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Sarasota, FL (US)(51) **Int. Cl.**
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B65D 85/72 (2006.01)(72) Inventors: **R. Charles Murray**, Sarasota, FL (US);
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TX (US)(52) **U.S. Cl.**
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(2013.01); **B65D 85/72** (2013.01)(21) Appl. No.: **16/920,787**(22) Filed: **Jul. 6, 2020****Related U.S. Application Data**(60) Provisional application No. 62/870,260, filed on Jul.
3, 2019.(57) **ABSTRACT**

A vial formed two pouches of thermoformed material has a planar top portion and a lower portion with a bulbous portion. The top portion has a notch forming a hook adapted to receive the top of a bottle to hold the vial on the bottle. The bulbous portion defines a cavity for holding contents to be added to the bottle. A line of weakening extends across the vial for opening.

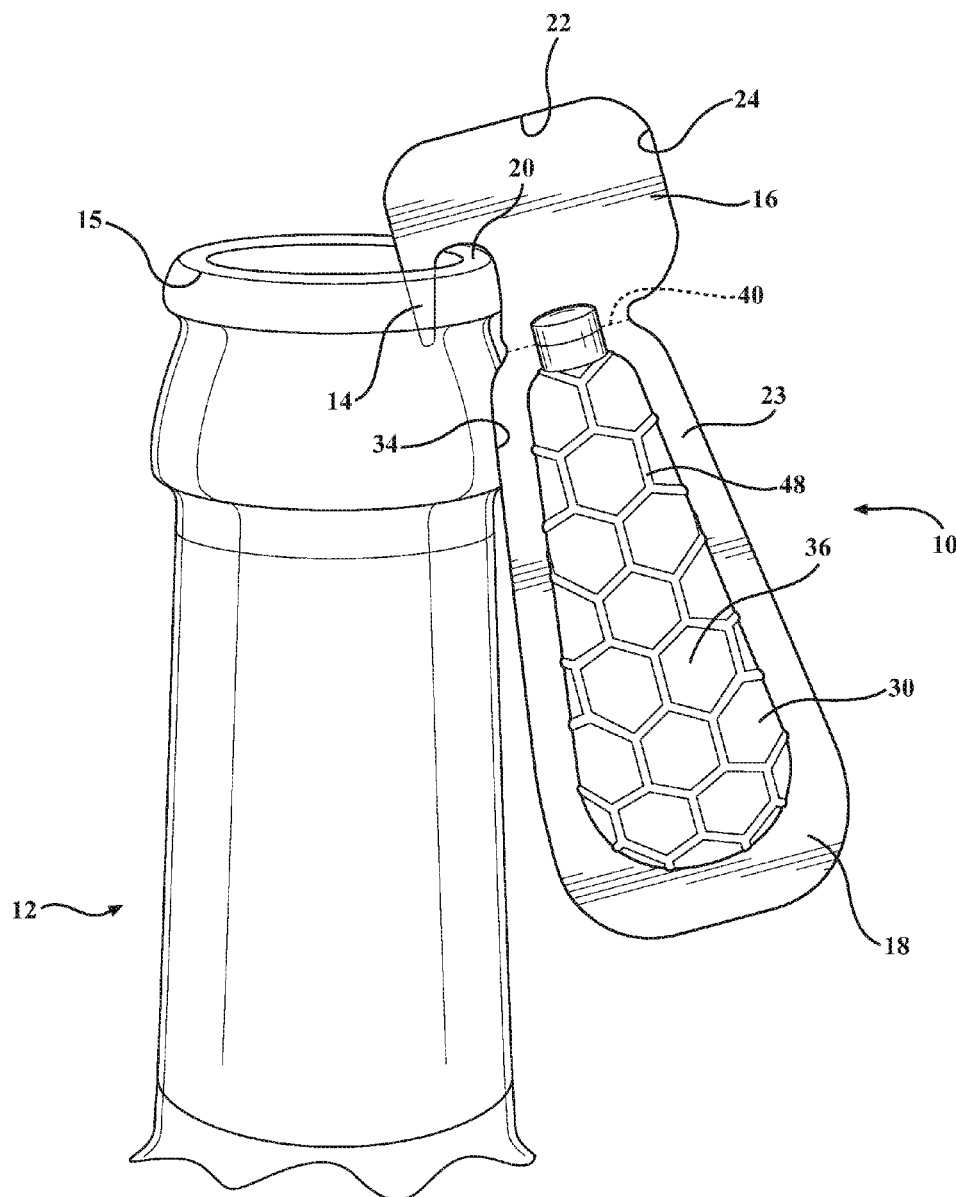


FIG. 1

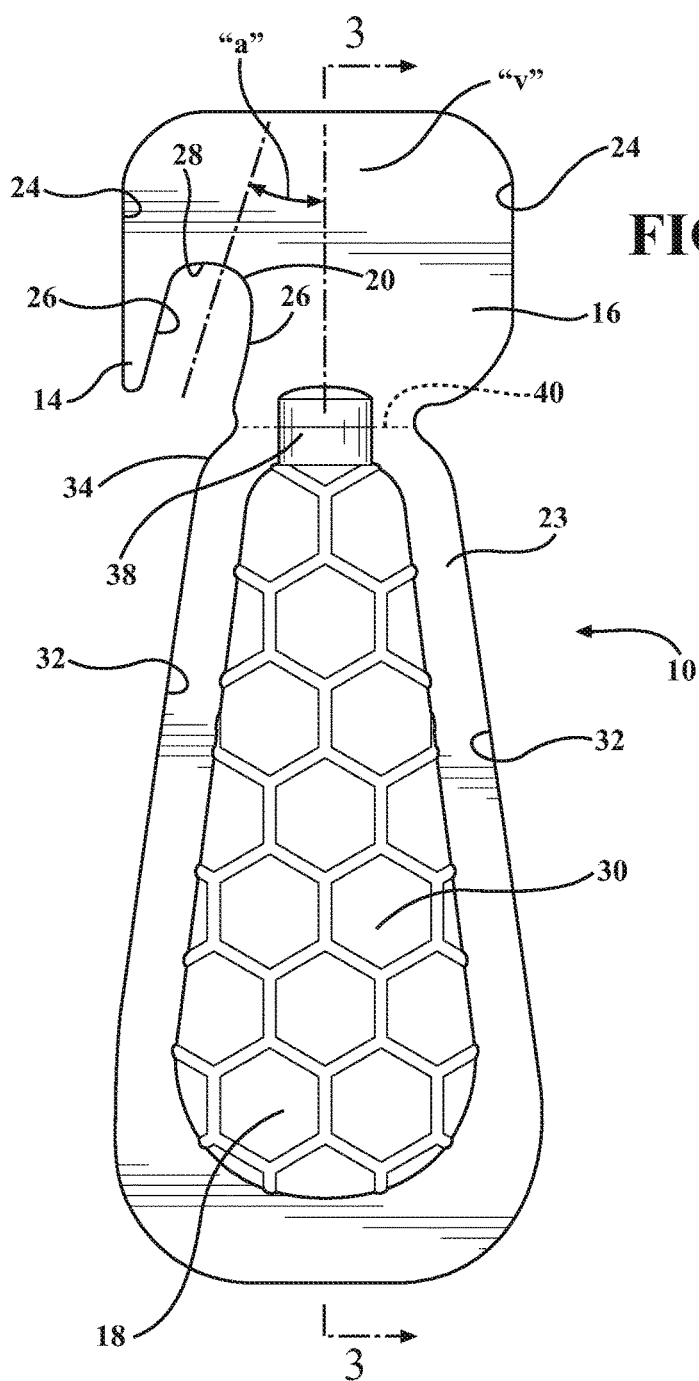
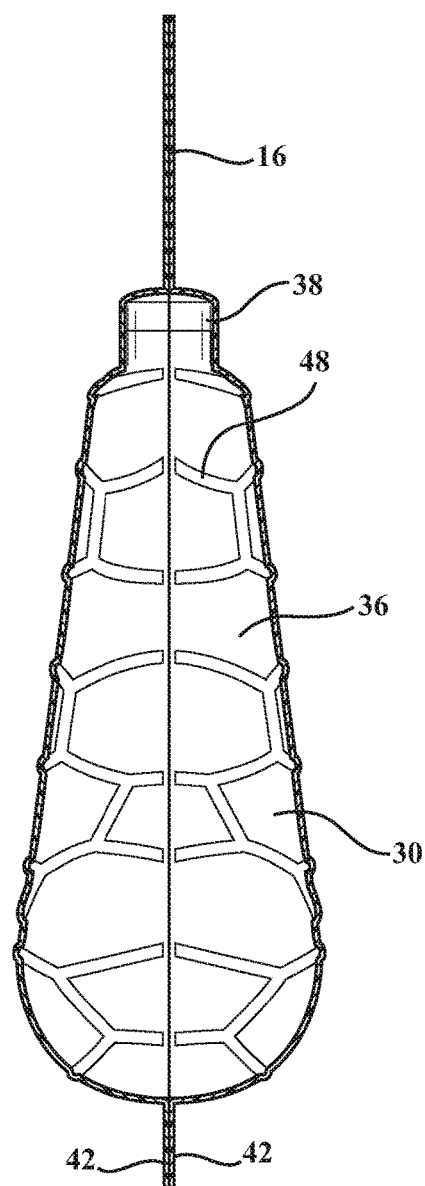


FIG. 2

FIG. 3



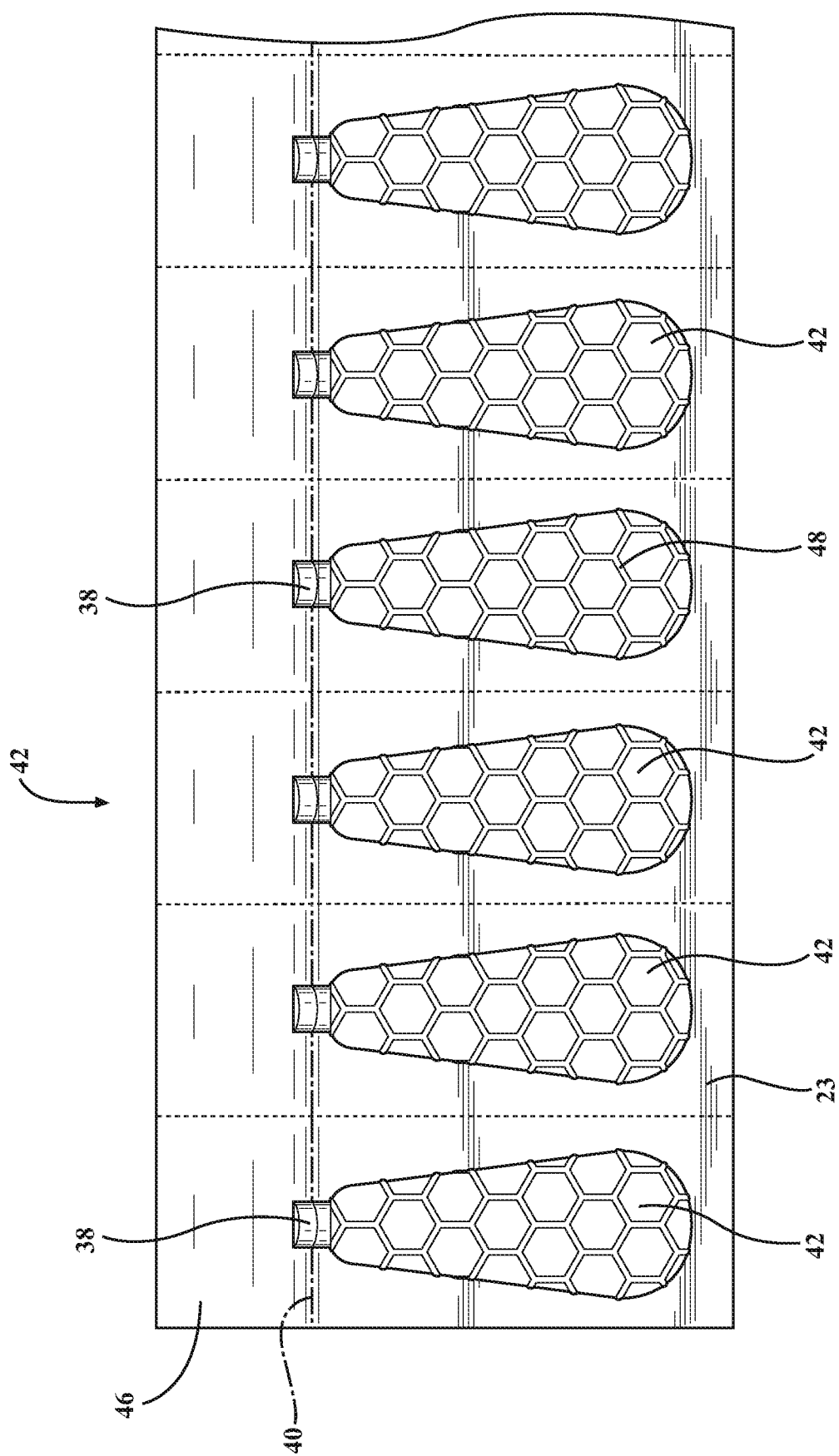


FIG. 4

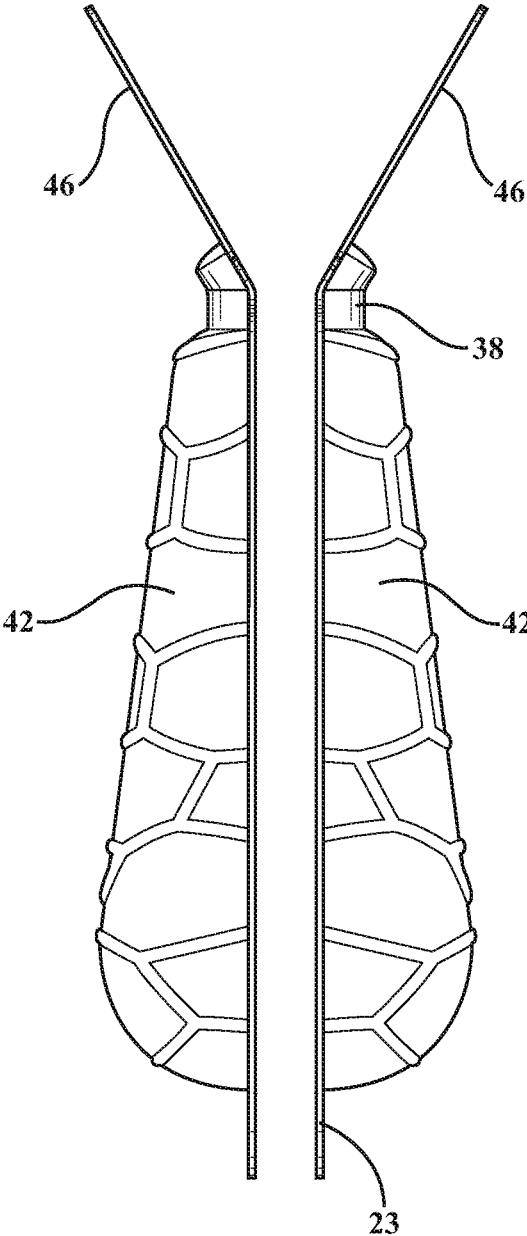


FIG. 5

VIAL WITH HOOK

CROSS-REFERENCE TO RELATED APPLICATIONS

[0001] The instant application is a U.S. utility application which claims the benefit of 62/870,260 filed Jul. 3, 2019, the entire contents of which are incorporated herein by reference.

FIELD OF THE INVENTION

[0002] A vial for hanging on a bottle top and more particularly a vial for holding product for adding to a beverage.

BACKGROUND OF THE INVENTION

[0003] Many consumers wish to add products such as dietary supplements, vitamins to their beverages. These products may be vitamins, dietary supplements and CBD oil, etc. Many of these products are best when added to beverage liquid just prior to drinking. Some of these products lose their strength if added to the beverage before drinking. Additionally, it is desirable to provide a component in an amount which is proper to be mixed with volume of the liquid. Thus, it would be advantageous to have a container which could be used in a bar or restaurant to deliver the product to the consumer.

SUMMARY OF THE INVENTION

[0004] A vial for hanging on a top of a bottle includes a body with an upper portion with a hook and a lower portion having a bulbous portion defining a cavity for holding a product. The hook is formed by a notch extending upwardly from a bottom of the top portion. The lower portion has a peripheral edge which extends parallel with the axis of the notch to position the vial on a neck portion of the bottle. The body is formed of two thermoformed panels.

[0005] described herein, including the detailed description which follows, the claims, as well as the appended drawings.

BRIEF DESCRIPTION OF THE DRAWINGS

[0006] FIG. 1 is a perspective view of a vial for use of a bottle top in accordance with the invention;

[0007] FIG. 2 is a frontal view of the vial in accordance with the invention;

[0008] FIG. 3 is a sectional view taken along lines 3-3 of FIG. 2;

[0009] FIG. 4 is a view of a panel before assembly; and

[0010] FIG. 5 is a exploded side view of two panels.

DETAILED DESCRIPTION OF THE EMBODIMENTS

[0011] As shown in FIGS. 1-3, a vial 10 for a product to be added to beverages contained in bottle 12 has a hook 14 for hanging on a top 15 of the bottle 12. The product is, typically, an additive, such as vitamins, CBD oil, of which are to be added to the beverage. The product may be liquid or granular. The vial 10 has a top portion 16 and a lower portion 18 for holding a product. The top portion 16 has an upper edge 22 extending between a pair of side edges 24. The hook 12 is formed by one of a pair of side edges 26

forming a notch 20 which extends upwardly from a bottom 27 of the top portion 16 of the vial 14 and one of the side edges 26.

[0012] The pair of sides 26 extend inwardly to a curved portion 28 to define an inverted U-shape. The sides 26 are generally parallel and the axis "a" extends at an angle of approximately 7-11° with respect to a vertical axis "v" of the vial to position the vial on the bottle 12. The notch 20 has a width and depth which is formed to accommodate the dimensions of the bottle top 15 of a typical glass container, such as a beer bottle. In the preferred embodiment, the sides 26 are spaced apart approximately 5.3 mm to freely accept the top of the bottle.

[0013] As shown in FIGS. 2 and 3, the lower portion 18 has a flat peripheral portion 22 which extends around bulbous portion 30. The peripheral portion 23 has a pair of opposed side edges 32 which extend upwardly towards the top portion 16. The side edge 32 beneath the hook 14 has an abutment portion 34 formed to rest on a portion of the neck of the bottle keep the vial in a generally vertical alignment.

[0014] The bulbous portion 30 defines a cavity 36 for holding the product. The top of the bulbous portion 30 has a cylindrical neck portion 38 at the top. A line of weakening 40 extends across the neck portion 38 to permit the top portion 16 to be separated from the lower portion 18 and provide access to the contents of the bulbous portion 30 through the neck portion 38. The planar top portion 16 is grasped to bend the top portion 16 downwardly to open the vial 10.

[0015] As shown in FIGS. 4 and 5, the vials are formed from two rectangular panels 42 of a thermoformed laminate material. A suitable laminate is polyvinylchloride/ethylene vinyl/polyethylene "PVC/EVOH/PE. Each panel has a series of depressions 44 are heat molded both panels 42. Alternatively, one panel may be flat. A top portion 46 of the panel 42 is angled downwardly. The depressions 44 are spaced apart and have the shape of the bulbous portion 30. A decorative pattern 48 may be molded into the depression 42.

[0016] As shown in FIG. 5, the two panels 42 are overlaid and are bonded together along the peripheral portion 23 of the bottom portion by heat sealing. However, depending upon materials used, other method of sealing may include ultrasound welding or glue. After the peripheral portions of the panels around the bulbous portion are sealed together, the top portions 46 are angled apart to form a V shape extending down to an opening formed by the neck portion 38 to provide access to the cavity. The bonded pairs of panels are then fed into a filling machine which deposits the desired amount of the product into the cavity through the neck. The panels are then moved to a seal machine which then uses seal bars to push the top portions 46 of the panels together and then seal the top portions 46 together. The sealed panels are then moved to a die cutter. Individual vials are formed by dies which cuts the shape of the top, the hook and trim the outer peripheral edges to form a desired shape of the vial. The line of weakening is also cut. The line of weakening has a depth of one half of a thickness of one panel 42.

[0017] Thus is disclosed a new vial for containing dry or liquid components which has a hook to hang the container on the top of a bottle so that the product may be served at the same time as the open bottle. The vial is easy to use and inexpensive.

We claim:

1. A vial for hanging on a top of a bottle comprising:
a pair of panels affixed together forming a body having a top portion and a bottom portion, the top portion having a side edge and a notch forming a hook, the bottom portion having a bulbous portion defining a cavity for holding contents and a parting line exiting across the bulbous portion opening of the cavity.
2. The vial of claim 1, wherein the panels are thermoformed material.
3. The vial of claim 1, wherein the top portion has a bottom and an upper edge wherein the notch extends towards the upper edge.
4. The vial of claim 1, wherein the notch extends at an angle of 7 to 11 degrees with respect to a vertical axis of the vial.
5. The vial of claim 1, wherein the notch is defined by a pair of spaced apart generally parallel edges.
6. The vial of claim 1, wherein the bulbous portion has a spout portion and the parting line extends across the spout portion.
7. The vial of claim 1, wherein the laminate is PVC/EVOH/PE.
8. The vial of claim 1, wherein the top portion is generally planar.

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