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F. M. DIETZ

1,825,856

LIQUID CONTAINER

Filed July 17, 1929

FIG. I.

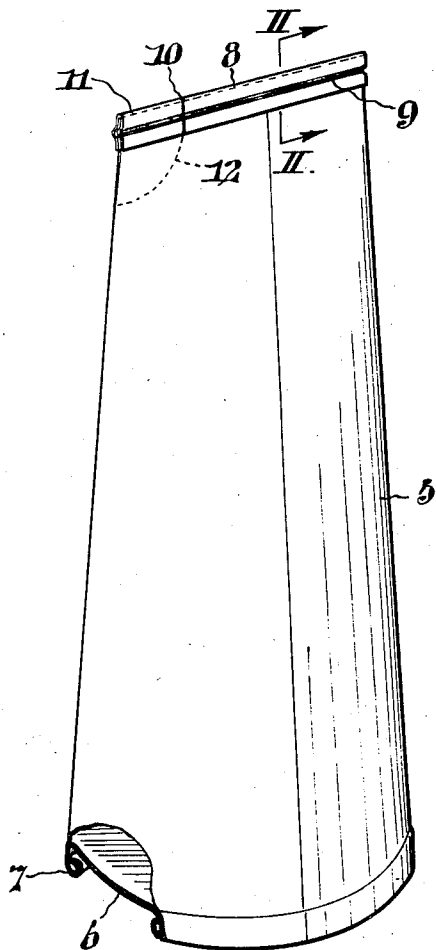


FIG. III.

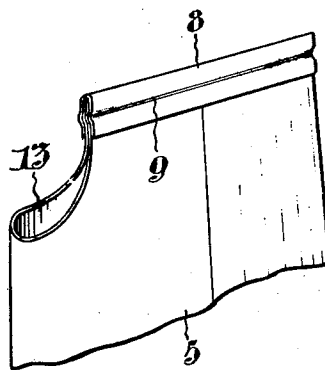


FIG. II.



WITNESSES

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LIQUID CONTAINER

Application filed July 17, 1929. Serial No. 378,845.

This invention relates to containers such as are used in dispensing milk and similar commodities. More particularly, my invention has reference to containers of a kind made to tubular configuration from paper, paraffined or otherwise rendered impervious to liquids, and adapted to be closed through collapse of their mouth ends and application of strip metal seals over the closures. To open a container of the specific type referred to, it has heretofore been customary to tear off the seal all the way across the mouth. This operation was rather difficult of accomplishment on account of the toughness of the paper and moreover resulted in an opening larger than actually required for pouring out the container contents.

My invention is directed toward overcoming the drawbacks mentioned; and this desideratum I attain, as hereinafter fully explained, through provisions which facilitate tearing away of but a portion of the sealed container mouth with formation of an opening ample in size to permit ready pouring of the liquid but which avoids unnecessary exposure of the remaining contents of the container.

Other objects and attendant advantages will be manifest from the following detailed description in connection with the attached drawings, whereof Fig. I is a perspective view of a container for milk and the like conveniently embodying my invention, a portion of the container body having been broken out at the bottom and illustrated in section to disclose certain details of construction.

Fig. II is a fragmentary sectional view on a larger scale, taken as indicated by the arrows II—II in Fig. I; and,

Fig. III is a fragmentary perspective view of the upper part of the container with a portion of its mouth torn away to provide the pouring opening or spout according to my invention.

The container herein delineated is, generally speaking, of well known construction in that its body 5 is made to upwardly tapering tubular configuration from paper which is paraffined or otherwise conditioned so as to be impervious to liquids. As shown, the bottom

of the container is formed by a disk 6, also of paper, and incorporated by rolling as at 7 with the lower edge of the body portion 5. Also after usual practice, the container is closed through collapse of its mouth end and application of a sealing strip 8 thereover. The sealing strip 8 illustrated is of the pinch type fashioned from strip metal to lap opposite sides of the collapsed mouth of the container; and the closure is rendered air tight by longitudinal swedging of the seal as at 9 whereby the "lips" of said mouth are effectively compressed together.

To convert the container briefly described to the purposes of my invention, I score the same across one corner of the flat mouth end as at 12, the line being preferably made an arc of a circle with the center at the corner point and a radius corresponding approximately to about one fourth of the width of the mouth. Moreover, instead of making the sealing strip 8 in one piece as heretofore, I form the same in two parts or sections which are so proportioned that the interruption in the strip occurs at the score line 12, as indicated at 10. By grasping the smaller section 11 of the sealing strip between the fingers of one hand and pulling it laterally relative to the longer section 8 in the other hand with a twisting motion, the corner of the container mouth is easily torn away to provide a somewhat sectoral opening, such as shown at 13 in Fig. III, for pouring. In this operation it will be apparent that the contiguous ends of the two aligned components 8, 11 of the sealing strip at 10 operate as opposing shear edges which greatly facilitate overcoming of the resistance of the double thickness of paper at the container mouth, and furthermore that the scoring 12 determines the course of the tear and the size of the resulting opening 13.

An advantage of my invention in addition to those already pointed out hereinbefore, is that the mutilation incurred by the container in being opened as explained, absolutely precludes illicit reuse of said container for vending purposes.

Having thus described my invention, I claim:

1. A liquid container of the character de-

scribed made taperingly tubular from paper and closed by collapsing and sealing its mouth end, said mouth end having one corner thereof scored to facilitate tearing off of a portion of the sealed mouth to form an opening of predetermined size through which the contents may be readily poured.

2. A liquid container of the character described made taperingly tubular from paper and closed by collapsing and sealing its mouth end, and having one corner of the collapsed end arcuately scored to facilitate tearing off a curved portion of the sealed mouth to form an opening of predetermined size through which the contents may be readily poured.

3. A liquid container of the character described made tubular from paper and closed by collapsing its mouth end and having a seal fashioned from strip metal over the closure, said seal being interrupted at one point to afford opposing shear edges whereby tearing off of one corner of the container mouth is facilitated with formation of an opening of predetermined size for pouring.

4. A liquid container of the character described made tubular from paper and closed by collapsing of its mouth end and having a scored line across one corner of its mouth and a seal fashioned from strip metal over the closure, said seal being interrupted at the scored line to afford opposing shear edges whereby tearing off of the mouth corner along the scoring is facilitated with formation of an opening of predetermined size for pouring.

5. A liquid container of the character described made tubular from paper and closed by collapsing and sealing its mouth end, and having an arcuately scored line to facilitate tearing away of a portion of the sealed mouth with formation of a sectoral opening of predetermined size for pouring.

6. A liquid container of the character described made tubular from paper and closed by collapsing and sealing its mouth end, and having a scored line across one corner of the sealed mouth defined by an arc of a circle with the center at the corner point to facilitate tearing away of such corner with formation of an opening of predetermined size for pouring.

7. A liquid container of the character described made taperingly tubular from paper and closed by collapsing and sealing its mouth end, and having one corner thereof arcuately scored to facilitate tearing away of a sectoral portion of the sealed mouth to form an opening through which the contents may be readily poured, said sectoral portion being defined by a radius struck from one corner point of the collapsed end to about one-fourth of the width of the sealed mouth.

In witness whereof, I have hereunto signed my name at Trenton, New Jersey, this 12 day of July, 1929.

FRANKLIN M. DIETZ.