observable from the ends of the carrier.

4. A carrier of the wrap-around type for packaging a plurality of articles having tapered shoulders, said carrier comprising a single continuous generally rectangular top center panel overlying the articles within the package, a pair of sloping top panels foldably joined to said center panel along opposite side edges thereof, a pair of side panels having their top edges respectively foldably joined to the edges of said sloping panels remote from the edges thereof which are foldably joined to said center panel, an end panel foldably joined to each end edge of said center panel, tucking panels foldably joined respectively to the end edges of said side panels, a first web panel foldably joined to each end of each end panel, and a second web panel foldably joined to each end of each sloping panel and to the adjacent end of each of said tucking panels, each of said second web panels being foldably joined to the adjacent one of said first web panels and constituting therewith a collapsible web structure at each corner of said top panel.

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