To all whom it may concern:

Be it known that I, Richard A. Clinchy, a citizen of the United States, and a resident of Forest Hills, county of Queens, and State of New York, have invented certain new and useful improvements in Lump-Sugar Dispensers, of which the following is a specification.

My invention relates in general to dispensing apparatus and in particular to apparatus for dispensing lump sugar, and is characterized by its simplicity, its convenience of operation, and its protective features, which will appear from the following description.

A sugar container provided with a tiltable tray adapted to receive one lump of sugar at a time from the bottom of a stack of lumps, has been proposed. A container of this character has, however, several objections; it requires several manipulations to secure the number of lumps of sugar usually desired; it is not positive in operation; it requires a clear space in front of the container to operate the tray; and is likely to be constantly overturned due to its height.

In the accompanying drawings illustrating one example of my invention, Figure 1 is a perspective view of my apparatus with the hatch cover open; Fig. 2 a fragmentary section of Fig. 3 on the line 2—2; Fig. 3 a fragmentary top plan view of Fig. 1; Fig. 4 a section of Fig. 2 on the broken line 4—4; and Fig. 5 a fragmentary detail of Fig. 2 with the hatch cover closed.

Referring to the drawings, a container 5 has a plurality of supporting pedestals 6, a hatch opening 7, and a truss 8 having a hatch cover 9 adapted to close said opening 7 hinged thereto. The container 5 has guides 10 adapted to engage the guide grooves of a slidable cover 11 which covers the major portion of the container. A flexible locking member 12 is secured to the lower side of the truss 8. A plurality of cylindrical cam members 13, eccentrically mounted on the hinges pin 14, are secured to the hatch cover 8. The container 5 is divided, in the example shown in the drawing, into two magazine compartments by the partition 15 and has attached thereto the guide member 16. Slidably mounted on this guide member is an ejector plate 17 having a guide hub 18 and provided, on each side of the guide member 16, with handles 19 and 20. At the end of the guide member 16 an opening 22 is provided through which a stop ring 23 passes. A trigger member, indicated in its entirety by 24, comprises the trigger 25 and the tiltable trigger plate 26. This plate is loosely mounted on the guide member 16. A helical spring 27 bears between the guide lug 18 and the trigger plate 26, the end of the spring bearing on the trigger plate 26 being so arranged as to maintain the trigger plate in a tilted position. The tilting of the trigger plate 26 is accomplished by positioning the spring 27 so that the end of said spring bears on the lower portion of the trigger plate 26, as will be readily understood from the drawing.

In using my device, the cover 11 is removed from the container 5 and the ejector plate 17 is pulled back by means of the handles 19 and 20 until the plate 17 locks with the trigger 25. Lumps of sugar are then placed in the container in the position substantially as shown in the drawings and the trigger 25 released from the pressure plate 17. The spring 27 then bears against the ejector plate 17, thus creating a continuous forward pressure on the lumps of sugar until the magazine is empty. When it is desired to remove any of the sugar, the hatch cover 9 is opened, and the cam 13 rotating therewith, bears on the flexible member 12 and depresses this member. The flexible member 12 then bears on the second row of sugar substantially as shown in Fig. 2 and locks it in position. The front row of sugar may then be removed while the second row of sugar is prevented from advancing by the pressure of the cam 13 on the flexible members 12. These flexible members also function in tending to prevent the sugar from being pilfered from the container as the cover must be closed to permit the next row of sugar to move forward. The cover, when the sugar has been removed as above described, is then closed and the cam 13 rotating therewith releases the flexible member 12 and permits the spring 27 acting on the ejector plate 17 to force the sugar contents of said container toward the hatch opening 7. The sugar is then in position for repeating the operations above mentioned. It will be understood that if three lumps of sugar are removed from the
front row in the structure shown in the drawings, that the second row will not advance until the remaining three or entire front row has been removed. It is obvious, however, that instead of having a single spring and a single ejector plate, as 17 that two separate ejector plates, each provided with a spring similar to 27, might be employed. The lumps of sugar in each magazine section would then advance independently of the other. I would consider this to be an obvious modification of my apparatus and within the scope of my claims.

Various other modifications may be made without departing from the spirit and scope of the appended claims.

I claim:

1. A lump sugar dispenser comprising a container having a hatch opening provided with a hatch cover and adapted to contain lumps of sugar, means in said container adapted to move the lumps of sugar toward said openings and means operated by said cover to hold the sugar in place.

2. A sugar dispenser comprising a container having a hatch opening and adapted to hold a plurality of sugar lumps, a longitudinal partition in the container having a guide member, an ejector plate slidably mounted on said guide member, and resilient means bearing on said ejector plate and guide member, whereby the sugar is moved toward the said opening as the front rows of sugar are removed.

3. A sugar dispenser comprising a container having a hatch opening and adapted to contain a plurality of sugar lumps, a longitudinal partition having a guide member, an ejector plate slidably mounted on said guide member, a stop plate mounted on said guide member having a trigger secured thereto, a spring bearing between said ejector plate and stop plate whereby the ejector plate is pressed against the rear row of sugar so that as the first row is removed the contents of said container are moved toward said opening.

4. A sugar dispenser comprising a container having a hatch opening adapted to hold a plurality of sugar lumps, a cover for said opening, resilient means adapted to be actuated by the movement of said cover, whereby the sugar is locked in position when the cover is open.

5. A sugar dispenser comprising a container having a hatch opening, a cover for said opening having a cam, a flexible member secured to said container and adapted to be depressed by the action of said cam, whereby the lumps of sugar under said flexible member are locked in position.

In testimony whereof I have hereunto set my hand.

RICHARD A. CLINGEY.