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W. A. PRUETT
ICE CONTAINER AND CRACKER

2,726,517

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FIG. 3

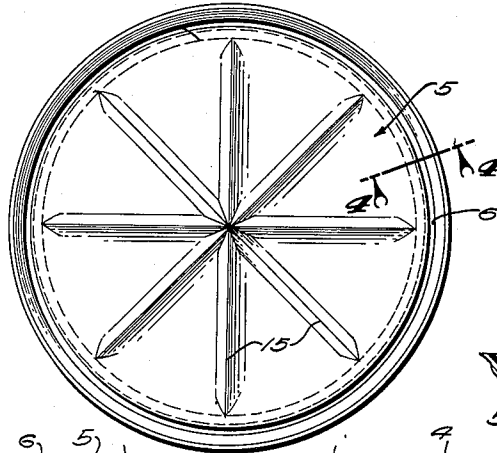


FIG. 4

FIG. 1

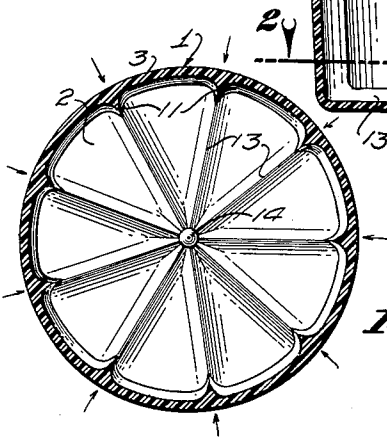
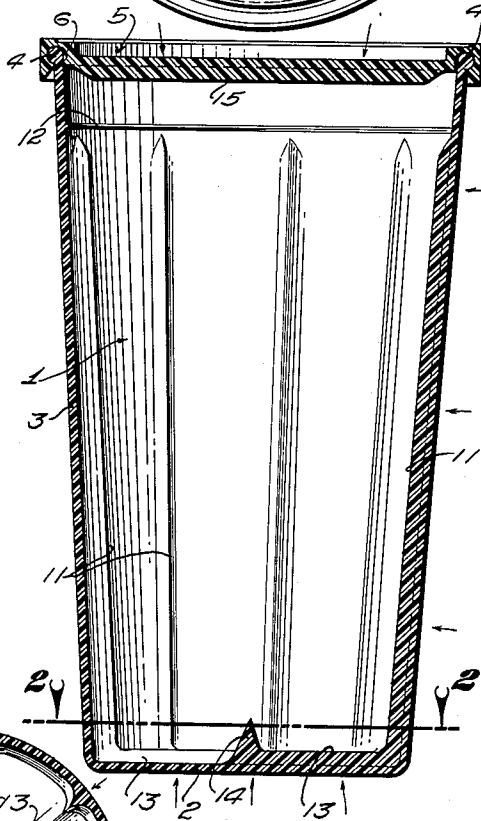


FIG. 2

INVENTOR.
WILLIAM A. PRUETT
BY *Lyon & Lyon*
ATTORNEYS

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2,726,517

ICE CONTAINER AND CRACKER

William A. Pruett, Covina, Calif.

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7 Claims. (Cl. 62—108.5)

My invention relates to ice containers and crackers, 15 and included in the objects of my invention are:

First, to provide a container in which water may be frozen and the resulting ice cracked into fine or relatively coarse fragments, as may be desired, before removing the ice from the container.

Second, to provide a container and ice cracker of this class wherein the water and resulting ice are completely sealed so as to avoid the absorption of refrigerator odors or gases.

Third, to provide a device of this class which is particularly economical of manufacture.

Other objects and advantages of this invention will be apparent from the following detailed description of a preferred embodiment thereof, as illustrated in the accompanying drawings, in which:

Figure 1 is a longitudinal sectional view of my ice container and cracker.

Figure 2 is a transverse sectional view taken through 2—2 of Figure 1.

Figure 3 is a bottom view of the cover.

Figure 4 is an enlarged fragmentary view through 4—4 of Figure 3 showing sealing means between the cover and the container.

My device includes a container 1 having a bottom 2 and side walls 3, being open at its upper side. The container 1 may take any desirable shape which facilitates its placement in the freezing compartment of a refrigerator or in a deep freeze unit. In the illustration the container is shown as having diverging side walls. The upper margin of the container is provided with a beaded rim 4. The open end of the container is adapted to be closed by a cover 5 having a channel 6 in its periphery which is adapted to fit over in sealing engagement with the beaded rim 4.

As so far described the container and its cover may be considered conventional. As will be brought out hereinafter it is essential that the material of the container and cover have substantially the properties of polyethylene, or similar flexible resilient locally distortable plastic material.

The walls of the container are provided with longitudinally extending ribs 11 terminating short of the top of the container. At this point there may be provided a rudimentary annular rib 12 which defines a water line. The wall ribs are preferably uneven in number so that they are not diametrically opposite. The bottom of the container is provided with radial ribs 13 which may form continuations of the wall ribs 11.

At the center of the bottom or intersection of the several bottom ribs there is formed an axially inwardly directed projection 14. The ribs 11 and 13 preferably are V-shaped in cross section, each forming a relatively sharp apex, however, fillets of large radii are provided between the sides of the ribs and the normal wall of the container. The cover 5 is provided with radiating ribs 15.

My ice container and cracker is employed as follows:

The container is filled with water or other liquid to be

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frozen to the level indicated by the internal rib 12 in order to allow for expansion. The container is then placed in the freezing compartment. When it is desired to utilize the contents of the container, the container is removed 5 from the freezing compartment and placed under a cold water faucet for approximately 15 seconds. Then, without removing the cover, the bottom and sides are struck with a blunt object. It has been found effective to crack the contents by striking the bottom of the container first. In doing so, longitudinal fractures through the center of 10 the frozen mass are formed. Then, upon striking the sides of the container along the planes of the ribs, radial inward fractures are formed. It should be observed that the material, such as polyethylene, from which the container is formed is at least translucent so that the ribs are discernable from the exterior of the container. The locally distortable nature of polyethylene causes the ribs to expand laterally and wedge into the channels which they cast in the ice with the result that a transient high 20 pressure shock wave is transmitted through the ice mass when the exterior of the container is struck over a rib.

The extent to which the container is struck depends on the size of chips or fragments it is desired to produce. Obviously the more the container is struck the smaller 25 the pieces formed.

It is preferred to place the container in the freezing compartment in an upright position. However, this is not necessary and should it be placed on its side, the top as well as the sides should be struck.

It should be observed that the shape and form of the container and the location and number of the ribs may vary, as well as their pattern; that is, they may be diagonal, crossed or otherwise arranged. 30

As indicated hereinbefore, the seal formed between the cover 5 and container 1 may be considered as conventional; however, it has been found advantageous to employ a special seal construction shown best in Figure 4. In this construction the annular channel 6 of the cover is undercut on its radially inner side so as to form a lip 16 which bears against the inside wall of the container adjacent the beaded rim 4. The radially outer portion of the channel curves in conformity to the beaded rim 4 but is proportioned to provide slight clearance. The wall forming the radially outer side of the channel projects below the beaded rim 4 and is provided with a lip 17 45 hooking thereunder. The portion of the cover overlying the beaded rim 4 is preferably of lesser thickness in order to increase the flexibility of the outer wall of the channel. It has been found that the cover construction thus described is not readily dislodged by handling of the container, particularly under the adverse conditions inherent in pounding the surfaces of the container and in the course of cracking the contents.

It should be observed that while polyethylene has been found particularly satisfactory, other materials, such as rubber, may be used, particularly if in the nature of gum rubber. 50

Having fully described my invention, it is to be understood that I do not wish to be limited to the details herein set forth, but my invention is of the full scope of the 60 appended claims.

I claim:

1. As an article of manufacture: an open mouth container of circular cross section formed of resilient and locally distortable polyethylene or like plastic substance having similar properties; a cover of similar material arranged for sealing engagement with the mouth of said container; and a plurality of internal radially inwardly directed solid ribs integral with the walls of the container whereby on freezing water in said container the resulting ice is provided with channels in conformity with said ribs, whereby upon striking the walls of said container 70

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externally said ribs are compressed into the channels of the ice to fracture the same.

2. As an article of manufacture: an open mouth container of circular cross section having diverging side walls and a bottom, said container formed of resilient and locally distortable polyethylene or a like plastic having similar properties; means for sealing said container and a plurality of integral radially inwardly directed solid ribs extending along the inner surfaces of said wall and across said bottom, said ribs forming ice fracturing elements when the exterior of said container is struck.

3. A sealable container of circular cross section formed of locally distortable material and having a plurality of internal radially inwardly directed solid ribs having relatively sharp profiles whereby upon freezing a liquid in said container, said ribs not only cast channels in the resulting solid mass but wedge into and fracture said mass when the exterior of said container is struck.

4. A container as set forth in claim 3 wherein said container has a bottom and diverging sides and said ribs radiate across the bottom of the container and at their point of intersection define an axially directed projection adapted when subject to an impact on the bottom of said container to effect a longitudinal fracture through said solid mass.

5. A container of circular cross section formed of at least translucent, resilient and locally distortable polyethylene or like plastic substance having similar properties; the interior of said container having a plurality of internal radially inwardly directed solid ribs visible from the exterior of said container, said ribs having relatively sharp profiles whereby upon freezing a liquid in said container, said ribs not only cast channels in the resulting solid mass but wedge into and fracture said mass when the exterior of said container is struck in the planes of said ribs.

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6. As an article of manufacture: an open mouth container of circular cross section formed of locally distortable material and having a beaded rim; a cover of similar material having an annular channel defining at its radially inner margin a lip engageable with the inside wall of said container adjacent said beaded rim; and a plurality of internal radially inwardly directed solid ribs integral with the walls of the container whereby on freezing water in said container the resulting ice is provided with channels in conformity with said ribs, whereby upon striking the walls of said container externally said ribs are compressed into the channels of the ice to fracture the same.

7. A container of circular cross section formed of at least translucent locally distortable material; the interior of said container having a plurality of internal radially inwardly directed solid ribs visible from the exterior of said container, said ribs having side walls curving and merging gradually into the normal walls of said container, said ribs having relatively sharp apexes whereby upon freezing a liquid in said container, said ribs not only cast channels in the resulting solid mass but wedge into and fracture said mass when the exterior of said container is struck in the planes of said ribs.

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