Jan. 12, 1965 W. E. HANSON 3,165,200

DISPLAY CARTON

Filed March 20, 1963 2 Sheets-Sheet 1

Fig. 1.

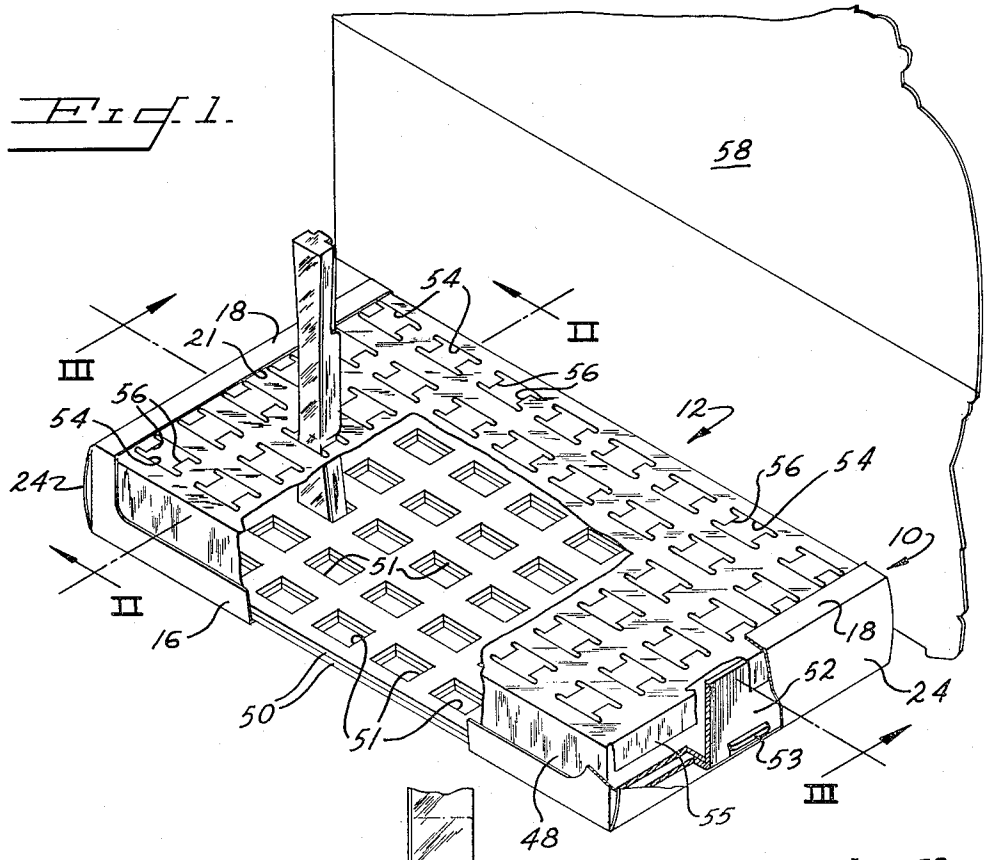
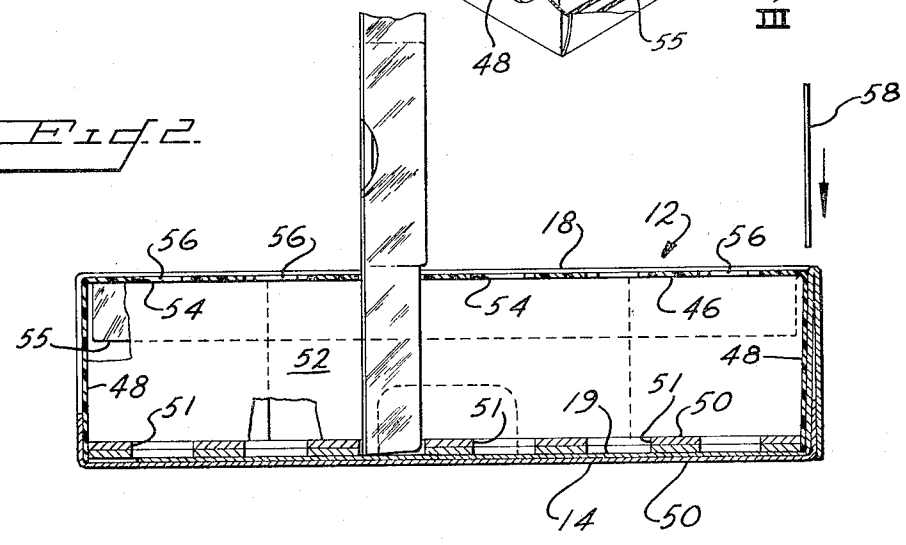



Fig. 2.




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Filed March 20, 1963 2 Sheets-Sheet 2

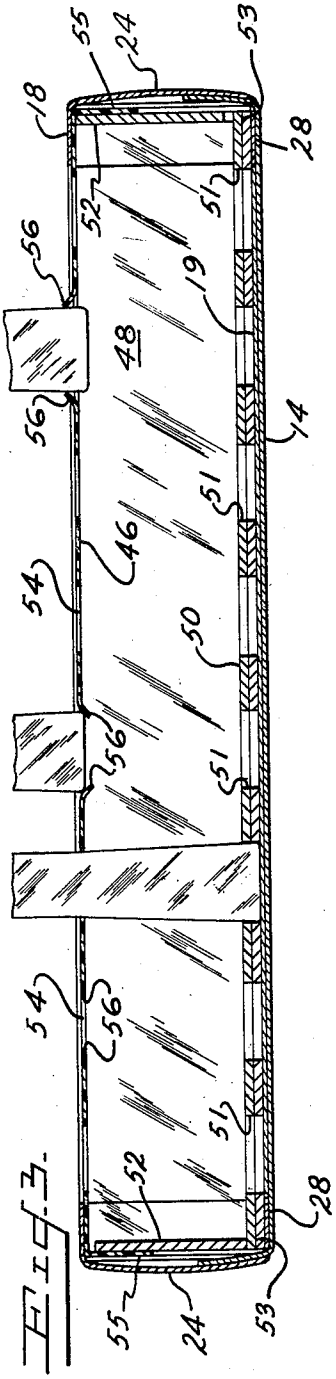



Fig. 3.

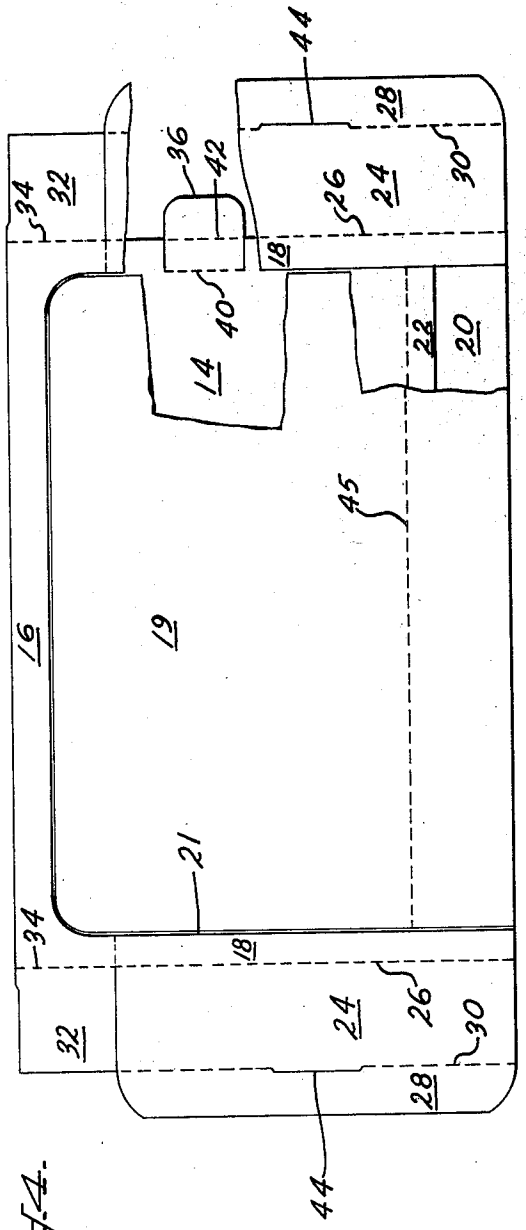



Fig. 4.

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3,165,200

# DISPLAY CARTON

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3 Claims. (Cl. 206—45.14)

The present invention relates to improvements in carton constructions and particularly cartons which are employed in point-of-purchase display of merchandise.

The object of the invention is to provide a more economical and more effective point-of-purchase display carton.

A more limited object of the invention is to provide such a carton which is particularly adapted for the display of a unique container which has been found highly desirable for toothbrushes.

The toothbrush container referred to has an elongated hour glass configuration wherein opposite side walls tapered inwardly from its lower end give it a very attractive appearance. This container presents serious problems in obtaining a neat and effective display which permits ready removal and replacement of the containers. In accordance with the present invention the display carton comprises means for positioning these containers in an upright position with substantially the entire container visible to a prospective purchaser. This feature of full product visibility is of great importance. The carton comprises spaced upper and lower walls with openings formed in the upper wall in register with recesses in the lower wall. The upper wall is provided with flexible tongues on opposite sides of each opening which may be deflected as the larger lower end of the container passes therethrough and then returned to an essentially unflexed condition contiguous with the tapered walls of the container. The containers are thus positively supported at two spaced points and thereby maintained in an attractive upright position, preferably in aligned rows.

The carton is preferably formed by the combination of an open tubed box having all of its top wall cut away, except for relatively narrow marginal portions at its opposite ends, and also preferably has a portion of its front wall cut away. When erected, this tube assumes a rectangular shape and receives a transparent member of inverted U shape which underlies the opening in the top wall of the tube and thus forms the top wall of the carton, described above. The depending legs of the transparent member are positioned to maintain the upper portion thereof in the described position. Preferably the recesses referred to above and the bottom wall of the carton are provided by one or more inserts which lie on the bottom wall of the tube and have openings therein aligned with the openings of the plastic member.

The above and other related objects and features of the invention will be apparent from a reading of the following description of the disclosure found in the accompanying drawings:

FIG. 1 is a perspective view, with portions broken away, of a carton embodying the invention;

FIG. 2 is a section taken on line II—II in FIG. 1;

FIG. 3 is a section taken on line III—III in FIG. 1; and

FIG. 4 is a view of one element of the carton shown as it would be before assembly.

Referring now to FIG. 1, the present carton is compositely formed from an erected sleeve or tube 10 and an inverted U shaped member 12 inserted therein. The tube 10 (FIG. 4) comprises a panel 14 for forming the bottom wall of the carton, panel 16 for forming the front wall of the carton, panel 18 for forming the top wall of the carton and panels 20 and 22 which are glued



together and compositely form the rear wall of the carton. A tongue 19 is struck from the top and front wall panels 16 and 18 to form an opening 21, later referred to. Panels 24 project from the top wall 18. Score lines 26 facilitate folding of the panels 24 downwardly and tabs 28 at their outer ends are defined by score lines 30 to facilitate folding of these tabs within the erected tube (see FIG. 3).

Flaps 32 project from the front panel 16 and are defined by score lines 34. Locking tabs 36 project from opposite ends of the bottom wall 14 and are partially struck therefrom being defined by a score line 40 and having an intermediate score line 42. A short tongue 44 is also struck from the tabs 28 to provide a slot therein which receives the tongues 36 when the carton is erected.

The sleeve 10 is first erected, that is, transposed from its flat condition to a rectangular tube, with the tongue 19 folded about score line 45 to lie against the bottom panel 14 and the rear panels 20, 22. The U shaped member 12 is then inserted thus formed. The member 12 comprises an upper wall 46 which underlies the portion of the opening 21 which is formed in the top wall 18 and thus, in effect, forms in part the top wall of the composite carton. The depending legs 48 (FIG. 2) of the member 12 rests on the bottom of the tube and the front leg 48 is positioned immediately behind the portion of the opening 21 which is formed in the front wall 16. Recesses are provided in the bottom wall of the compositely formed carton by a pair of inserts 50 resting on the bottom wall 14. Each of the inserts 50 has a series of aligned openings 51 therein. An upturned flap 52 at one end of each insert and a short tongue 53 projects from the opposite end of the insert. A slot is formed in each flap 52 by a short tongue struck therefrom. The inserts 50 are identically formed so that either may be disposed on top of the other and the tongue 53 received by an opening which maintains the inserts in superposed relation as they are positioned on the bottom of the carton tube by the flaps 52.

To complete the forming of the carton, the panels 24 are turned downwardly after the flaps 32 have been folded inwardly. The tabs 28 are inserted against the bottom wall 14 and then the tongue 36 is folded about the score line 32 and inserted into the opening created by the tongue 44.

Referring now again to the top wall 46 of the member 12, it will be seen that a series of aligned openings 54 are formed therein, with each opening having at its opposite ends tongues 56 which are preferably spaced from the front and rear sides of the openings 54. The openings 54 are aligned with the recesses defined by the openings in the inserts 50 in a series of rows extending laterally and from front to rear of the carton. The member 12 is also provided with downturned flaps 55 at its opposite ends for added rigidity. It will also be noted that the member 12 is preferably formed of a transparent plastic material, the selection of which would be routine to those skiled in the art, cellulose acetate butyrate being an exemplary material.

FIGS. 1 and 2 also indicate that a display card 58 may be inserted between the rear leg 48 and the rear wall of the carton to effectively present advertising matter.

Referring particularly to FIG. 3, it will be seen that the container above referred to has what might be referred to as a bulbous lower portion wherein the side walls are tapered inwardly from the lower end. The described configuration of the openings 54 is a particular advantage in permitting the ready insertion and removal of these containers, as will be evident from the displacement of the tongues 56 in FIG. 3. When the container is fully inserted the tongues are unflexed and in con-

tiguous relation with the containers to thereby maintain all of the containers in an upright position which is desirable for a neat and attractive display. However, the containers, as can be seen, can be readily removed and inserted.

The present carton also has other advantages in that it economically provides a display which enables a visual examination of substantially all of the merchandise. Thus, with substantially all of the top panel **18** and front panel **16** cut away by striking tongue **19** therefrom, even a container in the front row of openings **54** will be entirely visible, or at least substantially so, through the front leg **48** or top wall **46** of the transparent member **12**. It is in this fashion that full product visibility, previously referred to, is obtained in the display carton.

Another advantage to be recognized is that the combination of a collapsible sleeve and a U shaped transparent insert to give the composite carton form and stability and likewise attain this display feature, is economically obtained in that the sleeves may be shiped to the manufacturer in their collapsed condition requiring a minimum of space and likewise the U shaped members can be nested, again requiring the minimum of storage space in shipping.

Having thus described the invention, what is claimed as novel and desired to be secured by Letters Patent of the United States is:

1. A compositely formed carton comprising a collapsible tubular sleeve erected from a flattened condition and having bottom, top, front and rear panels defining the tube, a tongue struck from the front and top panels and forming an opening in both, said tongue lying against the rear and bottom panels of the tube, the remainder of the top panel comprising narrow mariginal portions at opposite ends threof and the remainder of the front panel comprising a narrow marginal portion extending upwardly from the bottom panel and also narrow marginal portions at opposite ends thereof, a transparent plastic member of inverted U-shape inserted within said tube and having its upper portion underlying the top panel and the opening therein and forming in part the upper wall of the carton, the legs of said insert being contiguous with the front and rear panels with the front leg forming in part the front wall of the carton and providing visual access to substantially the entire bottom wall of the carton when it is resting on a retail counter and viewed from a normal angle, said U-shaped member also having downturned stiffening flangles at its opposite ends, a pair of superposed inserts lying on the bottom of said tube and having openings therein which define shallow recesses on the bottom wall of said carton, said inserts having upturned flaps at their oposite ends to position the inserts on the bottom of the carton and the lower insert having an opening receiving a tab projecting from the upper insert to maintain said inserts in superposed relation, and panel means folded from said tube and forming the end walls of said carton, the upper portion of said U-shaped member having openings therein aligned with the recesses in the bottom wall of the carton and further having flexible, resilient tongues projecting into said openings from opposite ends thereof, and spaced from the front and rear sides of said openings, and containers positioned in said carton for display, each container being received by one of said recesses and projecting through an opening thereabove, each container having a lower end of greater width than the spacing between the tongues projecting into the opening and inwardly tapered walls which are in contiguous relation with the ends of said tongues, said tongues being flexed as the larger, lower end of the container is introduced into and removed from the carton.



2. A compositely formed carton comprising a collapsible tubular sleeve erected from a flattened condition and having bottom, top, front and rear panels defining the tube, said top panel having an opening therein defined by narrow marginal panel portions at opposite ends thereof, said front panel having an opening therein which is a continuation of the opening in the top panel and defined by a narrow marginal panel portion extending upwardly from the bottom panel and also by narrow marginal panel portions at opposite ends thereof, a transparent plastic member of inverted U-shape inserted within said tube and having its uper portion underlying the top panel and the opening therein and forming in part the upper wall of the carton, the legs of said insert being contiguous with the front and rear panels with the front leg forming in part the front wall of the carton and providing visual access to substantially the entire bottom wall of the carton when it is resting on a retail counter and viewed from a normal angle, and insert means lying on the bottom of said tube and having openings therein which define shallow recesses on the bottom wall of said carton and panels, means folded from said tube and forming the end walls of said carton, the upper portion of said U-shaped member having openings therein aligned with the recesses in the bottom wall of the carton and further having flexible resilient tongues projecting into said openings from opposite ends thereof and containers positioned in said carton for display, each container being received by one of said recesses and projecting through the opening thereabove, each container having a lower end of greater width than the spacing between the tongues projecting into the opening, and inwardly tapered walls which are in contiguous relation with the ends of said tongues, said tongues being flexed as the larger, lower end of the container is introduced into and removed from the carton.

3. A compositely formed carton comprising top, bottom, front, rear and end walls, said top wall and said front wall have connected openings therein and a transparent plastic member underlying said openings and compositely forming the top and front walls, means forming a plurality of shallow recesses on the bottom wall of said carton, said plastic member having openings therein aligned with the recesses in the bottom wall and further having flexible, resilient tongues projecting into said openings from opposite ends thereof, and containers positioned in said carton for display, each container being received by one of said recesses and projecting through the opening thereabove, each container having an end of greater width than the spacing between the tongues projecting into the openings and inwardly tapered walls which are in contiguous relation with the ends of said tongues, said tongues being flexed as the larger, lower end of the container is introduced into and removed from the carton.


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