United States Patent

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[54] **CARRIER FOR DISPLAY OF CYLINDRICAL OBJECTS, SUCH AS GLASS TUMBLERS, OR THE LIKE**

6 Claims, 8 Drawing Figs.

[52] U.S. Cl. ..... 229/28 R, 206/65 C, 220/116, 229/40, 206/46 FR
[51] Int. Cl. B65d 5/48, B65d 71/00
[50] Field of Search ..... 206/45.16, 45.19, 46 FR, 65, 65 C, 65 E; 220/112, 113, 116; 229/28, 28 BC, 29 A, 29 B, 29 C, 29 D, 29 F, 40, 14 C; 294/87.2

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ABSTRACT: A carrier for the display of a plurality of cylindrical or oblately spheroidal objects such as water tumblers, the carrier being formed from a cut and scored blank and folded to provide connected top, bottom and end panels, a central support panel with or without locks cut and folded from either the top or bottom panel and secured to the other of such panels, locking flaps foldably extending from the sides of said top and bottom panels and having partly elliptical openings therein to receive the upper and lower ends of the tumblers, and adapted to be folded inward to occupy planes angularly related to the planes of the top and bottom panels while holding the tumblers in position, the distal portions of said flaps being preferably locked to the central locking panel.

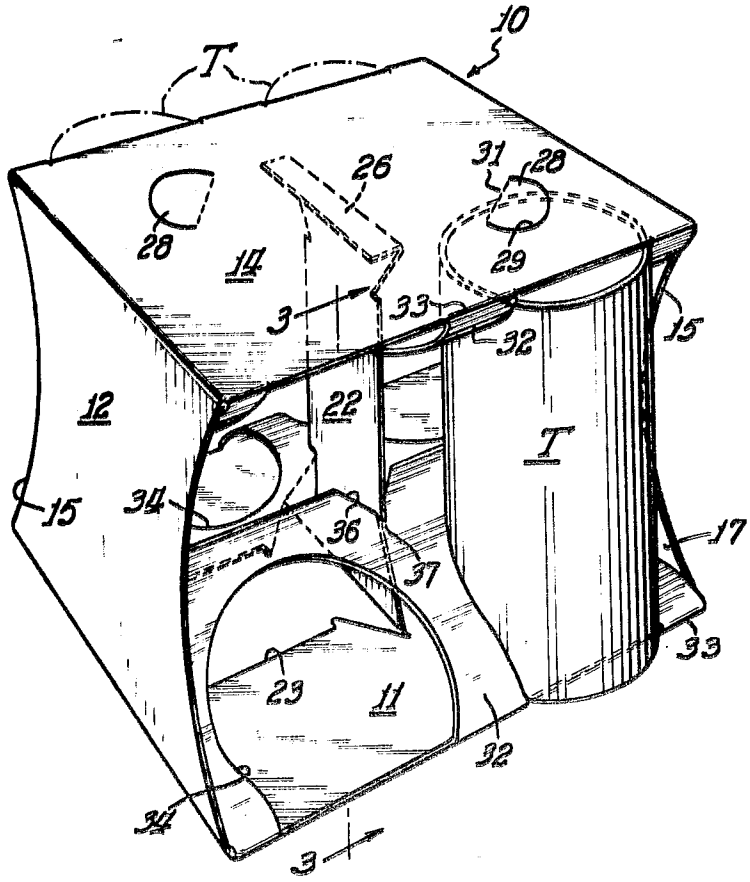


Fig. 2

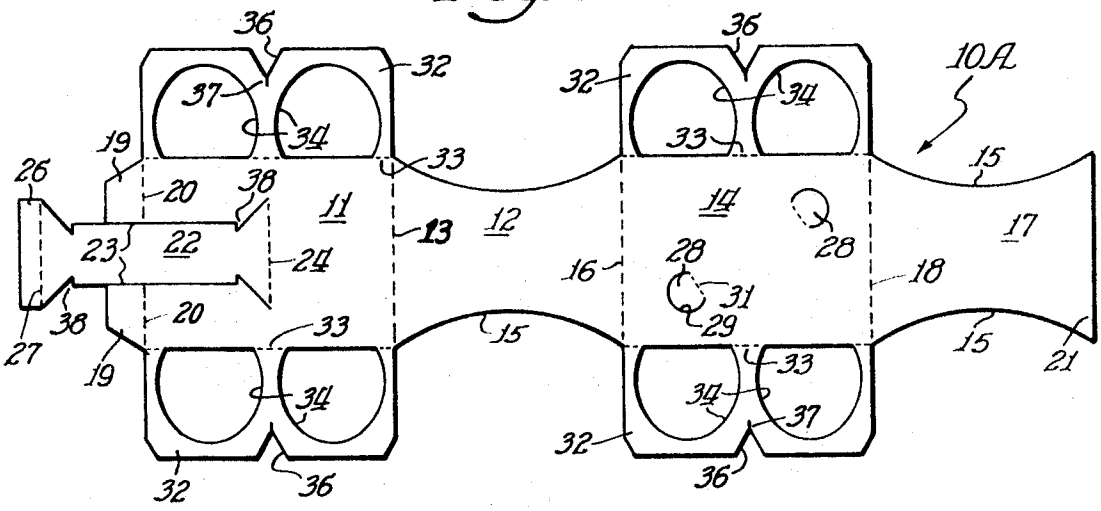


Fig. 5

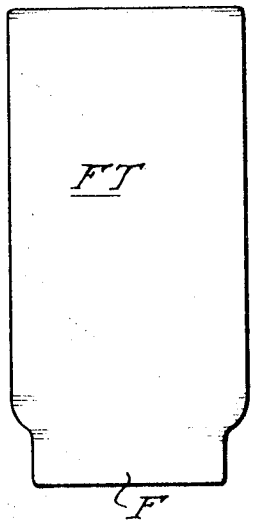
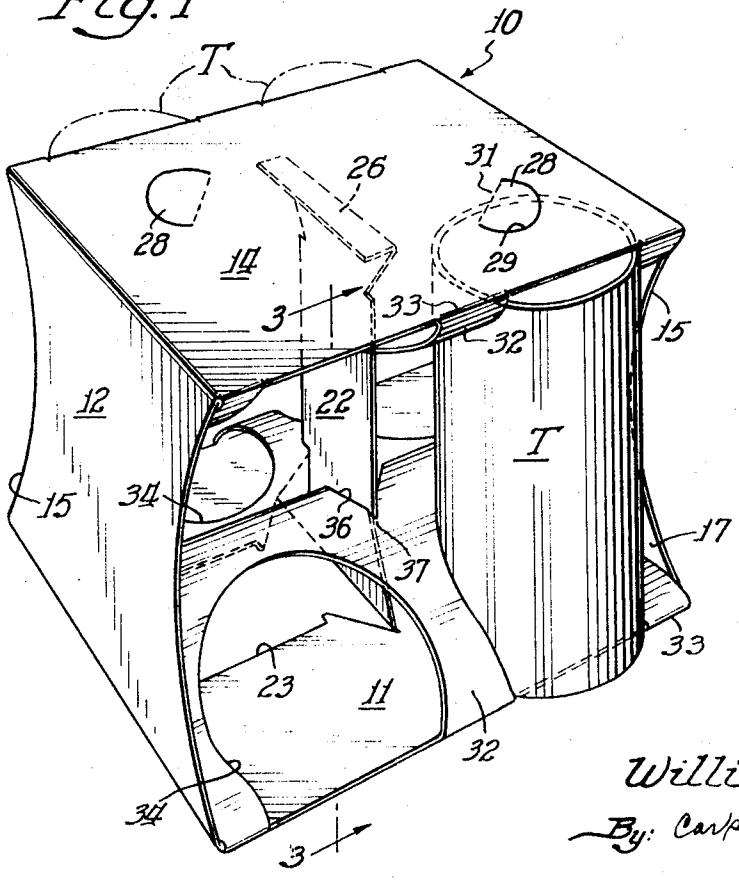


Fig. 1



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Attys

Fig. 3

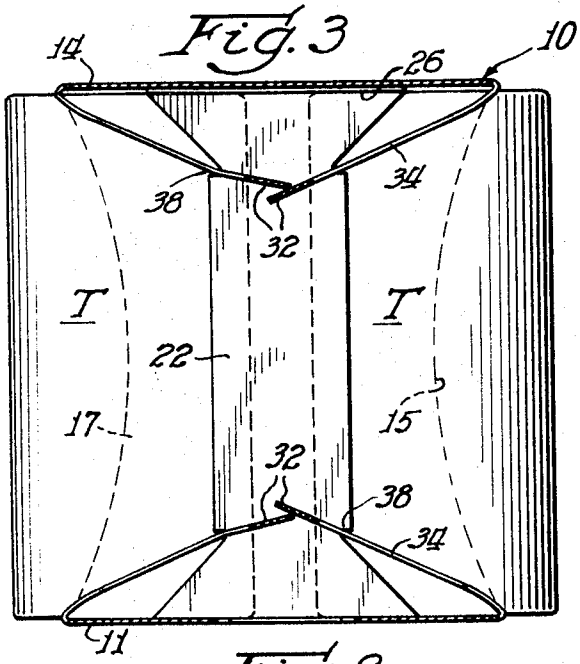


Fig. 4

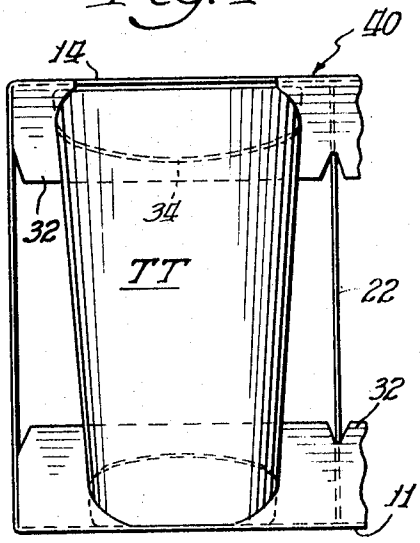


Fig. 8

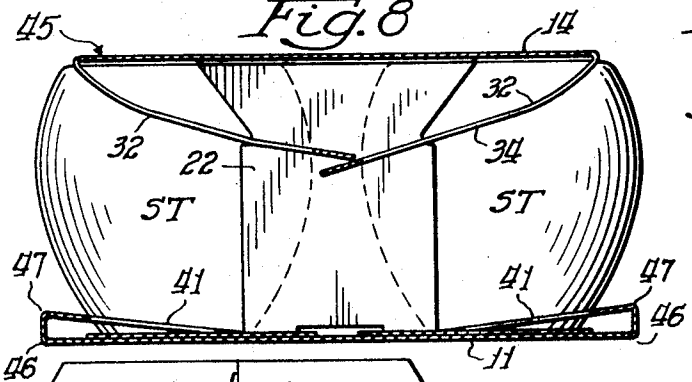


Fig. 6

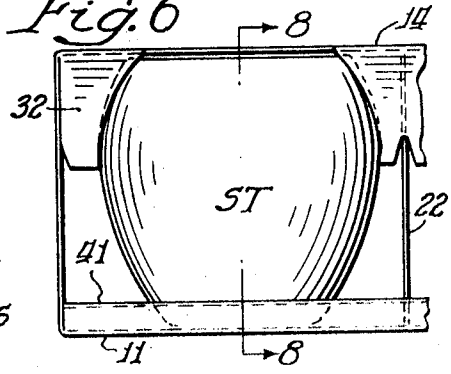
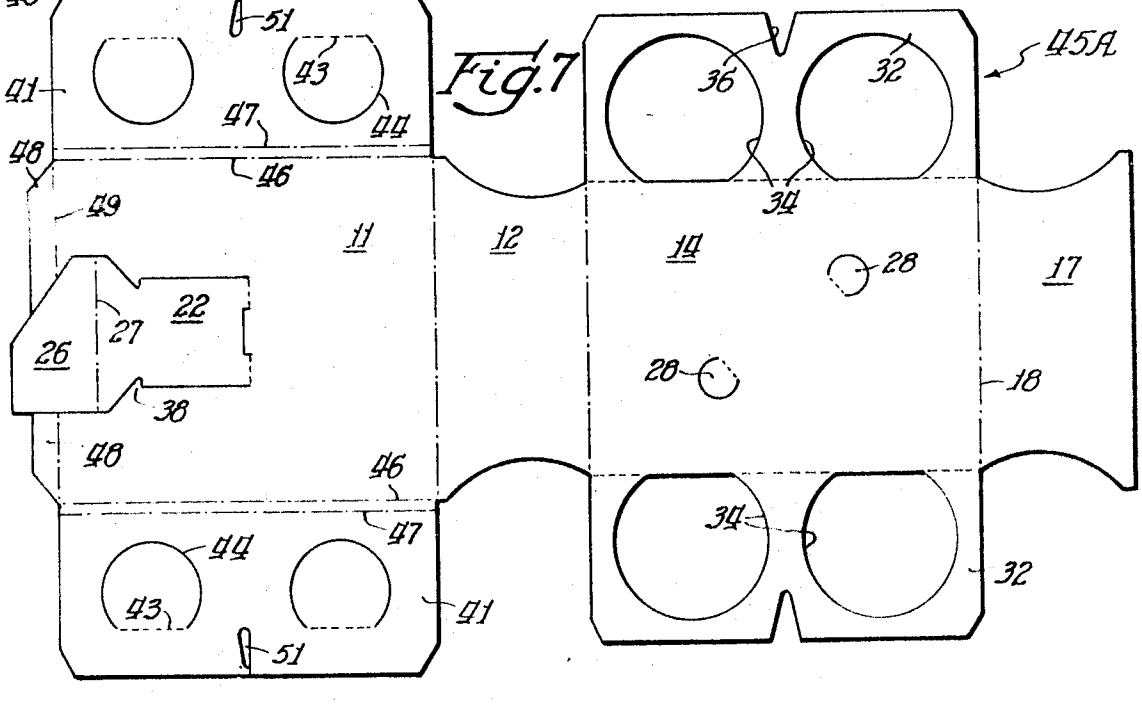


Fig. 7



CARRIER FOR DISPLAY OF CYLINDRICAL OBJECTS, SUCH AS GLASS TUMBLERS, OR THE LIKE

BACKGROUND OF THE INVENTION

1. Field of the Invention

This invention relates to carriers for chimeless containers such as drinking glasses of various shapes, the glasses being secured in the container and being displayed.

2. The Prior Art

Carriers of the prior art, which have generally been for chimed can or crown-capped bottles, have for the most part been concerned with concealing the articles against light or contact rather than the display of the same. Accordingly, it is a principal object of this invention to provide a carrier particularly adapted for the transport protection, and display of tumblers.

DRAWINGS

FIG. 1 is a perspective view of a carrier according to an embodiment of the invention, said carrier being shown with glass tumblers adapted to be carried and displayed therein;

FIG. 2 is a plan view of a cut and scored blank for forming the carrier seen in FIG. 1;

FIG. 3 is a sectional view taken along the line of 3–3 of FIG. 1 looking in the direction of the arrows;

FIG. 4 is a partial elevational view showing an embodiment particularly adapted to transport and display a tapered tumbler;

FIG. 5 is an elevational view of another form of tumbler also adapted to be used with the carrier of FIG. 4;

FIG. 6 is an elevational view of a carrier for an "on-the-rocks" or oblate spheroid type of tumbler;

FIG. 7 is a plan view of a cut and scored blank for forming the carrier of FIG. 6; and

FIG. 8 is a sectional view taken along the line 8–8 of FIG. 6 looking in the direction of the arrows.

The improved carrier according to one form of the invention is seen in FIG. 1 and is denoted by the reference numeral **10**. It is adapted to transport, protect and display a plurality of tumblers T. Carrier **10** is formed from a cut and scored blank **10A** and is comprised of a bottom panel **11** connected by a fold line **13** to a first end panel **12**, the batter being connected to a top pane **14** along a fold line **16**. A second end panel **17** connected by a fold line **18** to the top panel **14** is folded to position to be glued to a pair of glue flaps **19** connected at fold lines **20** to the bottom panel **11**, distal end **21** of the second end panel **17** being glued to the flaps **19** in a conventional manner to form a carton sleeve. End panels **17** have curved side edges **15**, so that the width centrally thereof is a minimum to the end that the tumblers may be more effectively displayed.

A central support panel **22** is defined by cut lines **23** in the bottom panel **11**, and extends between the spaced glue flaps **19** and beyond the margins of the glue flaps **19**. Central support panel **22** is adapted to be folded along a score line **24** with respect to the bottom panel **11**, and glue flap **2 6** is provided at the distal end thereof for folding with respect to the central support panel **22** about a fold line **27**. Glue flap **26** is adapted to be glued to the underside of the top panel **14** at the center part thereof.

Central support panel **22**, being connected between the top and bottom panels, also has the property of preventing the bowing of the panels under load.

Structure is provided for lifting the carrier **10** together with the tumblers T. fold-down tabs **28** being provided in the top pane **14** and defined by cut lines **29** and score lines **31**.

Locking flaps **32** for the tumblers T extend from the top and bottom panels **14** and **11**, each such locking flap **32** being foldably connected to such panels by score line **33**. Each of the flaps **32** has a partly elliptical opening **34** therein, the cylindrical wall of tumbler T extending through such opening **34**. By reason of the fact that the plane A of the flaps **32**, when

in the locking position, are inclined with respect to the axes of the tumblers T, the openings **34** must be elliptical in form, or must at least constitute the major part of an ellipse.

Structure is provided for locking flaps **32** in position and each is provided with a central notch **36** in the free end thereof, notch **36** being continuous with a slit **37** which cooperates with a locking abutment **38** in the support panel **22**. Notch **36**, slit **37** and locking abutment **38** provide structure whereby the locking flap **32** is locked at a desired angular position to grip the tumbler T.

Referring now to FIG. **4**, there is shown another embodiment referred to generally by the reference numeral **40**, it being particularly adapted to transport and display therein a tapered tumbler TT. In this form of the invention the top panel **14** has the locking flaps **32** thereof provided with larger openings than the lower flaps **32** extending from the bottom panel **11**, such being necessary to accommodate the taper of the tumblers TT. In all other respects, carrier **40** is like that shown in FIG. **1**.

The carrier shown in FIG. **4** may also be adapted to transport and display a tumbler FT having a foot F of smaller outside diameter than the remainder thereof as shown in FIG. **15**.

Referring now to FIGS. **6** to **8** inclusive there is shown another embodiment of the invention referred to be the reference numeral **45** and particularly adapted to transport and display the so-called "on-the-rocks" or oblate spheroid type of tumbler referred to by the letters ST. In this embodiment of the invention the upper panel **14** has the flaps **32** with the openings therein suitably elliptical in shape to embrace the larger diameter portion of the tumbler ST.

Bottom panel **11** has lower locking flaps **41** extending therefrom, these being foldable with respect to the bottom panel **11** by means of spaced score lines **46** and **47**. The provision of the spaced score lines **46** and **47** help to prevent bottom panel **11** from bowing under load. Each of the flaps **41** has an essentially circular tab defined by a cut line **44** and a score line **43**. In this embodiment of the invention, the locking flap **41** is folded along the spaced score lines **46** and **47** as seen in FIG. **8**, the base of the tumbler ST being accommodated in the opening defined by the cut line **44** and score line **43**.

End flap **17** is held by glue flaps **48** foldably connected to the bottom panel **11** along score lines **49**, in the fashion similar to that shown with respect to FIG. **1**.

Lower locking flap **41** is adapted to be held against the central partition **22** by locking slits **51** which enables the lower flap to embrace the sides of the central locking tab **22**.

In any of the embodiments of the invention shown herein, the locking flaps **32** and the locking flaps **41** form an angle with respect to the top and bottom panels as the case may be. This angular relationship of the locking tabs prevents displacement of the tumblers, whatever form they may be, from the carrier.

I claim:

1. A carrier for at least a pair of at least partly cylindrical objects, said carrier being formed from a cut and scored paperboard blank and comprising:
   a. top, bottom and end panels hingedly connected together to form a carrier sleeve;
   b. locking flaps foldably extending from a side of said top and bottom panels and having partly elliptical openings therein to receive upper and lower ends of said objects;
   c. each of said locking flaps being folded with respect to the panel from which it extends to occupy a plane angularly related to said panel;
   d. a central support panel extending between said top and bottom panels and having means for engaging and retaining said locking flaps in the folded condition.

2. A carrier according to claim 1 wherein said openings are of different sizes according to the configuration of said objects.

3. A carrier according to claim 1 characterized by means for locating said locking flaps at a desired angular position to grip said objects.

4. A carrier for at least a pair of drinking tumblers or the like, said carrier being formed from a cut and scored paperboard blank and comprising:

a. horizontal top and bottom panels and vertical end panels, all of said panels being hingedly interconnected to form a carrier sleeve;

b. a central support panel cut and folded from one of said horizontal panels and extending therefrom to the other of said horizontal panels and having its distal end secured thereto;

c. locking flaps foldably extending from the sides of said horizontal panels and having partly elliptical openings therein to receive upper and lower ends of said tumblers;

d. each of said locking flaps being folded with respect to the panel from which it extends to occupy a plane angularly related to said panel;

e. means for releasably securing the distal portions of said locking flaps to said central support panel thereby retaining angular relationship between said locking flaps and said horizontal panels.

5. A carrier according to claim 4, wherein said openings are of different sizes according to the configuration of said tumblers.

6. A carrier according to claim 1, wherein said central support panel has abutments cooperating with folded locking flaps to retain said flaps in folded angular condition.