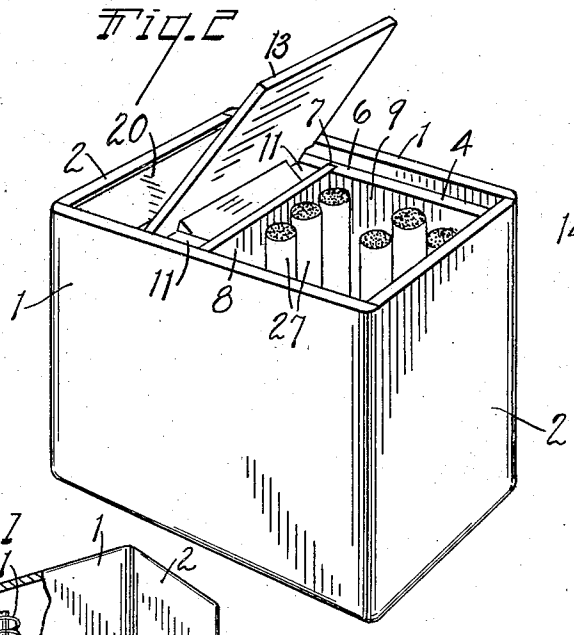
April 20, 1943. R. C. SHIPLEY 2,316,979

DISPENSING CONTAINER

Filed Aug. 1, 1942

Fig. 2



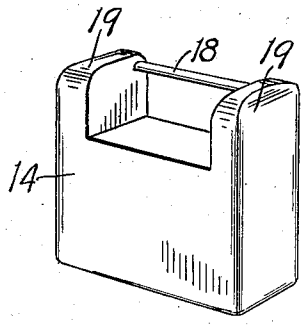


Fig. 6

Fig. 1

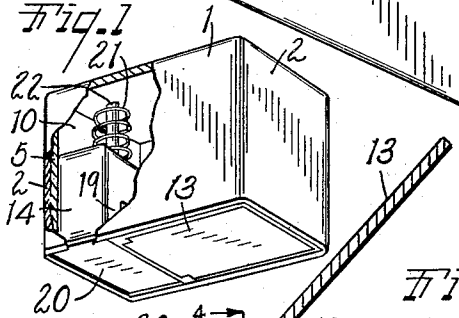


Fig. 4

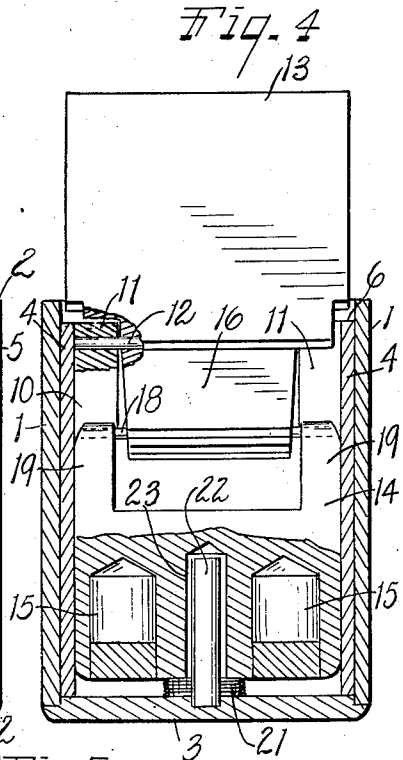


Fig. 3

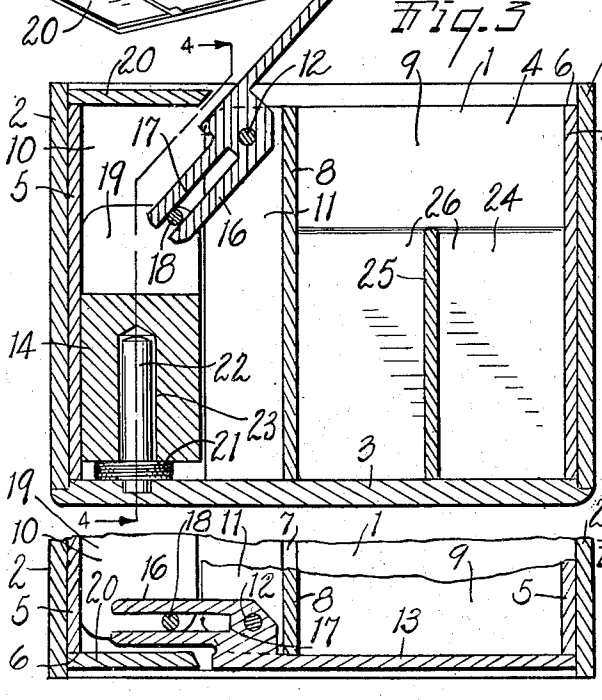


Fig. 5

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DISPENSING CONTAINER

Robert C. Shipley, Kalamazoo, Mich.

Application August 1, 1942, Serial No. 453,216

12 Claims. (Cl. 206—1.5)

This invention relates to improvements in dispensing containers.

The main objects of this invention are:

First, to provide a dispensing container well adapted for cigarettes and the like which automatically opens when in upright position and automatically closes when inverted, the closing taking place at such stage of the reverse movement as to prevent spilling of the contents.

Second, to provide a dispensing container which when in inverted position has the lid or closure thereof entirely concealed.

Third, to provide a dispensing container having these advantages which may be embodied in highly attractive casings for desk, table or smokers' stand use.

Further objects pertaining to details and economies of the invention will definitely appear from the description to follow. The invention is defined in the claims.

A container embodying the features of the invention is clearly illustrated in the accompanying drawing, in which:

Fig. 1 is an inverted perspective view partially broken away of a dispensing container embodying the features of my invention.

Fig. 2 is a perspective view with the container in upright position, cigarettes being indicated therein.

Fig. 3 is a vertical central longitudinal section with the container in upright position.

Fig. 4 is a transverse section partially in section on line 4—4 of Fig. 3 and partially in broken section to show details of the hinging of the lid.

Fig. 5 is a fragmentary longitudinal section corresponding to that of Fig. 3 with the container in inverted position.

Fig. 6 is a perspective view of the lid actuating weight.

The embodiment of my invention illustrated consists of a receptacle comprising outer side walls 1, 1 end walls 2, 2 and bottom 3 fixedly secured together as by gluing. These walls, however, may be effectitvely molded of plastic material. In this embodiment I provide inner or liner walls 4, 4 and 5, 5 which are disposed within the outer walls with their upper edges of the outer walls forming a continuous inner ledge 6. The inner side walls have vertical grooves 7 therein receiving the ends of the transverse partition 8. This partition provides a front article compartment 9 and a rear compartment 10 in which the operating mechanism is positioned.

The transverse partition 8 has spaced vertical strips 11 secured to the rear side thereof. These strips or pieces 11 constitute supports for the pivot 12 of the lid 13 and also guide members for the weight 14, the side and rear walls constituting further guide members for supporting the weight for free sliding movement. The weight 14 of the embodiment illustrated is formed of wood with metal inserts 15, see Fig. 4. The lid is provided with a downwardly offset arm 16 receiving the pivot pin 12 and longitudinally slotted at 17 to engage the pin 18 extending between the spaced lugs 19 on the weight. The arm 16 extends between these lugs with its slot in engagement with the pin 18 as clearly shown in Figs. 3 and 5.

A cover 20 is provided for the rear compartment arranged on the upper edges of the inner wall members to complement the lid 13 which closes upon the upper edges of the wall members, the pivot point for the lid being offset from the plane of the lid so that the lid and the cover section lie in the same plane when the container is closed.

The weight 14 is freely slidable and acts to open the lid when the container is in upright position and to close it when the container is in inverted position. It is necessary, however, to close the lid during the tilting or turning of the container from upright to inverted position in order to prevent the contents from falling out. This I accomplish by means of a coiled spring 21 arranged on a post 22 projecting upwardly from the bottom of the receptacle and received in a bore 23 provided therefor in the weight. This spring is of sufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid when in such position. When in inverted position the spring supplements the weight. The spring is of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position, and this results in the closing of the lid when the container is in such position, thereby preventing the escape of the contents.

When the container is of substantial size in proportion to the articles dispensed, the dispensing compartment 9 is provided with intersecting partitions 24 and 25 providing a plurality of cells 26 adapted to receive the articles dispensed such as cigarettes indicated at 27. Thus arranged, relatively slim elongated articles such as cigarettes are effectively retained and are supported in position for convenient grasping.

In a dispensing container of the dimensions

illustrated articles such as cigarettes would not stand upright when the number was reduced without these partitions, and some of them might slide out into the path of the closing lid before it was completely closed.

I have illustrated and described an embodiment of my invention which I have found highly satisfactory. I contemplate various modifications and adaptations in regard to materials used and also for dispensing articles other than cigarettes. I have not attempted to illustrate and describe such modifications and adaptations as it is believed this disclosure will enable those skilled in the art to embody the invention as may be desired.

Having thus described my invention what I claim as new and desire to secure by Letters Patent is:

1. In a dispensing container, the combination with a receptacle comprising a bottom and outer and inner side and end walls, the inner side and end walls being arranged with their upper edges below the top of the outer side and end walls, opposite inner walls having vertical grooves therein, a partition member slidably engaged in said grooves and providing front and rear compartments, said partition member having pivot supporting members on its rear side, a lid pivotally mounted on said pivot supporting members to close upon the upper edges of said inner walls and having a downwardly offset rearwardly projecting longitudinally slotted arm, a weight having a bore opening at the bottom thereof disposed in said rear compartment and slidably supported by the side and end walls and by said pivot members, said weight being provided with a pin engaging said slot in said arm, a top for said rear compartment arranged on the upper edges of said inner walls to complement said lid when it is in closed position, a post extending upwardly from the bottom of said receptacle into said bore in said weight, a spring on said post acting on said weight, said spring being of insufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid when in such position and closes it when the receptacle is in inverted position, the spring being of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position, and partition members arranged in said front compartment to provide a plurality of cells adapted to receive elongated articles endwise therein, the cells being of such dimensions as to permit the tilting of the articles arranged therein.

2. In a dispensing container, the combination with a receptacle comprising a bottom and outer and inner side and end walls, the inner side and end walls being arranged with their upper edges below the top of the outer side and end walls, opposite inner walls having vertical grooves therein, a partition member slidably engaged in said grooves and providing front and rear compartments, said partition member having pivot supporting members on its rear side, a lid pivotally mounted on said pivot supporting members to close upon the upper edges of said inner walls and having a downwardly offset rearwardly projecting longitudinally slotted arm, a weight having a bore opening at the bottom thereof disposed in said rear compartment and slidably supported by the side and end walls and by said pivot members, said weight being provided with a pin engaging said slot in said arm, a top for said rear compartment arranged on the upper edges of said inner walls to complement said lid when it is in closed position, a post extending upwardly from the bottom of said receptacle into said bore in said weight, and a spring on said post acting on said weight, said spring being of insufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid when in such position and closes it when the receptacle is in inverted position, the spring being of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position.

3. In a dispensing container, the combination with a receptacle open at the top, a partition providing front and rear compartments, a lid for said front compartment pivotally mounted at the rear of said partition and having a downwardly offset rearwardly projecting longitudinally slotted arm, a weight having a bore opening at the bottom thereof disposed in said rear compartment and slidably supported by the side and end walls and by said pivot members, said weight being provided with a pin engaging said slot in said arm, a top for said rear compartment complementing said lid when it is in closed position, a post extending upwardly from the bottom of said receptacle into said bore in said weight, a spring on said post acting on said weight, said spring being of insufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid when in such position and closes it when the receptacle is in inverted position, the spring being of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position, and partition members arranged in said front compartment to provide a plurality of cells adapted to receive elongated articles endwise therein, the cells being of such dimensions as to permit the tilting of the articles arranged therein.

4. In a dispensing container, the combination with a receptacle open at the top, a partition providing front and rear compartments, a lid for said front compartment pivotally mounted at the rear of said partition and having a downwardly offset rearwardly projecting longitudinally slotted arm, a weight having a bore opening at the bottom thereof disposed in said rear compartment and slidably supported by the side and end walls and by said pivot members, said weight being provided with a pin engaging said slot in said arm, a top for said rear compartment complementing said lid when it is in closed position, a post extending upwardly from the bottom of said receptacle into said bore in said weight, and a spring on said post acting on said weight, said spring being of insufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid when in such position and closes it when the receptacle is in inverted position, the spring being of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position.

5. In a dispensing container, the combination with a receptacle open at the top, a partition providing front and rear compartments, a lid for said front compartment pivotally mounted in said rear compartment, a weight slidably dis-

posed in said rear compartment and operatively connected to said lid, a post in said rear compartment, a spring on said post acting on said weight, said spring being of insufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid, when in such position and closes it when the receptacle is in inverted position, the spring being of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position, and partition members arranged in said front compartment to provide a plurality of cells adapted to receive elongated articles endwise therein, the cells being of such dimensions as to permit the tilting of the articles arranged therein.

6. In a dispensing container, the combination with a receptacle open at the top, a partition providing front and rear compartments, a lid for said front compartment pivotally mounted in said rear compartment, a weight slidably disposed in said rear compartment and operatively connected to said lid, a post in said rear compartment, and a spring on said post acting on said weight, said spring being of insufficient tension to sustain the weight when the receptacle is in upright position whereby the weight acts to open the lid when in such position and closes it when the receptacle is in inverted position, the spring being of sufficient tension to shift the weight toward cover closing position when the receptacle is turned from its upright position to an approximately horizontal position.

7. In a dispensing container, a receptacle open at the top, a lid pivotally mounted within said receptacle to lie within the upper edges thereof when closed, said lid having a rearwardly projecting slotted arm, a weight slidably supported within said receptacle and having a pin engaging said slotted arm, said weight acting to open said lid when the receptacle is in upright position and to close it when the receptacle is inverted, and a spring acting on said weight to urge it to lid closing position, the spring being of insufficient tension to sustain the weight in cover closing position when the receptacle is in upright position but of sufficient tension to shift the weight toward cover closing position when the receptacle is substantially tilted from its upright position.

8. In a dispensing container, a receptacle open at the top, a lid pivotally mounted within said receptacle to lie within the upper edges thereof when closed, said lid having a rearwardly projecting slotted arm, a weight slidably supported within said receptacle and having a pin engaging said slotted arm, said weight acting to open said lid when the receptacle is in upright position and to close it when the receptacle is inverted, and a spring acting on said weight to urge it to lid closing position, the spring being of insufficient tension to sustain the weight in cover closing position when the receptacle is turned from upright position to an approximately horizontal position, said receptacle being provided with a plurality of cells adapted to receive elongated articles endwise thereof, the cells being of such transverse dimension as to limit the tilting of the articles arranged therein.

9. In a dispensing container, a receptacle open at the top, a lid pivotally mounted within said receptacle to lie within the upper edges thereof when closed, said lid having a rearwardly projecting slotted arm, a weight slidably supported within said receptacle and having a pin engaging said slotted arm, said weight acting to open said lid when the receptacle is in upright position and to close it when the receptacle is inverted, and a spring acting on said weight to urge it to lid closing position, the spring being of insufficient tension to sustain the weight in cover closing position when the receptacle is turned from upright position to an approximately horizontal position.

10. In a dispensing container, a receptacle open at the top, a lid pivotally mounted within said receptacle to lie within the upper edges thereof when closed, a weight slidably supported within said receptacle and operatively connected to said lid, said weight acting to open said lid when the receptacle is in upright position and to close it when the receptacle is inverted, and a spring acting on said weight to urge it to lid closing position, the spring being of insufficient tension to sustain the weight in cover closing position when the receptacle is in upright position but of sufficient tension to shift the weight toward cover closing position when the receptacle is substantially tilted from its upright position.

11. In a dispensing container, a receptacle open at the top, a lid pivotally mounted within said receptacle to lie within the upper edges thereof when closed, a weight slidably supported within said receptacle and operatively connected to said lid, said weight acting to open said lid when the receptacle is in upright position and to close it when the receptacle is inverted, and a spring acting on said weight to urge it to lid closing position, the spring being of insufficient tension to sustain the weight in cover closing position when the receptacle is turned from upright position to an approximately horizontal position, said receptacle being provided with a plurality of cells adapted to receive elongated articles endwise thereof, the cells being of such transverse dimension as to limit the tilting of the articles arranged therein.

12. In a dispensing container, a receptacle open at the top, a lid pivotally mounted within said receptacle to lie within the upper edges thereof when closed, a weight slidably supported within said receptacle and operatively connected to said lid, said weight acting to open said lid when the receptacle is in upright position and to close it when the receptacle is inverted, and a spring acting on said weight to urge it to lid closing position, the spring being of insufficient tension to sustain the weight in cover closing position when the receptacle is turned from upright position to an approximately horizontal position.

ROBERT C. SHIPLEY.