Sept. 18, 1962 W. B. CRANE 3,054,238

PRODUCE BASKET FILLING DEVICE

Filed Aug. 3, 1959

Fig. 1

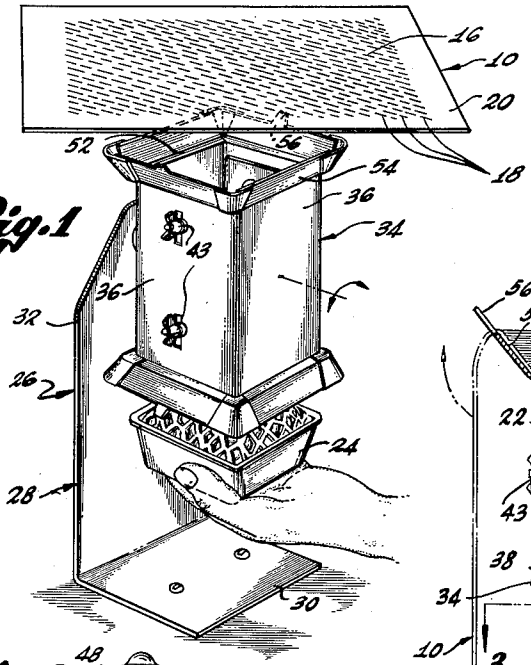


Fig. 2

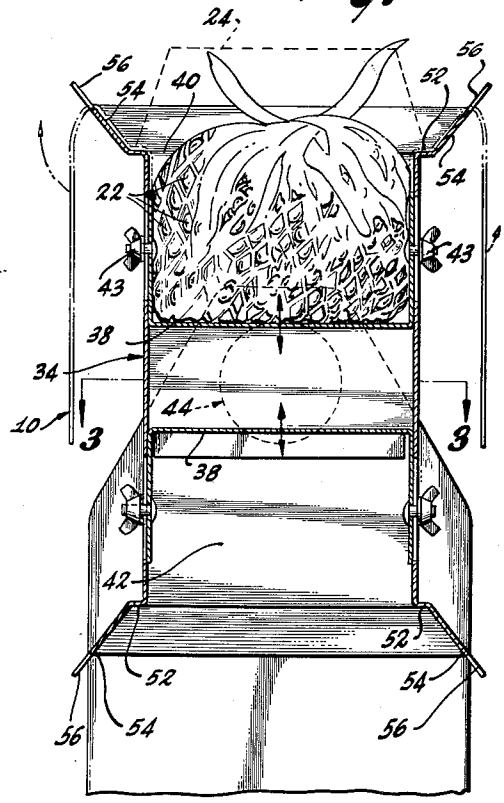


Fig. 3

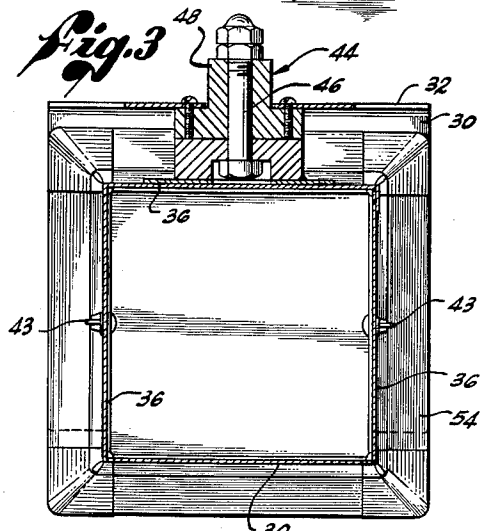


Fig. 4

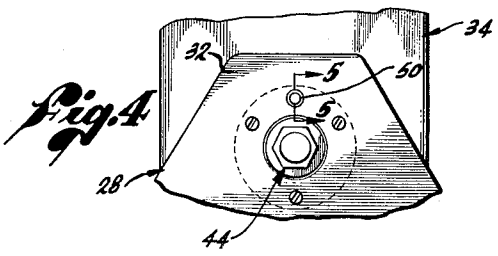
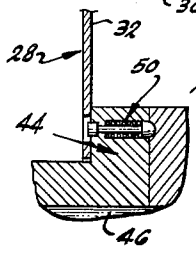


Fig. 5



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PRODUCE BASKET FILLING DEVICE

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6 Claims. (Cl. 53—255)

This invention deals generally with the packaging of produce for retail sale and particularly with a produce basket filling device.

Copending application Serial No. 809,391 filed April 28, 1959, entitled Wrapper for Packaged Produce discloses a slit wrapper for use in packaging produce in plastic produce baskets. In use, the produce to be packaged is placed in the center of the wrapper and the corners of the latter are brought together and joined over the produce. The wrapper and produce therein are then turned upside down and placed in a basket so that the joined corners of the wrapper are located at the bottom of the basket. The wrapper then confines the articles of produce in the basket.

This prior wrapper is slit in such a way as to render it capable of being stretched or expanded in at least one direction. As a result, the wrapper tends to mold itself about the produce to form a finished produce package having an extremely unique and pleasing appearance. Stretching of the wrapper during packaging causes widening of the slits into ventilation openings.

A general object of the present invention is to provide a device to facilitate packaging of produce with a slit wrapper and basket in the manner outlined above.

A more specific object of the invention is to provide a produce basket filling device for supporting the prior slit wrapper while it is being filled with and wrapped about the produce to be packaged and thereafter placing the filled wrapper in an inverted position in a produce basket.

Another object of the invention is to provide a produce basket filling device of the character described which is simple in construction, inexpensive to manufacture, and both easy and rapid to use.

Other objects and advantages of the invention will become readily apparent as the description proceeds.

A present illustrative embodiment of the invention will now be described by reference to the attached drawings, in which:

FIG. 1 is a view in perspective of the present basket filling device in use;

FIG. 2 is an enlarged vertical section through the device;

FIG. 3 is a section taken along line 3—3 of FIG. 2;

FIG. 4 is a detail view of a pivot mount embodied in the device; and

FIG. 5 is an enlarged section taken along line 5—5 of FIG. 4.

In these drawings, the numeral **10** denotes one type of slit wrapper disclosed in the aforementioned copending application. As described more fully in that application, wrapper **10** consists of a thin pliable sheet of plastic or other suitable material. This sheet has a rectangular central area **16** formed with diagonal rows **18** of spaced slits. These rows of slits terminate in spaced relationship to the edges of the sheet **10**, so as to define an unslit border **20** about the slit center area **16**. The slits in adjacent rows **18** are longitudinally offset, and those in alternate rows are aligned. This slit arrangement is similar to that employed in so-called "expanded metal" and affords the slit center area **16** of the sheet with the ability to stretch or expand in the transverse direction of the rows **18**.

As preliminarily outlined, and described more fully in the prior application, the articles of produce **22** to be packaged are placed on the slit area **16** of the sheet **10**. The corners of the sheet are then drawn together over the produce and joined. Finally, the wrapper and produce are turned over and placed in a rectangular produce basket **24**. In the filled produce basket, therefore, the corners of the sheet **10** are located at the bottom of the basket.

The numeral **26** generally denotes the present device for facilitating filling of the basket **24** in the manner described above. The present basket filling device will be seen to comprise a base **28** to be fixed to or otherwise mounted on a supporting surface. This base has been illustrated as comprising an L-shaped bracket having a horizontal part **30**, which may be attached to the surface, and a vertical part **32**.

Pivotally mounted on the upper end of the vertical bracket part **32**, for turning on a horizontal axis, is a sheet metal body forming a cup member **34**. Cup member **34** has a rectangular shape and comprises a side wall or more accurately flat side walls **36**. Extending across the inside of this member, intermediate the upper and lower edges of the side walls **36**, as the device is viewed in FIG. 2, are a pair of peripherally flanged walls or partitions **38**. These partitions separate the member **34** into a pair of cups **40** and **42** which open in diametrically opposite directions of the member. Partitions **38** are adjustably secured in the member **34**, to permit the depth of the cups **40** and **42** to be varied, by bolts **43** which pass through holes in the flanges of the partitions and slots in the side walls **36** of the member **34**, as shown.

Cup member **34** is pivotally mounted on the bracket or base **28**, for turning between a first filling position wherein cup **40** is uppermost, and a second filling position wherein cup **42** is uppermost, by pivotal mounting means **44**. This pivotal mounting means comprises short shaft or trunnion **46** which is rigidly attached to the center of one side wall **36** of the member **34**. Trunnion **46** is journalled in a central bore through a sleeve bearing **48** mounted on the vertical bracket part **32**. The numeral **50** denotes a yieldable detent type indexing means for releasably holding the cup member in its aforesaid filling positions.

Encircling the open end of each cup **40** and **42** of the member **34** is a lateral flange **52**. It will be observed that the side wall **36** of the cup member **34** terminates at the open end of the cup member in a plane transverse to the side wall and that the flange **52** extends outwardly from the side wall in this plane. An inclined flange or shoulder **54** is joined to the outer edge of each flange **52** to form a flared rim. Flange **52** is formed by turning out the sheet metal of the cup member **34** along the adjacent edge of the side wall **36**. Flange **54** is formed by turning the sheet metal along the outer edge of and at an angle to the flange **52**. Extending from the edge of each shoulder flange **54**, which parallels the pivotal axis of the cup member **34**, is a finger or prong **56**. Each cup **40** and **42**, therefore, has a pair of fingers or prongs **56** which extend in the same general direction as the respective cup opens.

In use of the basket filling device just described, the cup member **34** is turned to one of its positions, say that in which the cup **40** is uppermost, as illustrated in FIG. 2. A slit wrapper **10** is then placed over the open side or mouth of the upper cup **40** in such a way that the rows **18** of slits in the wrapper extend parallel to the pivotal axis of the cup member **34**, and the fingers **56** on the upper cup extend through slits in the wrapper as illustrated in FIG. 2. The produce **22** to be packaged is then placed in the center, slit portion of the wrapper. The

weight of the produce causes this slit portion to stretch and sag into the upper cup **40** until it and the produce rest on the upper partition **38**. The corners of the sheet or wrapper **10** are then drawn over the produce and joined, in the manner described more fully in the aforesaid copending application.

The next step is to place the basket **24** to be filled in an inverted position over the upper cup **40**, so that the rim of the basket seats on the lateral flange **52** of the upper cup. The basket then overlies the wrapper and produce in the upper cup. Finally, the cup member **34** is turned over or inverted to the position of FIG. 1 wherein the produce and wrapper drop into the basket **24** to complete the basket filling operation. It will be seen that in the completed produce package, the corners of the wrapper **10** are located at the bottom of the basket, and the slits of the wrapper are widened to form ventilation openings as previously mentioned.

During inverting of the cup member **34** in the manner just described, of course, the second cup **42** is turned to its upper filling position in readiness for the next basket filling operation. Thus, the double-ended construction of the cup **34** renders the present basket filling device both rapid and easy to use since at the end of each basket filling operation, one of the cups **40** or **42** is located in its upper loading position in readiness for the next basket filling operation. If the member **34** had only one cup, for example, it would have to be returned to its upright loading position at the end of each basket filling operation.

It will be seen that the lateral flanges **52** on the cup member serve both to support and locate the basket **24** to be filled. The inclined shoulder flanges **54** serve to locate the basket in the centered position over the upper cup. The inclination of the shoulder flanges, of course, tends to lead or guide the basket to its centered position when it is being placed over the cup.

In practice, produce baskets may have various shapes and sizes, such as square, rectangular, or round. For this reason, the aforementioned prior application discloses several different forms of slit wrappers suitable for these different basket shapes. The cup member **34** of the present basket filling device will be proportioned and configured to correspond with the shape and size of the particular basket to be filled. Thus, the member may be circular, or rectangular, rather than square as shown or described herein, if the baskets to be filled are circular or rectangular. It will be observed, however, that the width of the flange **52** accommodates a small range of basket sizes. An advantage of the present basket filling device is that it tends to mold the produce to the shape of the cup member, thereby enhancing the appearance of the filled basket. The adjustment of the partitions **38** afforded by the bolts **43** permits the depth of the cups **40**, **42** to be varied in accordance with the quantity of produce to be packaged.

It will be clear, therefore, that the basket filling device hereinbefore described and illustrated is fully capable of attaining the several objects and advantages preliminarily set forth. While a preferred embodiment of the invention has been disclosed, various modifications in design and the arrangement of parts of the invention are possible within the scope of the following claims.

What is claimed is:

1. A produce basket filling device comprising a hollow, elongate member open at each end and including a side wall, a pair of transverse partitions within said member and defining with said side wall a pair of cups which are open at the ends of the member, said partitions being independently longitudinally adjustable to vary the depth of said cups, said side wall having a first pair of opposed, longitudinally extending slots adjacent one end and a second pair of opposed, longitudinally extending slots adjacent the other end, a pair of threaded bolts on each partition extending through said pairs of slots, respectively, whereby the partitions can be longitudinally adjusted by movement of the bolts along the slots, nuts on said bolts for releasably locking said partitions in adjusted positions, a basket locating rim about each end of the member, a base to be mounted on a supporting surface, and means rotatably mounting said member on said base for turning on an axis normal to the length of the member.

2. A produce basket filling device comprising a hollow member open at one end and including a side wall, a transverse bottom partition within said member and defining with said side wall a cup, said partition being adjustable to vary the depth of said cup, said side wall having a pair of opposed, longitudinally extending slots, a pair of threaded bolts on said partition extending through said slots, whereby the partition can be longitudinally adjusted by movement of the bolts along the slots, nuts on said bolts for releasably locking said partition in adjusted position, a basket locating rim about said one end of the member, a base to be mounted on a supporting surface, and means rotatably mounting said member on said base for turning on a normally horizontal axis between a first position wherein the cup opens upwardly and an inverted position wherein the cup opens downwardly.

3. A produce basket filling device comprising: a cup member open at one end and including a bottom wall and a side wall, one end of said side wall terminating at said open side of said member in a plane transverse to the side wall, a first outwardly projecting flange joined to and extending about said one end of said side wall approximately in said plane to define a basket-seating shoulder, a second flange joined to the outer edge of and extending transversely of said first flange to define a basket-locating rim about the outer edge of said first flange, a base to be mounted on a supporting surface, and means rotatably mounting said member on said base for turning of the member on a normally horizontal axis approximately parallel to said plane between an upright position wherein said member opens upwardly and an inverted position wherein said member opens downwardly.

4. A produce basket filling device comprising: a cup member open at one end and including a bottom wall and a side wall, one end of said side wall terminating at said open side of said member in a plane transverse to the side wall, a first outwardly projecting flange joined to and extending about said one end of said side wall approximately in said plane to define a basket-seating shoulder, a second flange joined to the outer edge of and extending transversely of said first flange to define a basket-locating rim about the outer edge of said first flange, a pair of prongs joined to and extending beyond the edge of said second flange at opposite sides of said member, a base to be mounted on a supporting surface, and means rotatably mounting said member on said base for turning of the member on a normally horizontal axis approximately parallel to said plane between an upright position wherein said member opens upwardly and an inverted position wherein said member opens downwardly.

5. A produce basket filling device comprising: a hollow sheet metal body open at one end and including a side wall, one end of which terminates at said open end of said body in a plane transverse to said side wall, the sheet metal of said body being turned outwardly at said end of said side wall to form a first flange extending about said one end of said side wall approximately in said plane and defining a basket-seating shoulder, the sheet metal of said body being turned at an angle to said first flange along the outer edge of the latter flange to form a second flange extending transversely of said first flange and defining a basket-locating rim about the outer edge of said first flange, a bottom wall extending across the inside of said body and joined to said side walls to define with said body a cup which opens through said open end of

the body, a base to be mounted on a supporting surface, and means rotatably mounting said body on said base for turning of the body on a normally horizontal axis approximately parallel to said plane between an upright position wherein said body opens upwardly and an inverted position wherein said body opens downwardly.

6. A produce basket filling device comprising: a cup member open at one end and including a side wall, a bottom wall separate from said side wall, means adjustably connecting said bottom wall to said side wall to permit adjustment of said bottom wall to vary the interior depth of said cup member, one end of said side wall terminating at said open end of said member in a plane transverse to the side wall, a first outwardly projecting flange joined to and extending about said one end of said side wall approximately in said plane to define a basket-seating shoulder, a second flange joined to the outer edge and extending transversely of said first flange to define a basket-locating rim about the outer edge of said

first flange, a base to be mounted on a supporting surface, and means rotatably mounting said member on said base for turning of the member on a normally horizontal axis approximately parallel to said plane between an upright inverted position wherein said member opens downwardly.

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