March 12, 1963 M. W. KUCHENBECKER 3,080,965

CARRYING HANDLE FOR TIED TOGETHER CONTAINERS

Filed Aug. 30, 1960

Fig. 1

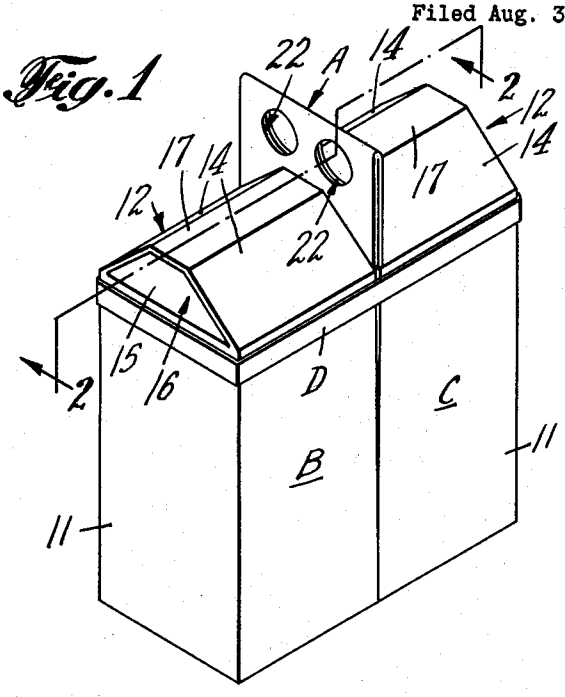


Fig. 3

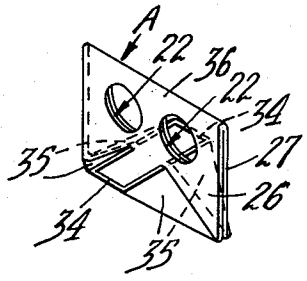


Fig. 2

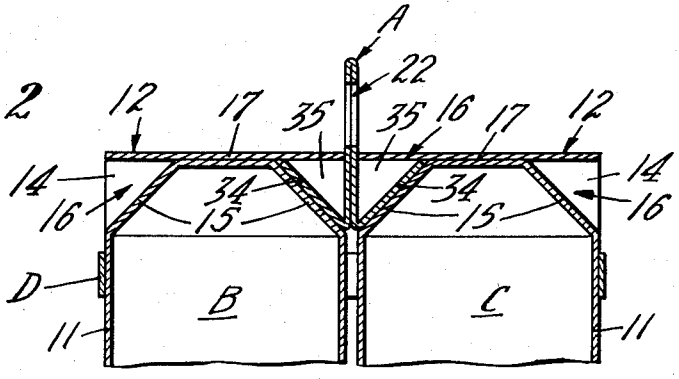
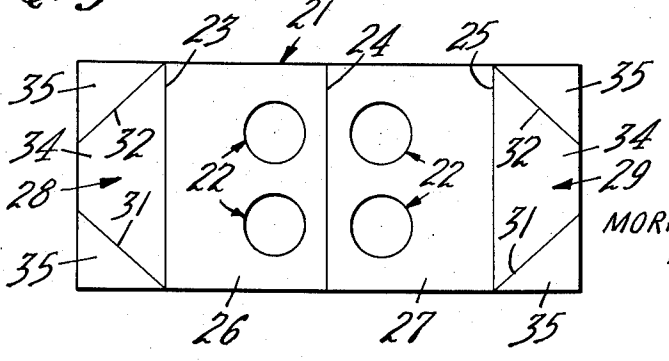


Fig. 4



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CARRYING HANDLE FOR TIED TOGETHER CONTAINERS

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The present invention relates generally to devices for carrying a plurality of containers and the like and has particular reference to a handle which is insertable between the containers and which is particularly adapted to gable top containers.

In the marketing of milk and other beverages in rectangular fibre containers, a common practice is to tie two or more containers together as a sales unit or package and provide a handle for readily carrying the unit. Such units usually are limited to a plurality of one quart or smaller volume containers. Recently milk and other beverages have been marketed in two quart containers. A unit made up of such containers is faced with a problem of handling a greater liquid weight and therefore requires a handle designed to support such increased weight.

It is an object of the instant invention to provide a carrying handle for a plurality of tied-together rectangular containers, wherein the handle is disposed between the containers in a centralized location so as to balance the weight load in such a manner as to produce a tendency for the containers to swing together and wherein the handle is formed with novel support members designed to adequately support the increased weight load.

Another object is the provision of such a container carrying device which is particularly adapted to gable top containers and is provided with wing support and locking members engageable with a plurality of the gable shaped closure walls of the containers so as to distribute the weight load over supporting surfaces greater in area than those heretofore utilized, thereby reducing the strain on the supporting areas of the containers.

Another object is the provision of such a container carrying device which may be readily constructed from fibre material in an economical manner and which is of a form easy to fabricate.

Numerous other objects and advantages of the invention will be apparent as it is bettter understood from the following description, which, taken in connection with the accompanying drawings, discloses a preferred embodiment thereof.

Referring to the drawings:

FIGURE 1 is a perspective view of a pair of juxtaposed containers tied together and fitted with a carrying device embodying the instant invention;

FIG. 2 is an enlarged sectional view taken substantially along a plane indicated by the lines 2—2 in FIG. 1;

FIG. 3 is a perspective view of the carrying device; and

FIG. 4 is an enlarged plan view of a flat blank from which the carrying device of FIG. 3 is produced.

As a preferred and exemplary embodiment of the instant invention, the drawings illustrate a carrying device A for carrying a pair of fibre milk containers B, C, disposed in juxtaposed relation as shown in FIG. 1 and tied together with an encircling band D to produce a unitary package.

The containers B, C, are commercial type, fibre containers used for milk and other beverages comprising a rectangular body 11 (FIGS. 1 and 2) closed at its top end by an interfolding of closure panels to produce a gable shaped top closure 12. The closure 12 preferably comprises a pair of outer inclined side closure panels or wall sections 14 and a pair of inner inclined end closure

panels or wall sections 15 which taken together define an open recess 16 at each end of the top closure of each container. The top terminating edge portions of the wall sections 14 and 15 are secured together in an end seam 17.

In the unitary package, the containers B, C, are arranged in juxtaposed position as shown in FIGS. 1 and 2 with end recesses 16 of the containers in adjacently aligned relation and the carrying device A disposed between the containers adjacent the aligned recesses 16 for cooperation therewith.

The carrying device A preferably is made from a single rectangular flat blank 21 (FIG. 4) of fibrous material or the like and is provided with pairs of finger holes 22 or other openings and suitable crease lines to facilitate bending the blank into a finished carrying device A. The blank 21 preferably is provided with three transverse crease lines 23, 24, 25 spaced apart to divide the blank into two rectangular shaped handle sections 26, 27 disposed in the middle of the blank and separated by the crease line 24, and two rectangular shaped hanger sections 28, 29 located at the ends of the blank and connected to the handle sections 26, 27 along the crease lines 23, 25.

The handle sections 26, 27 contain the finger holes 22 in a relation equidistant from the crease line 24 for ultimate alignment. The hanger sections 28, 29 are provided with pairs of diagonal crease lines 31, 32 which converge toward the end edges of the blank across the outer corners of the sections from the crease lines 23, 25 at a point adjacent the side edges of the blank. These crease lines 31, 32 divide the hanger sections 28, 29 into three parts, a rhomboidal (as shown) or triangular (if desired) hanger member 34, and two triangular wing locking members 35 connected to the hanger member along the crease lines 31, 32.

The carrying device A is produced from this blank 21 by folding the blank along the middle crease line 24 to align the handle sections 26, 27 in juxtaposed relation and to align the finger holes 22 as shown in FIG. 3 to produce a handle member 36. The hanger sections 28, 29 are then bent upwardly along their crease lines 23, 25 and the wing members 35 are similarly bent upwardly along their diagonal crease lines 31, 32 to produce a trough-like or box-like hanger structure disposed on each side of the handle member 36 and extending laterally therefrom as shown in FIG. 3 to produce the finished carrying device.

When the carrying device A is in position between the containers B, C, the trough-like hanger structure on each side of the device fits firmly in place in the adjacent end recesses 16 of the juxtaposed containers as shown in FIG. 2. In this position the hanger members 34 lie flat against the inclined inner end wall sections 15 of the top closures 12 and the locking members 35 similarly lie flat against the inner faces of the outer inclined side wall sections 14. The inherent spring in the fibre material due to folding or bending of the hanger members 34 and wing members 35 into position keep these members in close engagement with their corresponding top closure wall sections.

In this inserted or carrying position of the hanger members and wing members in the recesses 16, the outer edges of the wing members 35 engage against the flat face of the handle member 36 and against the peak of the gable shaped closure which in this case is the inner face of the top seam 17. Thus the wing members 35 rigidly lock the entire hanger structure in place in the recesses 16 of the containers against vertical displacement when the weight load is applied through lifting the containers by the handle member 36. This locking feature provides for a distribution of the weight load over the entire surfaces of the locking wings 35 and the hanger members 34 and their engaging wall sections 14 and 15 of the top closure and thereby provides for adequate support of the weight load

without straining the supporting members of the carrying devices and the supporting wall sections of the container closures.

As shown in FIGS. 1 and 2, the handle member 36 projects above the top closures of the containers to provide for ready use of the finger holes 22 in carrying the containers.

The tie band D preferably is made of fibre material and is applied to the juxtaposed containers after the carrying device is fitted in place.

It is thought that the invention and many of its attendant advantages will be understood from the foregoing description, and it will be apparent that various changes may be made in the form, construction and arrangement of the parts without departing from the spirit and scope of the invention or sacrificing all of its material advantages, the form hereinbefore described being merely a preferred embodiment thereof.

I claim:

1. In combination, a pair of juxtaposed rectangular fibre containers having gable shaped tops including end recesses defined by at least three top wall sections, a handle device for said containers comprising a handle member of double thickness of material having a fold along its top edge and a finger opening disposed in said member intermediate to its top and bottom edges, said handle member being disposed between said containers, a hanger member integrally connected with the lower edge of each thickness of said handle member, said hanger members extending outwardly in opposite directions for engagement with corresponding defining wall sections of the top end recesses of said containers, a plurality of locking wing members

integrally connected with outer edges of said hanger members and extending therefrom for engagement with defining wall sections of said recesses in said containers and against said handle member to firmly lock said handle device in container carrying position, and a tie band encircling said containers for holding the same together.

2. In combination, a pair of juxtaposed rectangular fiber containers having gable shaped tops including end recesses defined by at least three top wall sections, a handle device comprising a handle member disposed between said containers and a hanger member extending laterally from each of opposed faces of said handle member, said hanger members being substantially rectangular in configuration and having the outer corner portions turned up to provide pairs of locking wing members, said hanger members and said pairs of locking wing members providing trough-like structures having their outer faces engaging the defining wall sections of said recesses and having the outer edges of said wing members engaging against said handle member and against defining wall sections of said recesses when said handle device is in place between said pair of containers to lock firmly said handle device in container carrying position, and a tie band encircling said containers for holding the same together.

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