June 2, 1964 G. E. STRUBLE 3,135,453

CONTAINER WITH INTERMEDIATE PARTITION PANEL

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FIG. 1

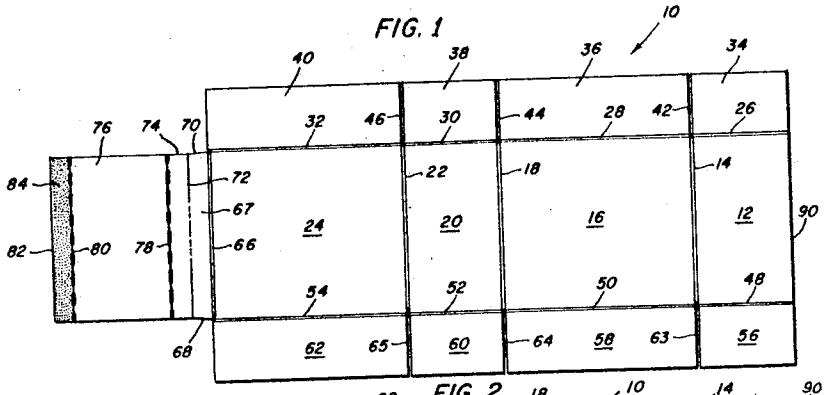


FIG. 2

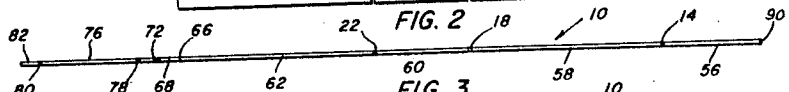


FIG. 3

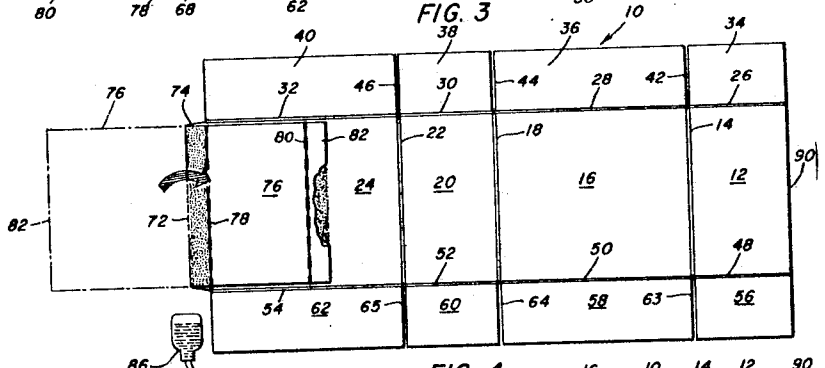


FIG. 4

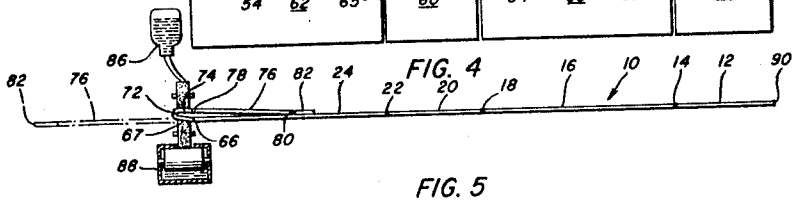


FIG. 5

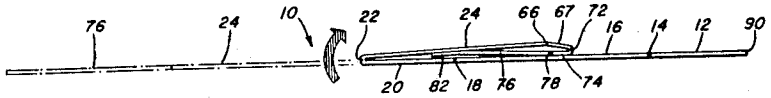
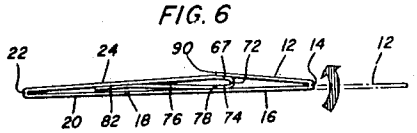


FIG. 6



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FIG. 7

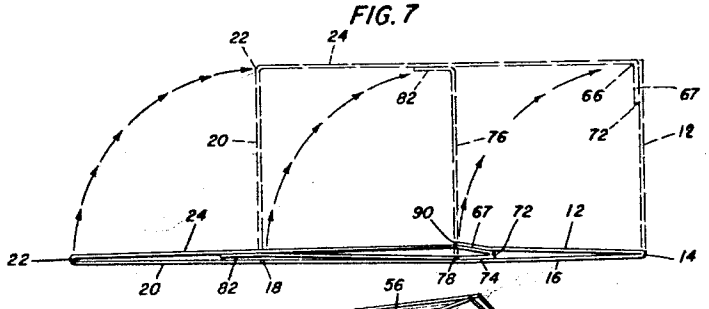


FIG. 8

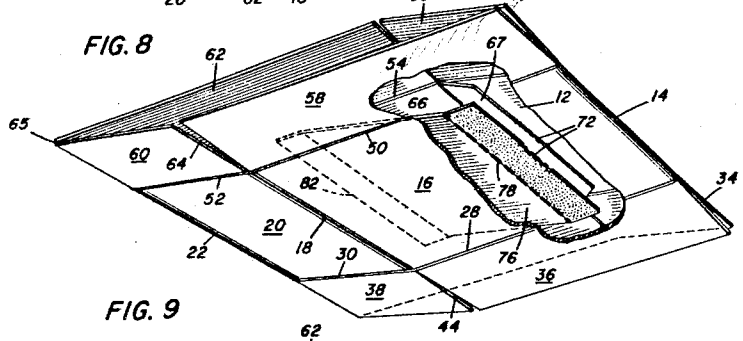
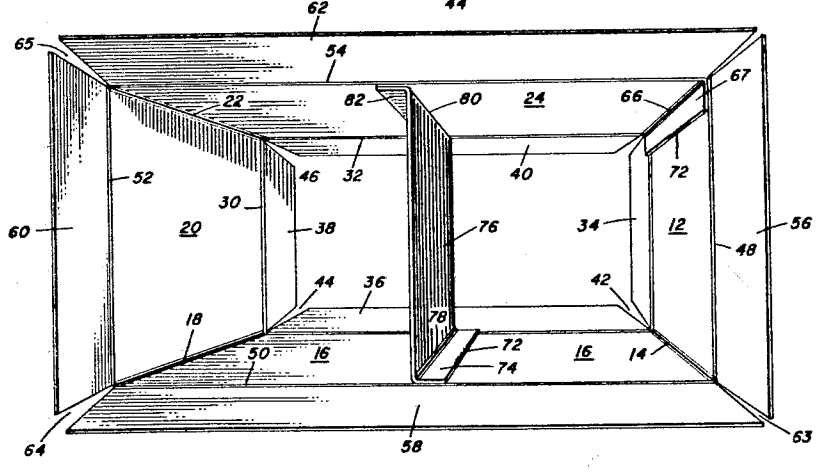


FIG. 9



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CONTAINER WITH INTERMEDIATE PARTITION PANEL

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Continuation of application Ser. No. 115,415, June 7, 1961. This application Sept. 5, 1962, Ser. No. 221,530
6 Claims. (Cl. 229—27)

This invention relates generally to partitioned or compartmentized containers of the character especially adapted to hold a plurality of articles or different materials; see for example U.S. Letters Patent to Miessler, Sr., #2,940,653, dated June 14, 1960.

This application constitutes a continuation of now-pending application Serial No. 115,415 filed June 7, 1961, now abandoned in favor of the present application.

A primary object of this invention is to provide a one-piece blank construction which, when assembled, automatically orients and positions a partition panel between opposite sides of a container.

A further object of the present invention is to provide a novel method of assembling a carton blank to provide a container which, when erected, will incorporate a partition panel affording adjacent compartments in the container.

Another object of the invention is to provide economies in use of material, space used for storage, and a reduction of manipulative steps in the assembly of a partitioned container.

Other objects and the nature and advantages of the instant invention will be apparent from the following description taken in conjunction with the accompanying drawings, wherein:

FIG. 1 is a plan view of the novel blank of the invention;

FIG. 2 is a side elevation of the novel blank;

FIG. 3 is a plan view similar to FIG. 1, showing the first step of assembly of the invention;

FIG. 4 is a side elevation of FIG. 3, illustrating the second step of assembly of the invention;

FIG. 5 is a view similar to FIG. 4 showing the next step of assembly of the invention;

FIG. 6 is a view similar to FIGS. 4 and 5 showing the next manipulative step of the invention;

FIG. 7 is a side elevation showing the last manipulative step of the invention;

FIG. 8 is a perspective view of the novel folded partitioned container, portions being broken away for the purpose of showing details; and

FIG. 9 is an end perspective view of the partitioned container erected from the condition shown in FIG. 8.

Referring to the drawings in detail, a substantially rectangular blank of paperboard material or the like is indicated generally at **10** and comprises, in order, a first rectangular end panel **12** hingedly connected by a fold line **14** to a first side panel **16** which is hingedly connected by a fold line **18** to a second end panel **20**, which is hingedly connected by a fold line **22** to a second side panel **24**. Hingedly connected to the upper marginal edges of the panels **12**, **16**, **20** and **24**, at fold lines **26**, **28**, **30** and **32**, respectively, are top forming flaps **34**, **36**, **38** and **40**, respectively, which are separated by cut lines **42**, **44** and **46** which are in alignment with the fold lines **14**, **18** and **22**, respectively. Hingedly connected to the fold lines **48**, **50**, **52** and **54**, at the bottom of the respective panels **12**, **16**, **20** and **24**, are bottom forming flaps **56**, **58**, **60** and **62**, respectively. The bottom forming flaps **56**, **58**, **60** and **62**, are separated by cut lines **63**, **64** and **65**, which are respectively in alignment with the fold lines **14**, **18** and **22**.

Hingedly connected by a fold line **66** at the side margin of the second side panel **24** is a panel including a container-glue flap **67**, the opposite ends **68** and **70** of which are tapered slightly away from the fold lines **32** and **54** to dispose the glue flap below the upper and lower margins of the assembled container.

Hingedly connected by a line of separation or foldable tear line **72** is a first partition glue flap **74** extending the length of one margin of a rectangular partition panel **76** and being hingedly connected thereto by a fold line **78**. Hingedly connected at the opposite side margin of the partition panel **76** at a fold line **80** is a second partition glue flap **82**.

The inner surface **84** of the partition glue flap **82** will have deposited thereon a layer of suitable adhesive material by means of automatic gluing apparatus; see FIG. 1. After this has been accomplished, the partition panel and partition glue flap **74** are folded along the tearable fold lines **72** into juxtaposed relation on the second side panel **24** in the manner shown in FIGS. 3 and 4. After this has been accomplished, glue is applied to the exposed sides of the container glue flap **67** and first partition glue flap **74** which are disposed in juxtaposition, as seen in FIGS. 3 and 4. The glue can be deposited, for example, by means of a conventional, lower glue pot-and-wheel **88** and an upper, glue bottle-and-wheel **86** as seen diagrammatically in FIG. 4, or any other suitable means may be utilized.

After glue has been disposed on opposite sides or outer exposed surfaces of the glue flaps **67**, **74**, the panel **24**, with the partition panel **76** attached thereto, is folded into overlying relationship with respect to the second end panel **20** disposing the glue-applied surface of the glue flap **74** onto an intermediate portion of the first side panel **16**, see FIG. 5. After this has been accomplished, the first end panel **12** is folded on the hinge line **14** toward the exposed surface of the glue flap **67** of the container and the marginal edge **90** of the first end panel will be secured in overlying relationship to the container glue flap **67**.

It will be noted that the side panels **16** and **24** are of the same dimensions, and the end panels **12** and **20** and the partition panel **76** are of an equal width.

As seen in FIG. 6, the assembled carton is illustrated; however the tear line **72** is not severed at this time.

The assembled position of the parts is shown in FIG. 7. When the first and second side panels **16** and **24** are disposed in parallel relationship, and the end panels are also disposed in parallel relationship to form a rectangular container, the tear line **72** will be severed, and the partition panel **76** will move to a parallel position with respect to the end panels **12** and **20**, see FIGS. 7 and 9. After this has been accomplished, the top and bottom flaps **34–40** and **56–62** may be oriented into their proper position.

Thus it will be noted that through the expedient of constructing a single unitary blank of the character described, a partition panel is provided which is oriented into its proper position of assembly during the erection of the container, this expedient requiring no special manipulative steps, and merely involving a single one-piece blank rather than separate parts comprising the container per se and the partition per se.

It will be obvious to those skilled in the art that various changes may be made without departing from the spirit of the invention and therefore the invention is not limited to what is shown in the drawings and described in the specification but only as indicated in the appended claims.

What is claimed is:

1. A unitary blank of paper product material for producing a container with an intermediate partition ex-

tending between opposed side walls comprising a single sheet of paper product material including in order a first side panel, a first end panel, a second side panel, a second end panel, a container glue-flap, a first partition panel glue-flap, a partition-panel, and a second partition-panel glue-flap, said end panels and partition-panel being of the same width, mutually parallel fold lines connecting said end panels, side panels and container-glue flap to each other, fold lines connecting said partition-panel glue-flaps to said partition-panel, said last-mentioned fold lines being parallel to the fold lines connecting the end panels, side panels and container glue-flap to each other, a tear line between said container glue-flap and said first partition panel glue flap, one side of said container glue-flap and first partition panel glue-flap comprising means for receiving an adhesive material thereon for respective securement to said first end panel and said first side panel when folded in overlying relationship to each other, said second partition glue flap including a glue receiving surface opposite that of the container and first partition panel glue flaps for securement on the second side panel when the container glue-flap and first partition panel glue-flap are in overlying relationship with respect to each other.

2. The structure of claim 1, said end panels and side panels being rectangular.

3. A folded partitioned container comprising an end and side panel hingedly connected to each other, a second end and side panel hingedly connected to each other and to the first mentioned end and side panel for forming a container having a rectangular cross section, one of said side panels including a glue flap adhesively secured to the adjacent end panel, a partition panel interposed between said first and second mentioned end and side panels, said partition panel including a first glue flap secured to an intermediate portion of said first mentioned side panel and a second glue flap secured to an intermediate portion of said second mentioned side panel, said second glue flap of the partition panel and the glue flap of said first mentioned container side panel being

hingedly connected along a tear line formed therebetween, and said last mentioned glue flaps being in juxtaposed relation.

4. A unitary blank of paper product material for producing a container with an intermediate partition extending between opposed inner surfaces of walls thereof comprising a single sheet of paper product material including in order, two pairs of rectangular wall panels secured on parallel hinge score lines for forming opposed walls of a rectangular container, said wall panels of one pair being disposed at opposite side edges of one of said panels of said other pair, one of said panels having hingedly secured along the side edge thereof, in order, a combined container glue-flap and first partition panel glue-flap, a partition panel and a second partition panel glue-flap each connected by hinge lines parallel to the hinge lines of said two pairs of wall panels, said combined container glue-flap and first partition panel glue-flap including an intermediate portion parallel to said hinge lines and forming a line of separation between said first partition panel glue-flap and said container glue-flap.

5. The blank of claim 4 wherein said partition panel is of a width at least equal to that of one of said pair of wall panels.

6. The blank of claim 4 wherein said partition panel glue-flaps include opposed adhesive-receiving surfaces for receiving an adhesive thereon for attachment on opposed inner surfaces of the erected container walls, said container glue-flap including a single glue-receiving surface upon which adhesive is applied.

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