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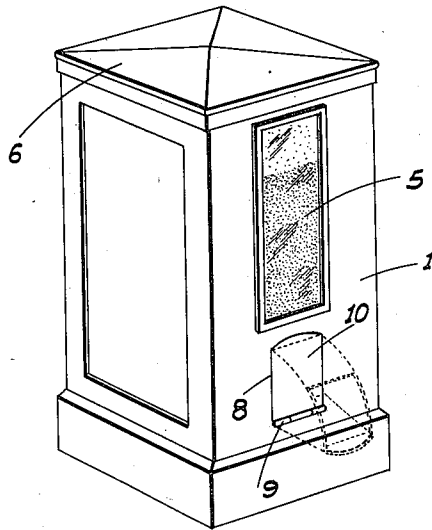
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2,050,756

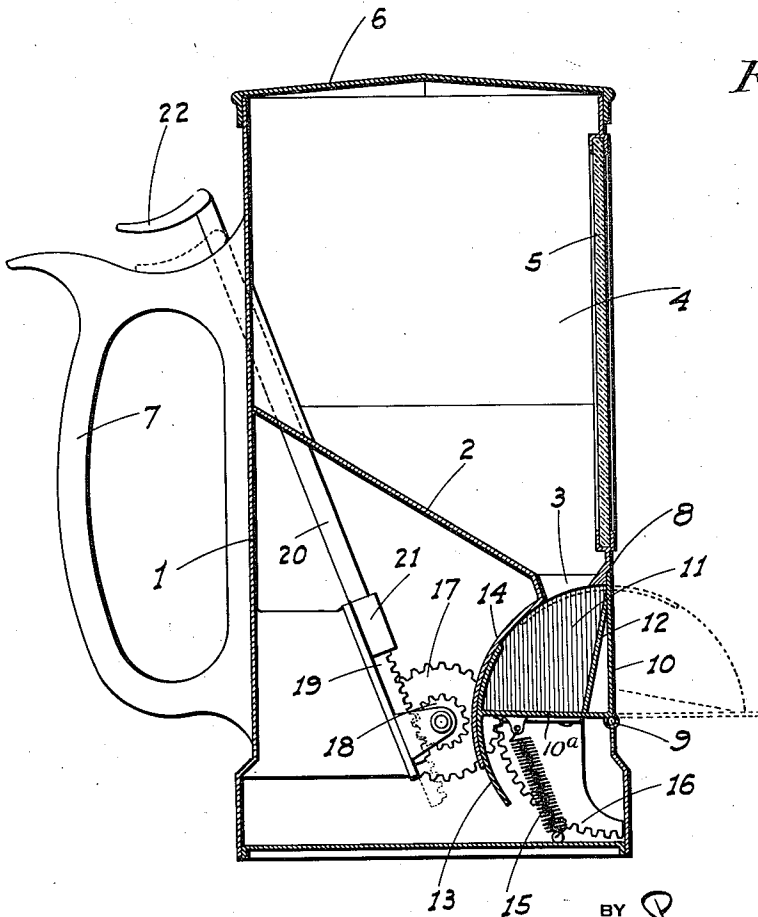
DISPENSER

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*Fig. 1*



*Fig. 2*



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## UNITED STATES PATENT OFFICE

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DISPENSER

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5 Claims. (Cl. 221-107)

This invention relates to dispensers, my principal object being to provide a table dispenser for granular material, preferably sugar, and from which a metered amount of the material may be discharged at the will of the user.

A further object is to provide a dispenser of this character for sugar or the like which will be exceedingly sanitary and therefore especially adapted for use in restaurants, hotels and other public eating places, as well as for home use. The supply of sugar or other material is always enclosed and cannot be contaminated from outside sources, thereby assuring the user that the material as dispensed from the device is in a perfectly clean and sanitary condition.

A further object of the invention is to produce a simple and inexpensive device and yet one which will be exceedingly effective for the purpose for which it is designed.

These objects I accomplish by means of such structure and relative arrangement of parts as will fully appear by a perusal of the following specification and claims.

In the drawing similar characters of reference indicate corresponding parts in the several views:

Figure 1 is a perspective view of my improved dispenser, looking at the front of the same.

Figure 2 is a central transverse vertical section of the dispenser.

Referring now more particularly to the characters of reference on the drawing, the numeral 1 denotes a container of suitable size and shape for table use. This container is provided with a false bottom 2 some distance from its lower end, which has a downward slope toward the front and terminates in an outlet 3 adjacent the front wall of the container. The space above the bottom 2 forms the sugar or material retaining compartment 4, there being a vertical window 5 in the front wall of the compartment to indicate the amount of sugar therein. A removable lid 6 on the container enables such supply to be replenished when necessary. A handle 7 of suitable form and size is mounted on the container at the back.

The front wall of the container below the compartment 4 is provided with a rectangular opening 8 along the bottom of which a combination metered receptacle and spout is pivoted as at 9. This spout comprises walls 10 and 10a radiating from the hinge or pivot 9 and set substantially 90° to each other, and side wings 11 whose outer edges are curved concentric with said pivot. The wall 10 is vertical and

forms the closure for the opening 8 when the spout is in its closed position, the spout as a whole being then inside the container and the wall 10a being then substantially horizontal.

When the spout is swung out to a dispensing position the wall 10 assumes a substantially horizontal position while the wall 10a is then vertical and closes the opening A from behind. To aid in the discharge of sugar from the spout without an excessive tilting of the container being necessary, I may provide said spout with a false bottom 12 extending to the wall 10a from adjacent the outer edge of the wall 10 and sloping away from the latter.

The outlet 3 communicates with the spout when the latter is in its inward or closed position, and to confine the sugar within the spout as well as to close the spout when the latter is swung outwardly to a discharge or dispensing position, I mount a curved plate 13 on the spout which cooperates with a similarly curved plate 14 fixed in the container and depending from the opening 3. Both plates are concentric with the pivot 9 and extend the full width of the spout between the wings 11; the plate 13 projecting some distance on opposite sides of the wall 10a as clearly shown in Figure 2.

The plate 14 actually extends to the front of the container at the sides of the outlet 3 to provide close contact with the edges of the wings 11 and thus prevent spilling of the sugar from the side edges of the spout. The plate 13 is arranged so that before the spout has reached its discharging position, said plate has covered the outlet 3 thus preventing further dropping of sugar from the outlet into the spout.

The spout is normally maintained in its closed position by a tension spring 15 applied thereto, and is moved outwardly at the option of the operator and against the resistance of the spring by a segmental gear 16 fixed with the spout within the container and concentric with the pivot 9. This gear meshes with a pinion 17 mounted in a fixed position in the container, while a smaller pinion 18 fixed with the pinion 17 is engaged by a rack 19. This rack is provided with a rigid upward extension 20 slidably guided in a bearing sleeve 21 and projecting through the back of the container near the top at an acute angle thereto to a termination above the handle 7, where it is provided with a finger pad 22.

The extension and pad are disposed centrally of the handle in a transverse plane so that it can be conveniently depressed by either a right

or left hand person. Also said pad is placed relative to the handle so that it may be readily depressed by the thumb of the hand grasping the handle. The gearing is arranged so that  
 5 with a relatively small amount of depressing movement of the finger pad and rack, the spout will be rotated through an arc of substantially 90°.

In operation, when it is desired to discharge  
 10 sugar from the dispenser into a cup for instance, the operator merely lifts the container by the handle holding the same so that the spout when swung down will be over the cup. He then presses down on the pad 22 which rotates the  
 15 pinions and gear and causes the already loaded spout to swing down and discharge its contents into the cup. When the pressure on the pad is released the spring 15 of course acts to immediately return the spout to its closed position,  
 20 where it will again instantly fill up readily for a subsequent dispensing operation.

From the foregoing description it will be readily seen that I have produced such a device as  
 25 substantially fulfills the objects of the invention as set forth herein.

While this specification sets forth in detail the present and preferred construction of the device, still in practice such deviations from such  
 30 detail may be resorted to as do not form a departure from the spirit of the invention, as defined by the appended claims.

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

35 1. A dispenser comprising a container to removably rest on a flat surface and having vertical walls, a compartment for material formed in said container and having a bottom above the  
 40 lower edge of the walls, said bottom having an outlet adjacent the front wall and said wall having an opening below said bottom, a combination spout and metering receptacle, a pivot for said receptacle on the front wall along the  
 45 bottom of the opening, said receptacle including walls radiating from the pivot and one such wall extending vertically and closing said opening when the receptacle is in communication with the  
 50 bottom outlet and is disposed inwardly of the front wall of the container, and means operable from the back of the container for swinging the receptacle outwardly about its pivot.

2. A dispenser comprising a container to removably rest on a flat surface and having vertical  
 55 walls, a compartment for material formed in said container and having a bottom above the lower edge of the walls, said bottom having an outlet adjacent the front wall and said wall having an opening below said bottom, a combination  
 60 spout and metering receptacle, a pivot for said receptacle on the front wall along the bottom of the opening, said receptacle including walls radiating from the pivot and one such wall extending vertically and closing said opening when  
 65 the receptacle is in communication with the bottom outlet and is disposed inwardly of the front wall of the container, means for swinging the receptacle from such position outwardly about its pivot, and a false bottom in the receptacle  
 70 extending inwardly thereof in diverging relation to and from the outer edge of said one wall.

3. A dispenser comprising a container to removably rest on a flat surface and having vertical  
 75 walls, a compartment for material formed in said container and having a bottom above

the lower edge of the walls, said bottom having an outlet adjacent the front wall and said wall having an opening below said bottom, a combination  
 5 spout and metering receptacle, a pivot for said receptacle on the front wall along the bottom of the opening, said receptacle including walls radiating from the pivot and one such wall forming a closure for said opening when the  
 10 receptacle is inwardly of said front wall and is in communication with the outlet, a segmental spur gear fixed with and depending from the receptacle concentric with said pivot, and within  
 15 the container, a pinion mounted within the container and engaging the gear adjacent its upper end when the receptacle is in said inward position, and means operable from the back of the container for rotating said pinion.

4. A dispenser comprising a container to removably rest on a flat surface and having vertical  
 20 walls, a compartment for material formed in said container and having a bottom above the lower edge of the walls, said bottom having an outlet adjacent the front wall and said wall having an opening below said bottom, a combination  
 25 spout and metering receptacle, a pivot for said receptacle on the front wall along the bottom of the opening, said receptacle including walls radiating from the pivot and one such wall forming a closure for said opening when  
 30 the receptacle is inwardly of said front wall and is in communication with the outlet, a segmental spur gear fixed with and depending from the receptacle concentric with said pivot, and within  
 35 the container, a pinion mounted within the container and engaging the gear, a handle on the back of the container, and means to rotate the pinion from the handle and including a depressible  
 40 rack bar slidably mounted in the container and projecting to an upper termination behind and adjacent the container and above the handle, in transverse alinement therewith, and an  
 45 operating element on the upper end of the bar.

5. A dispenser comprising a container to removably rest on a flat surface and having vertical  
 50 walls, a compartment for material formed in said container and having a bottom above the lower edge of the walls, said bottom having an outlet adjacent the front wall and said wall having an opening below said bottom, a combination  
 55 spout and metering receptacle, a pivot for said receptacle on the front wall along the bottom of the opening, said receptacle including walls radiating from the pivot and one such wall forming a closure for said opening when the  
 60 receptacle is inwardly of said front wall and is in communication with the outlet, a segmental spur gear fixed with and depending from the receptacle concentric with said pivot, and within the  
 65 container, a pinion mounted within the container and engaging the gear, a vertical loop-like handle on the back of the container, a rack bar vertical in a transverse plane extending downwardly from a point adjacent the point of  
 70 connection of the handle with the container and above said handle to a lower termination inside the container below the chamber, an element on the upper end of the bar engageable by a  
 finger of the hand grasping the handle to depress the bar, and gearing connections between the rack bar adjacent its lower end and said  
 gear to rotate the latter in a direction to swing the receptacle forwardly with the depression of the rack bar.