Title: IMPROVED DUAL CHAMBER SALAD CONTAINER

Abstract: A salad container having a container body with an open top, an exterior surface and an interior surface defining a cavity, the cavity divided into an upper chamber and a lower chamber by a selective barrier cooperatively configured to rest on the interior surface of the body to selectively exclude relatively large ingredients such as salad roughage from entry into the lower chamber and to provide passage therethrough of relatively small food ingredients, such as granular ingredients including, for example, ground pepper and/or such as liquids, including, for example, salad dressing, into and out of the lower chamber.
IMPROVED DUAL CHAMBER SALAD CONTAINER

PRIORITY DOCUMENTS

This is a continuation-in-part of application United States Patent Application Serial No. 10/412,008 filed on April 11, 2003, and which is incorporated herein.

BACKGROUND OF THE INVENTION

In the food service industry, it has long been desirable to delay mixing certain food ingredients together until just prior to consumption. The service of fresh green salad is one such example. Dressing added to the salad just prior to its consumption advantageously preserves the freshness, crispness, and distinctive taste of the greens, croutons, and other rough ingredients that are susceptible to dressing absorption. All too frequently, dressing is applied to roughage too early resulting in a drenched, wilted, and limp concoction that is rejected by consumers as inferior. When ordering a Caesar salad, for instance, it is traditional for the salad dressing to be prepared tableside and then rapidly tossed with the other ingredients such as romaine lettuce and croutons for immediate transfer onto a diner’s plate for enjoyment. Tableside preparation, however, is costly and time consuming and not particularly well suited to the fast-food or high volume food service industries.

Consumers, restaurateurs, the fast-food industry, and institutional food preparation services continue to demand food products that are high quality, convenient, quick to prepare, and economical to produce. Fast-food outlets, for example, frequently offer pre-prepared salad roughage such as greens, croutons, radishes, cucumbers, carrots, meat and/or cheese combined together in a disposable individual container. The salad dressing, however, is frequently offered in a separate packet that requires cumbersome handling and opening before the contents therein are squeezed out onto the roughage. Typically, the roughage container also includes a lid that must be removed before the packet contents are added thereover. Once the container lid is removed, the dressing packet is torn open and the dressing therein is squeezed out and onto the roughage. Implements such as a fork, spoon or knife, individually or in combination, are then used to distribute the dressing throughout the
roughage. The action required of the implements to distribute the dressing often results in substantial amounts of ingredients and dressing disadvantageously overflowing and tumbling out of the container onto the table, the clothes of the consumer, and, not infrequently, onto the floor.

Schools and other high volume institutions provide similar individual holding containers for salad roughage. The salad dressing, however, is frequently offered in a separate portion cup to be added atop the salad greens. Similarly, to thoroughly distribute the dressing among the roughage requires use of implements resulting in spillage and mess. Moreover, both dressing packets and portion cups are costly and inconvenient and require significant dexterous manipulation to use.

Large commercial eateries often separately store salad roughage in large plastic bins and dressing in other containers until it is desirable for both to be combined and mixed together just prior to serving. Once the desired dressing and roughage containers are located and opened, the dressing is poured onto the roughage. Alternatively, and depending on the size of the dressing container, the roughage may be introduced to the dressing. In either case, use of implements to toss the salad and distribute the dressing soon follows with its attendant and disadvantageous spillage, waste and mess. From the salad remaining in the mixing container, individual portions are then distributed onto individual plates and served.

There thus exists a long felt need for an improved salad container that eliminates the need to store, in separate containers, large ingredients such as salad roughage apart from smaller or liquid ingredients, such as salad dressing, until mixing them together is desired. It has been further long desired that a container be provided to eliminate the need to use mixing or tossing implements and the undesirable spillage, waste and mess resulting from use thereof.
SUMMARY OF THE INVENTION

Generally, the present invention comprises a salad container having a container body with an open top, an exterior surface, and an interior surface defining a cavity, the interior surface having a downwardly inward tapering portion, and a selective barrier cooperatively configured to be positioned on the tapering portion to divide the cavity into an upper chamber and a lower chamber. The barrier is configured with at least one opening therethrough to selectively exclude relatively large ingredients such as salad roughage from entry into the lower chamber and provide passage therethrough of relatively small food ingredients, such as granular ingredients including, for example, ground pepper and/or liquids such as salad dressing, into and out of the lower chamber.

In at least one embodiment of the present invention, the interior surface of the body includes at least one inwardly projecting protrusion upon which the barrier may gravitationally rest when the container body is in an upright position. In another embodiment, the interior surface of the body includes an inwardly tapered portion upon which the barrier may gravitationally rest dividing the cavity into an upper and lower chamber. In a further embodiment, the barrier is cooperatively configured with the body to be wedged to the interior surface of the body. Each of the embodiments may optionally include a detachable lid which may be used, for example, to close the container body when desired and/or for inverting the container and shakingly mixing together the contents of both chambers without need of implements.

These and other features and advantages of the present invention will become apparent from the following detailed description which taken in conjunction with the accompanying drawings, further describes and illustrates by way of example the principles of the invention.
BRIEF DESCRIPTION OF THE DRAWINGS

FIG. 9 is a cross-sectional perspective view of an embodiment of the present invention including a lid wherein the selective barrier is at gravitational rest on a plurality of inwardly projecting protrusions formed on the interior surface of the container body.

FIG. 10 is a perspective view with cutaway of an embodiment of the present invention wherein the selective barrier is at gravitational rest on a plurality of inwardly projecting protrusions integrally formed on the interior surface of the container body.

FIG. 11 is a cross-sectional perspective view of an embodiment of the present invention including a lid wherein the selective barrier is at gravitational rest on a plurality of inwardly and upwardly projecting protrusions formed on the interior surface of the container body.

FIG. 12 is a perspective view of an embodiment of the present invention wherein the selective barrier has an upwardly angled peripheral extension further extended by a lateral flange, the barrier at rest on an inwardly projecting protrusion in the form of a seat having a front surface.

FIG. 13 is a cross-sectional view along the lines depicted in FIG. 12.

FIG. 14 is a perspective view of an embodiment of the present invention wherein the selective barrier includes peripherally downwardly projecting tabs.

FIG. 15 is a cross-sectional view along the lines depicted in FIG. 14.

FIG. 16 is a cross-sectional view of an alternative embodiment of the present invention wherein the selective barrier includes peripherally downwardly projecting tabs.
DETAILED DESCRIPTION OF PREFERRED EMBODIMENTS

Referring to FIG. 9, is shown a preferred embodiment of the present invention. Shown is a container body 312 in its upright position having an exterior surface 314 and an interior surface 316 defining a cavity 318, the cavity divided into an upper chamber 320 and a lower chamber 322 by a barrier 324, the barrier being cooperatively configured to gravitationally rest upon at least one inwardly projecting protrusion 333 formed on the interior surface of the body. The barrier includes an upwardly facing barrier surface 347, and at least one opening 349 therethrough of sufficient dimension to selectively exclude relatively large ingredients, such as salad roughage, from entry into the lower chamber and to provide passage therethrough of relatively small food ingredients, such as granular ingredients, including, for example, ground pepper and/or such as liquids, including, for example, salad dressing, into and out of the lower chamber. The present embodiment includes an optional securable lid 313.

Operationally, with the container body 312 in its upright position and having a bottom 315, salad dressing, for example, may be loaded into the cavity 318, the dressing gravitationally settling to the bottom of the body. The selective barrier 324 may then be placed to gravitationally rest on the at least one protrusion 333. In such a resting position the barrier divides the cavity into the upper chamber 320 and the lower chamber 322. Salad roughage may then placed in the cavity on the upwardly facing barrier surface 347 and the optional lid 313 may be placed thereover. The container and its contents may then be stored, the barrier selectively separating the roughage from the dressing until the salad is ready for consumption. When ready for consumption, the lid may be removed and the container may be inverted onto a plate, the dressing from the lower chamber 322 flowing gravitationally downwardly onto the salad roughage. The body and the barrier may thereafter be removed for future use or disposed of as desired. Optionally, while the barrier is resting on the at least one protrusion, the dressing may be loaded into the lower chamber by a nozzled dispenser or otherwise poured through the at least one barrier opening 349. With the lid in place, the salad ingredients including the dressing may be shaken together in the container before the salad is served within the container or distributed onto a serving plate.
The container body, barrier, and/or lid may be formed, for example, from polystyrene, polyethylene, polypropylene, or other plastics by methods known to those of skill in the art. Such methods could include, for example, injection molding, blow molding and/or thermoforming. The at least one protrusion on the interior surface of the body may be formed as ribs, nodes, bosses, or the like or alternatively as a partially or fully annular rim or shelf sufficient to support the barrier at rest. The at least one protrusion may be added to the interior surface or may be formed as an integral part of the container body and may project inwardly from the side of the container body, upwardly from the bottom of the body, or both so as to support the barrier.

Referring to FIG. 10, is shown another embodiment of the present invention wherein the container body 412 has an open top, the barrier 424 shown gravitationally at rest upon integrally formed inwardly projecting protrusions 433, the barrier dividing the cavity into an upper chamber 420 and a lower chamber 422.

Referring to FIG. 11, is shown another embodiment of the present invention. In this embodiment, inwardly projecting protrusions 533 are formed in the container body 512 and project upwardly from the bottom of the body into the cavity 518 to support the barrier 524 having at least one barrier opening 549. An optional lid 513 is provided.

In an alternative embodiment, the at least one inwardly projecting protrusion may include a slightly enlarged head or other barrier securement mechanism and be configured in alignment with the at least one barrier opening to secure the barrier from dislodging when the container is shaken or inverted. Such retention mechanisms have been known and applied in other arts such as in the music packaging art to analogously retain compact music discs in a plastic jewel case through a hole centered in the disc. Such a retention mechanism may operate to receive and releasably or permanently secure the barrier through the at least one barrier opening discouraging dislodgment of the barrier as a divider when the container is shaken or inverted.

Referring to FIGS. 12 and 13, is shown another embodiment of the present invention. In this embodiment, the container body 612 having an interior surface 616,
a bottom 615 and at least one inwardly projecting protrusion 633 forming a barrier seat 617 on the interior surface, the seat having a front surface 619. This embodiment also includes a barrier 624 having at least one barrier opening 649, the barrier having an upwardly angled peripheral annular extension 621 sized to frictionally wedge the peripheral extension in contact with the front surface, the barrier in the wedged position dividing the cavity into an upper chamber 620 and a lower chamber 622. The upwardly angled extension is shown further extended by a lateral flange 623 for conveniently and gravitationally resting the barrier on the seat should the upwardly angled extension, for example, be sized too narrowly for frictionally wedging with the front surface. The upwardly angled extension may be other than annular and may, for example, be in the form of opposing tabs sufficient to wedge the barrier in place and divide the cavity into an upper and lower chamber. The lateral flange may also be optionally configured as a plurality of tabs. For purposes of this application, the term "wedge" also includes press-fit.

Referring to FIG. 14, is shown another embodiment of the present invention. In this embodiment, the container body 712 includes an interior surface 716 at least a portion of which is tapered downwardly inward, the barrier 724 being configured cooperatively with peripherally projecting tabs 736, the tabs being sized cooperatively to frictionally interfere with the tapered portion of interior surface above the bottom of the body, the barrier dividing the cavity into an upper chamber 720 and a lower chamber 722. A lid 713 is also provided.

Alternatively, the barrier may be configured without tabs and may be formed of sufficiently pliable material such as, for example, polyethylene, and be cooperatively sized so that at least a portion of the periphery of the barrier rests on the tapered portion of the interior surface above the bottom of the body dividing the cavity into an upper chamber and a lower chamber. Optionally, the container body may be formed of a material relatively more pliant than the barrier and may be cooperatively sized to receive at least a portion of the periphery of the barrier lodging the barrier above the bottom of the body and dividing the cavity into an upper and a lower chamber.
FIG. 15 depicts a cross-section of the embodiment shown by way of arrows in FIG. 14, the tabs 736 being directed downwardly against the interior surface 716 of the container body 712. FIG. 16 shows another embodiment of the present invention having upwardly folded tabs 836 frictionally cooperating with the interior surface 816 of the container body 812 positioning the barrier 824 in the cavity 818 dividing the cavity into an upper chamber 820 and a lower chamber 822. The tabs of the present embodiments may be formed in a variety of shapes and may be comprised of a plurality or may, alternatively, take the form of a contiguous annular skirt. Optionally, the tabs may be configured to fold both upwardly and downwardly or only in one direction. The tabs and/or the annular skirt may optionally be cooperatively configured to wedge the barrier in physical contact with at least one inwardly projecting protrusion and in the wedged position the barrier dividing the cavity into an upper and a lower chamber.

Configurations of alternative embodiments of the present invention may vary considerably. The shape of the container body, for example, may be round, oval, square, or other shapes as desired and known by those skilled in the art. The upper and lower chambers too may be of varying sizes and shapes as desired.

In addition to plastics, other materials, such as, for example, rigidized paper or pulp materials may be employed as desired. Metal, such as, for example, stainless steel or aluminum may also be employed as desired consistent with the present invention. The components of the present invention may also be made from differing materials.

The salad container of the present invention may also vary in size for use in individual and/or commercial and institutional configurations. Moreover, the salad container of the present invention is not limited to containing and storing salad ingredients, but may also be used to contain and store other foodstuffs separately in the same container until ready for consumption. For example, cooked pasta may be stored in the upper chamber of the present invention and pasta sauce separately in the lower chamber. These foods may be mixed together when desired from the same container as described for salad materials desirably preserving the distinctive flavors of the foods in the separate chambers of the container until ready to be consumed.
Having described only typical forms and applications of the present invention, it is not intended that the invention be limited to the specific details herein set forth. While a particular form of the invention has been illustrated and described, it will also be apparent to those skilled in the art that various modifications can be made without departing from the spirit and scope of the invention. Accordingly, it is not intended that the invention be limited except by the appended claims.
CLAIMS

What is claimed is:

1. A salad container comprising:
   a container body having an open top, an exterior surface and an interior
   surface defining a cavity, the body having at least one protrusion projecting
   inwardly into the cavity, and a selective barrier cooperatively configured to rest
   gravitationally on the at least one protrusion dividing the cavity into an upper
   chamber and a lower chamber and having at least one barrier opening configured
   to selectively exclude entry of relatively large food items into the lower
   chamber and to provide passage through the barrier of relatively small food
   ingredients into and out of the lower chamber.

2. The salad container of claim 1, wherein the at least one protrusion is
   annular.

3. The salad container of claim 1, wherein the at least one protrusion is
   added to the body.

4. The salad container of claim 1, wherein the at least one protrusion is
   formed as an integral part of the body.

5. The salad container of claim 1 including a lid.

6. The salad container of claim 1, wherein the at least one protrusion is
   projecting upwardly into the cavity.

7. The salad container of claim 1, wherein the at least one protrusion is
   projecting upwardly and cooperates with at least one barrier opening securing
   the barrier to the body.

8. The salad container of claim 1, wherein the at least one protrusion is
   formed as a seat.
9. The salad container of claim 1, wherein the seat has a front surface.

10. A salad container comprising:
    a container body having an open top, an exterior surface and an interior surface defining a cavity, the body having at least one protrusion projecting inwardly into the cavity, and a selective barrier having an upwardly angled extension cooperatively configured to wedge the barrier in frictional contact with the at least one protrusion dividing the cavity into an upper chamber and a lower chamber and having at least one barrier opening configured to selectively exclude entry of relatively large food items into the lower chamber and to provide passage through the barrier of relatively small food ingredients into and out of the lower chamber.

11. The salad container of claim 10, wherein the at least one protrusion is formed as a seat.

12. The salad container of claim 11, wherein the seat has a front surface and the barrier is cooperatively configured to wedge the barrier to the front surface.

13. The salad container of claim 11, wherein the upwardly angled extension is further extended by a lateral flange.

14. A salad container comprising:
    a container body having an open top, an exterior surface and an interior surface defining a cavity, the interior surface having a downwardly inward tapering portion, and a selective barrier cooperatively configured to rest on the tapering portion dividing the cavity into an upper chamber and a lower chamber and having at least one barrier opening to selectively exclude entry of relatively large food items into the lower chamber.

15. The salad container of claim 14, wherein the body and barrier are cooperatively configured so that the barrier may be securably lodged to the tapered portion of the body.
16. The salad container of claim 14 including a lid.

17. The salad container of claim 14, wherein the barrier includes peripherally projecting tabs.

18. The salad container of claim 17, wherein the tabs are foldable.

19. A salad container comprising:
   a container body means having an open top, an exterior surface and an interior surface defining a cavity for holding foodstuffs, the body means having at least one protrusion projecting inwardly into the cavity, and a selective barrier means cooperatively configured to rest gravitationally on the at least one protrusion and to divide the cavity into an upper chamber and a lower chamber and having at least one barrier opening configured to selectively exclude entry of relatively large food items into the lower chamber and to provide passage through the barrier of relatively small food ingredients into and out of the lower chamber.

20. A salad container comprising:
   a container body means having an open top, an exterior surface and an interior surface defining a cavity for holding foodstuffs, the body means having at least one protrusion projecting inwardly into the cavity, and a selective barrier means having an upwardly angled extension cooperatively configured to wedge the barrier means in frictional contact with the at least one protrusion and to divide the cavity into an upper chamber and a lower chamber and having at least one barrier opening configured to selectively exclude entry of relatively large food items into the lower chamber and to provide passage through the barrier of relatively small food ingredients into and out of the lower chamber.
21. A salad container comprising:

a container body means having an open top, an exterior surface and an interior surface defining a cavity for holding foodstuffs, the interior surface having a downwardly inward tapering portion, and a selective barrier means cooperatively configured to rest on the tapering portion and to divide the cavity into an upper chamber and a lower chamber and having at least one barrier opening to selectively exclude entry of relatively large food items into the lower chamber.