United States Patent

[11] **3,570,745**

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[54] **RECLOSEABLE LID FOR A CONTAINER FOR POWDERED CHEMICALS AND THE LIKE**
3 Claims, 5 Drawing Figs.

[52] **U.S. Cl.** **229/17**
[51] **Int. Cl.** **B65d 5/72**
[50] **Field of Search** 229/17

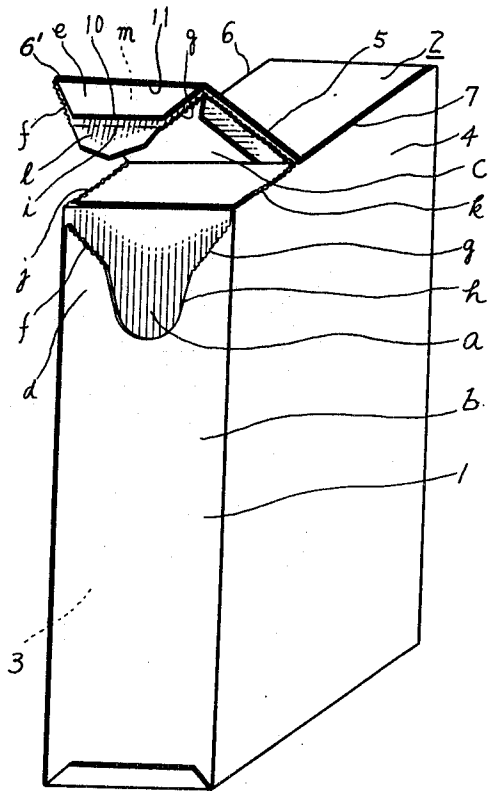
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Attorney—Wenderoth, Lind and Ponack

ABSTRACT: One of the sidewalls of a rectangular container has a double layer of inner and outer walls. The upper portion of the outer wall is bent and extended beneath the inside of a top wall and pasted thereto. The upper side portions of the outer wall are provided with a notched line. Also the end portions of the top wall near said double layer are provided with notched lines. By severing and opening said notched line and lines, the lid of a container for powdered chemicals and the like can be opened. And even after its lid has been opened, it is maintainable in its closed condition by inserting the tongue into behind said double layer.



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SHEET 1 OF 2

FIG. 1.

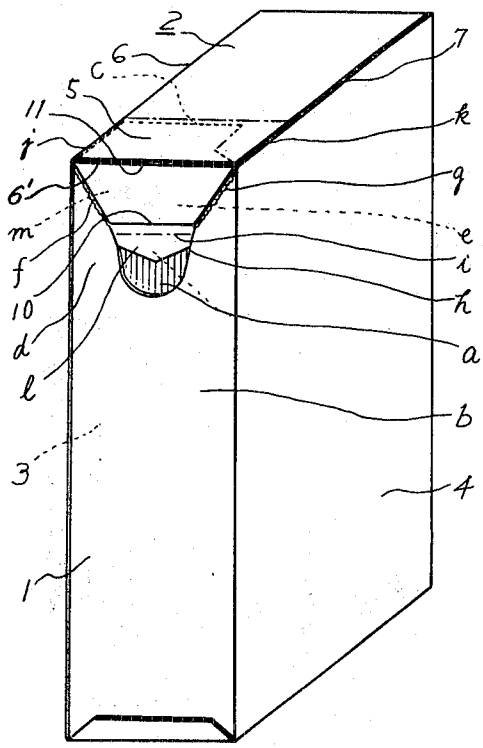


FIG. 2.

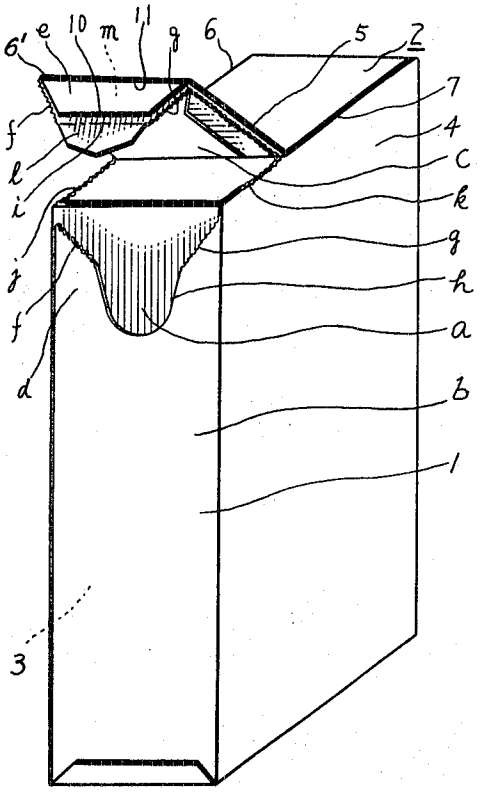


FIG. 3.

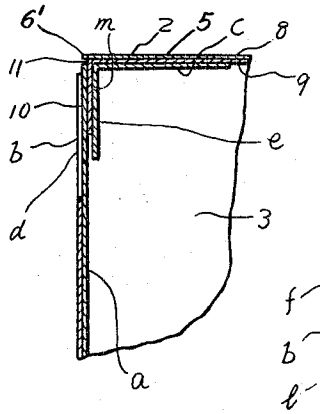
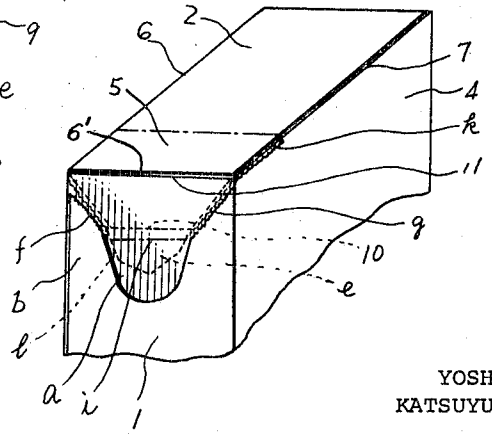


FIG. 4.

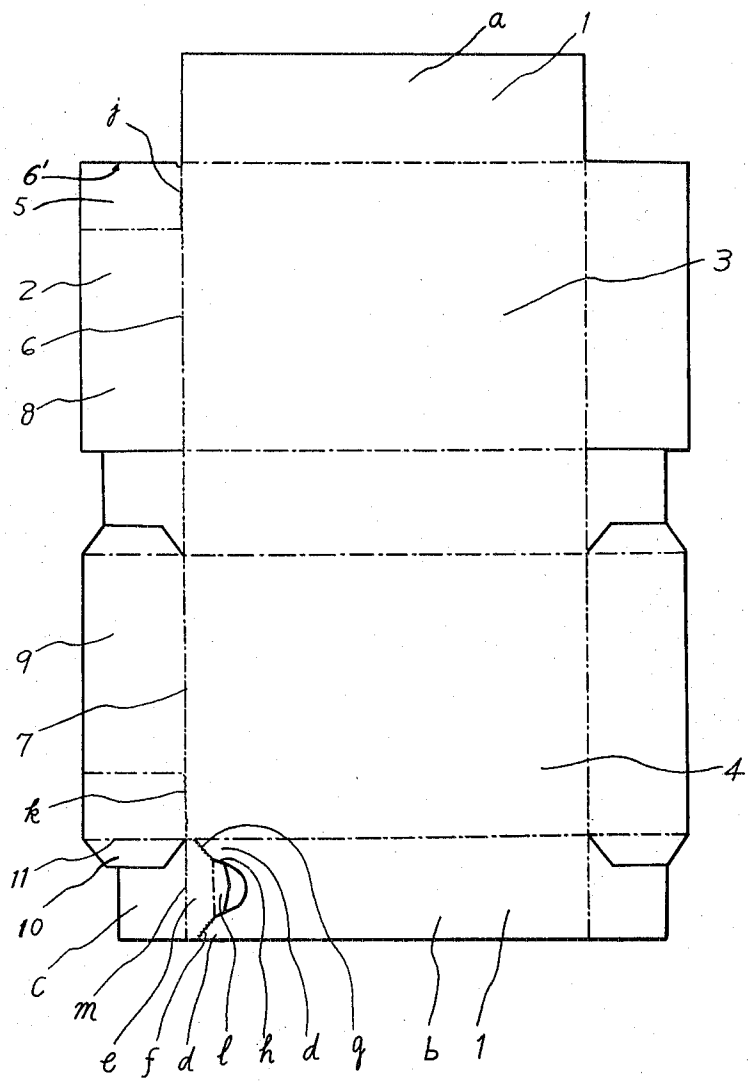


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FIG. 5.



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RECLOSEABLE LID FOR A CONTAINER FOR POWDERED CHEMICALS AND THE LIKE

This invention relates to a recloseable lid of a container for powdered chemicals and the like. An object of this invention is to provide a container which enables its user to open its lid initially by only pulling the device lightly with his fingers. Another object of this invention is to provide a container which is maintainable in its closed condition even after its lid has been opened, and which is also able to prevent spillage of its contents in the event it falls down after its lid has been initially opened and reclosed.

Heretofore the known type of container for cleanser and other powdered chemicals usually had such a construction that both of its sidewalls had only a single layer and not a double layer, wherein the upper portion of one of the sidewalls was provided with a tonge-shaped notched line, and that the ends of its top wall were provided with notched lines, each of which was continuous with said tonge-shaped line. In opening of such known containers said tongue-shaped portion was psh pushed, and the notched lines were severed and opened, forming an open mouth along the upper portion of the sidewall and the portions of the top wall, and its contents were pourables pourable out of the open mouth. Thus, it could accomplish the purpose of opening the lid. In opening it, however, the lid was ps pushed inwardly and severed. Thus, it had a disadvantge that its operation was difficult and smooth pouring of the contents was often precluded by the lid being bent inwardly. Furthermore, when its lid was once opened, it could not be closed tightly again, because its opening was effected by practically breaking the lid. Thus, when it was once opened, it was left as it was, and in the event it fell down, the remainder of its contents was split. Thus, it had a disadvantage that it tended to waste its contents and stain a floor when it fell down.

The container of this invention removes such disadvantages. In opening it, an edge of a tongue is held between its user's fingers and pulled outwardly. Then, notched lines are severed and the lid is opened. This method is much simpler than the conventional method. What is more, even after its lid has been opened, its lid can be easily closed by inserting the tongue from the upper portion of an inner wall of a sidewall somewhere behind or inside of the inner wall, as shown in FIG. 3. Therefore, in the event that the container falls down, the remainder of its contents will not be spilt. Unlike the conventional container, it does not have the disadvantage of wasting its contents or staining a floor.

In the accompanying drawings:

FIG. 1 is a perspective view of apparatus embodying this invention when it is in its manufactured closed condition, and before it is initially opened;

FIG. 2 is a perspective view of the same when it is initially opened;

FIG. 3 is a sectional view of principal parts when apparatus embodying this invention is closed again;

FIG. 4 is a perspective view of the apparatus embodying this invention when it is reclosed;

FIG. 5 is a developmental view of the carton or container blank.

Referring now to the drawings which show one embodiment of this invention, an end wall 1 on the opening side of a container has a doubler layer of inner and outer walls *a* and *b*. An extension *c* is integral with the outer wall *b* and is extended from the upper edge thereof and is bent and inserted beneath a lower top wall 2 and pasted thereto. The upper end portions *d* of the outer wall *b* are demarcated by a tongue *e*. The left and right sides of the body *m* of the tongue *e* are notched along lines *f* and *g*. An edge *l* of said tongue *e* is separated from the outer wall *b* by a cut *h* so as to be picked up. A fold *i* is placed between the body *m* and the edge *l* of the tongue *e*.

Upper portions of a front wall 3 and a rear wall 4 are extended respectively as wide as the width of the top wall through means of folds 6 and 7. Such extensions are designated as an upper wall 8 and the lower top wall 9 respectively. The lower top wall 9 is placed just beneath the upper top wall 8 and pasted together to form a tightly closed top wall 2. Notches *j* and *k* are made along portions of said folds 6 and 7 near the sidewall 1. The numeral 5 designates an openable portion of the upper top wall 8. The openable portion 5 projects slightly at 6' (FIG. 5) to cover the upper portion of the inner wall *a*.The numeral 10 designate a paste covered portion of the lower top wall 9 near the sidewall 1. Said paste covered portion 10 is extended through a fold 11 and serves to paste the outer surface of the tongue *e* and the upper surface of the extension *c* together.

The device of this invention has such a construction as has been described above. In opening the lid of a container, the tongue *l* is not pressed in an inward direction. The edge *l* of the tongue *e* is so arranged as to be picked up independently of the body *m* by means of the fold *i*. In opening it, therefore, the edge *l* of the tongue *e* is held between its user's fingers and pulled. Then, the notched lines *f*, *g*, *j* and *k* are easily severed so as to open the tongue *e* and the lid member 5 outwardly and upwardly. Thus, the opening operation of the container of this invention is much easier than that of the conventional container, and the container of this invention has remarkable advantages. What is more, as the end wall 1 is also provided with the inner wall *a*, the end wall 1 does not open even after the lid member 5 and the tongue *e* have been opened. Thus, only the top wall is opened with the inner wall being closed. If, therefore, the edge *l* of said tongue *e* is inserted somewhere inside the upper portion of said inner wall *a*, as shown in FIG. 3, the open portion of the top wall 2 is easily placed in a closed condition. Even if the container of this invention falls or is dropped while it is being handled, powdered chemicals which are in it will not be spilled, and the container will maintain in its closed condition.

Besides, the openable portion 5 of the top wall 2 is provided with a projection 6' which juts out slightly to cover the upper portion of the inner wall *a*. Thus, when the tongue *e* is inserted into the inner wall *a*, the said projection 6' prevents the said tongue *e* from being hidden therein, and the container can maintain in its closed condition in an orderly manner.

We claim:

1. A reclosable carton formed from a one piece blank having a series of connected rectangularly arranged top, bottom, side and end closure walls to form a closed and reclosable carton, comprising reclosable opening tab means (e) formed at the juncture of a top and end wall with the opening end and top walls having at least portions thereof comprising inner and outer laminations of carton fabricating material, the inner lamination of said end wall terminating at its upper or top end substantially flush with the juncture of said end and top walls; a potential carton opening and reclosing tab (l) formed primarily in the outer lamination of said end wall by predetermined cut out and weakened lines of demarcation, said tab including a fold line (m) corresponding to said juncture of said end and top walls, and further including an integral extension (c) of said end wall outer lamination which terminates at a distance beyond said fold line (m) not in excess of the top width of the carton, and which extension (c) is adapted to be folded along said fold line (m) and disposed beneath and adhered unitarily to the underside of the inner lamination (9) of said top wall to thereby form a third lamination, and to support said tab which is adapted to be completely separated from said end wall during the initial carton opening; said laminated top having coextensive, opposed weakened lines of separation (j) (*k*) formed in respective fold lines of said inner and outer laminations with their respective carton sidewalls to form a limited opening in the top wall through which the carton contents are dispensable; the outer lamination (8) of said top wall having an edge portion (5) (6') which is adapted to overlay and project only slightly beyond the juncture of said end and top walls in order to unobtrusively engage upon said juncture-flush top edge of said inner lamination (a) of said end wall during reclosing of the tab after the initial carton opening, wherein said tab (l) during the reclosing is fully inserted within said carton behind the upper portion of said inner lamination (a) of said end wall.

2. A reclosable carton as defined in claim 1 wherein said top wall inner and outer laminations comprises integral extensions of a pair of opposed sidewalls of said carton.

3. A reclosable carton as defined in claim 1 wherein said inner lamination (9) of said top wall includes an integral extension portion (10) adjacent the juncture area of said end and top walls, which extension is at least partially fabricated from a part of the aforesaid extension (c) of the outer lamination (b) of said end wall; and said top wall extension portion (10) being defined further by a fold line (11) coinciding with the juncture of said end and top wall, and by a terminal edge of less than one-half the width of said edge wall (b); and said top wall extension portion (10) being folded down and adhered to an upper portion of said carton-opening tab to reenforce said tab.