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(54) **CONTAINER**

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(76) Inventor: **Dai Chong Wong, Hong Kong (CN)**

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(57) **ABSTRACT**

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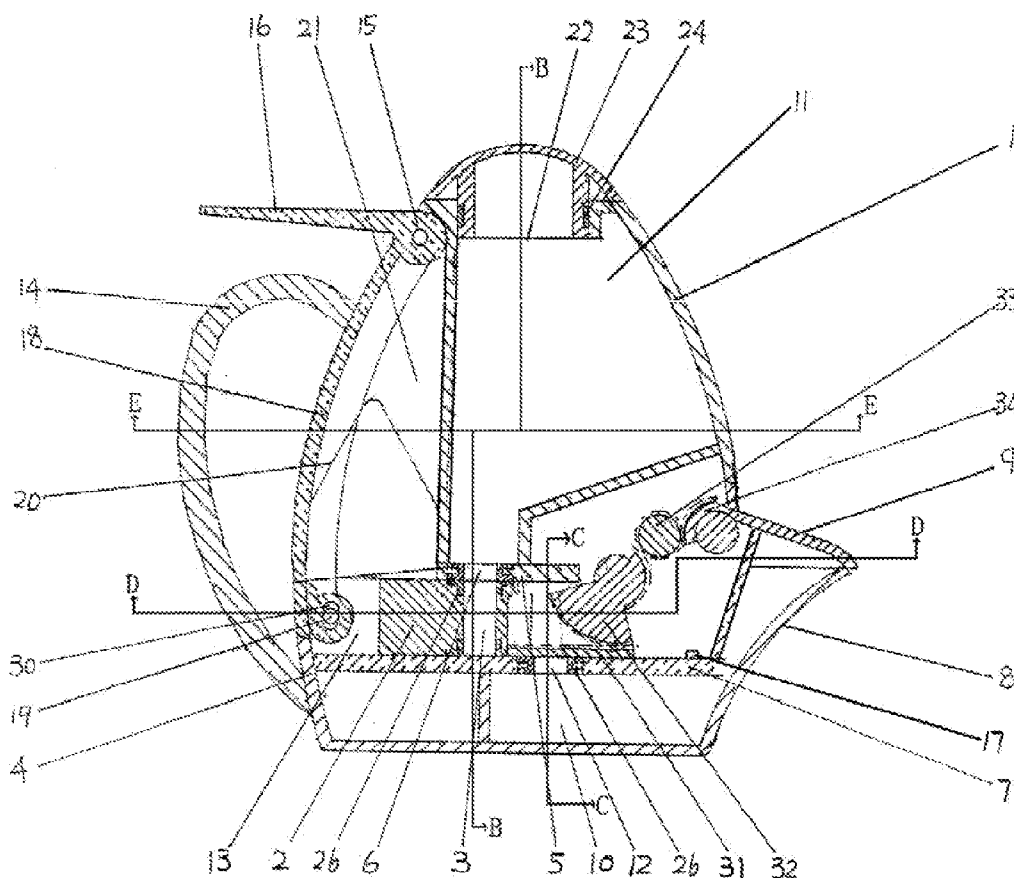
A container comprises a housing having a feeding opening and an outlet and severing to receive grained or powdered material, characterized in that the housing also includes a storing room; a sliding block; a feeding room; wherein the storing room includes a feeding opening disposed on an upper end thereof, and a first hole mounted on a lower end thereof; the sliding block includes a store chamber, and the feeding room includes a second hole fixed on an upper end thereof and an outlet secured on a side thereof; wherein the sliding block is defined between the storing room and the feeding room, and upper and a lower ends of the store chamber of the sliding block are in communication with the storing room or the feeding room.

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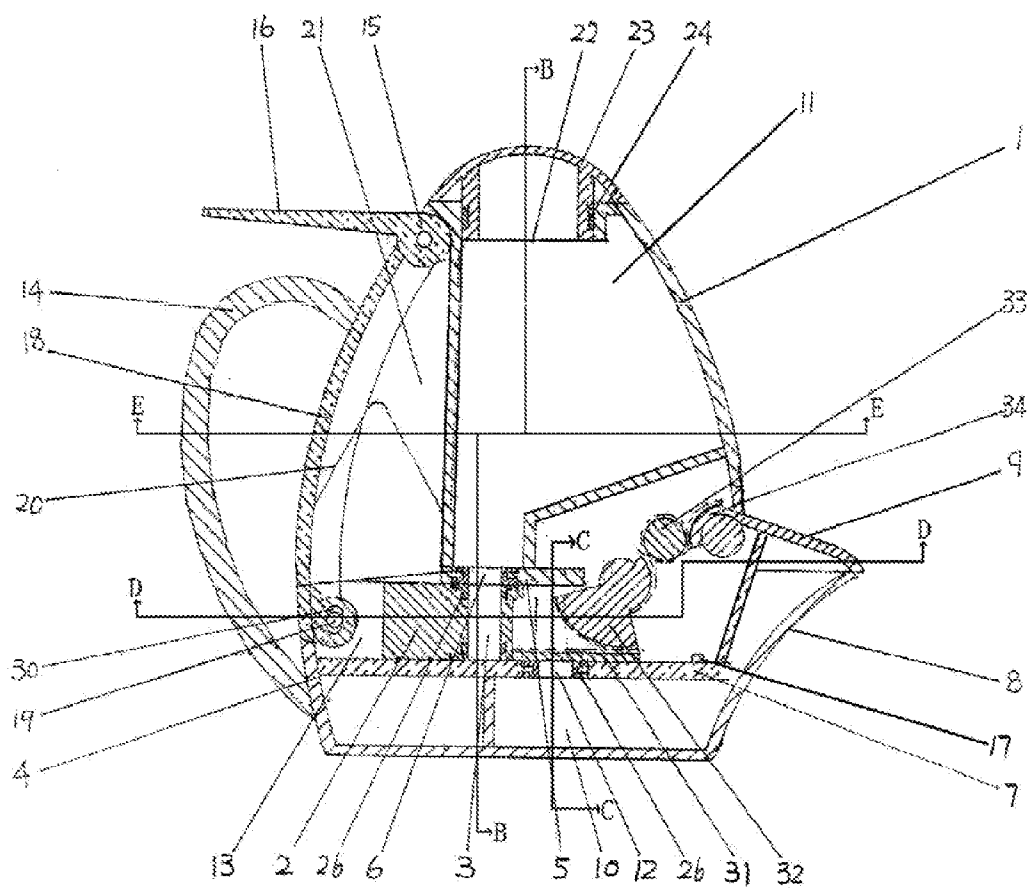


Fig.1

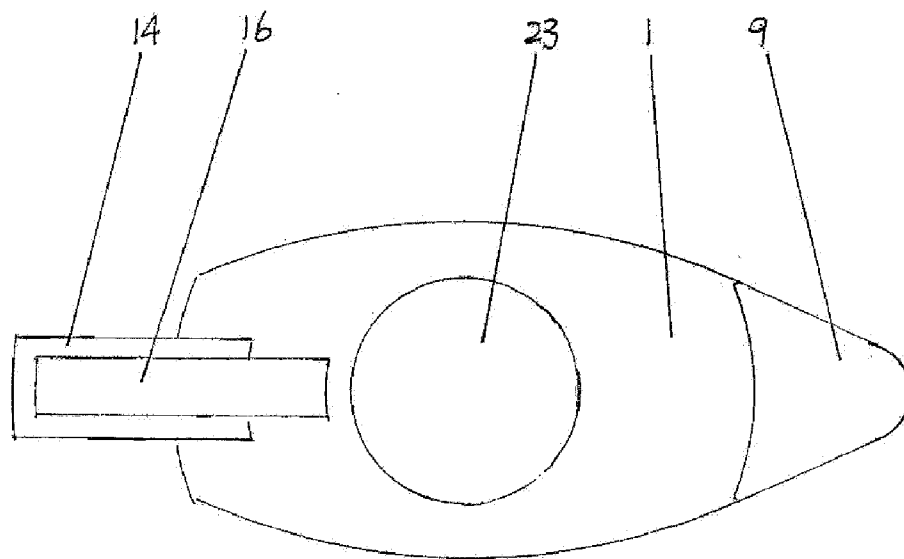


Fig.2

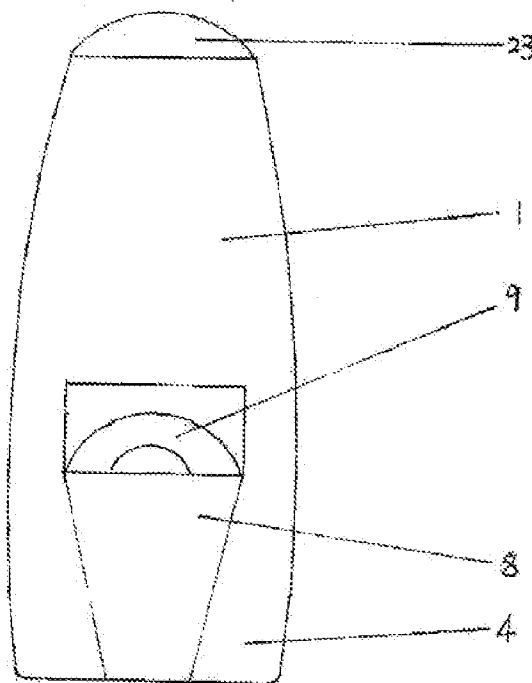


Fig.3

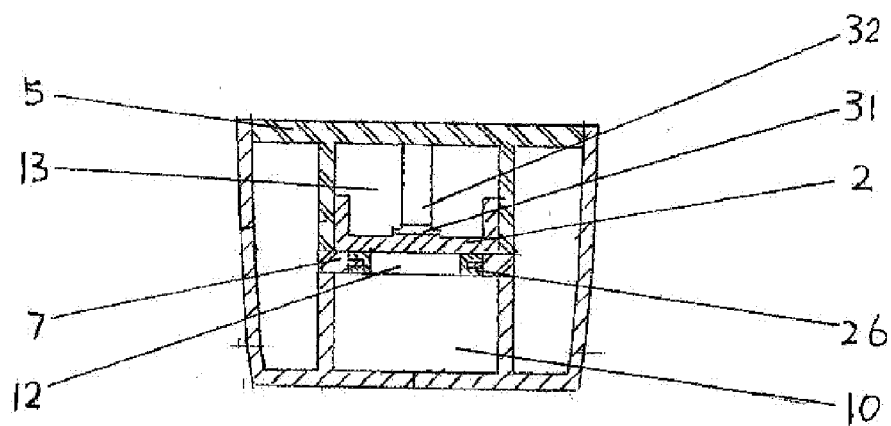


Fig.4

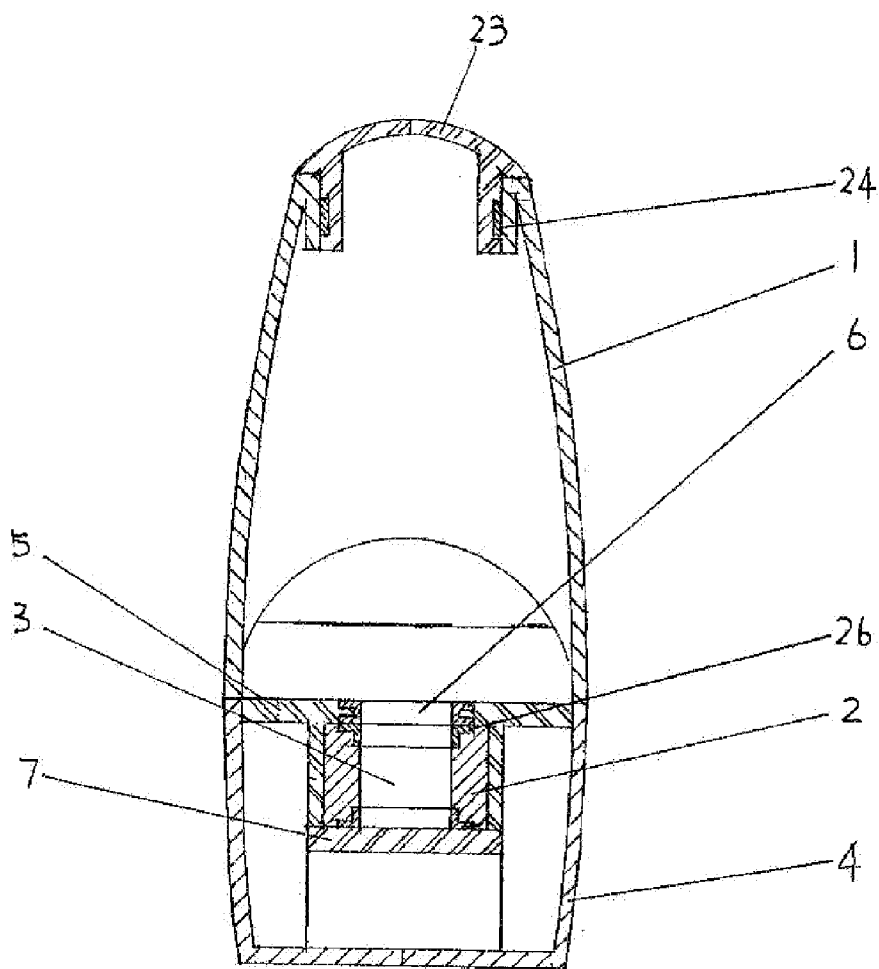


Fig.5

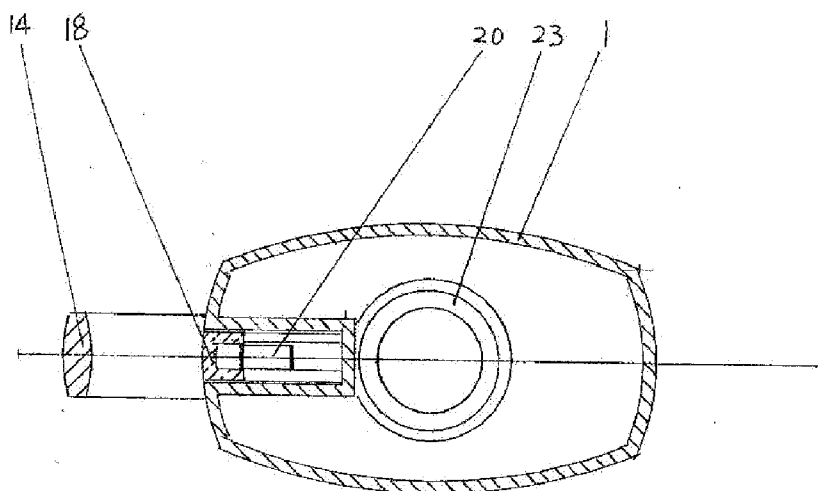


Fig.6

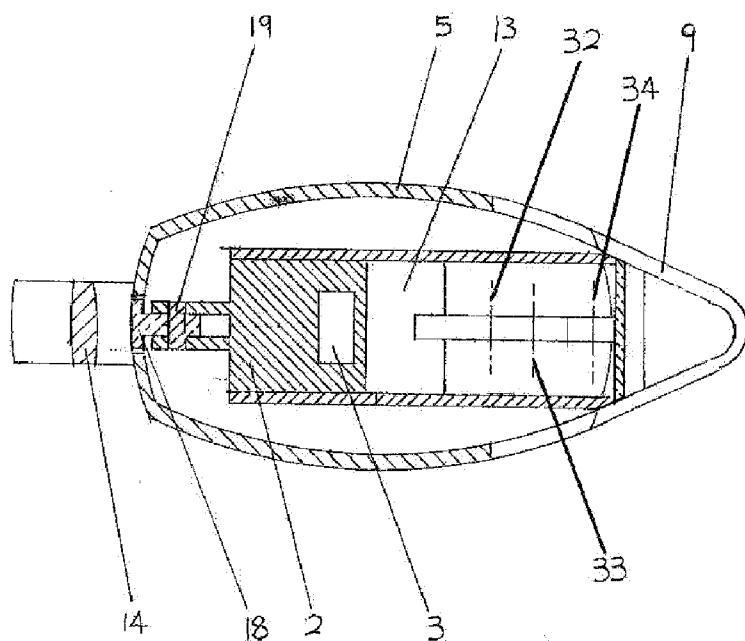


Fig.7

图 7

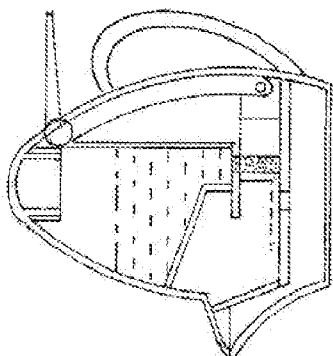


Fig. 8

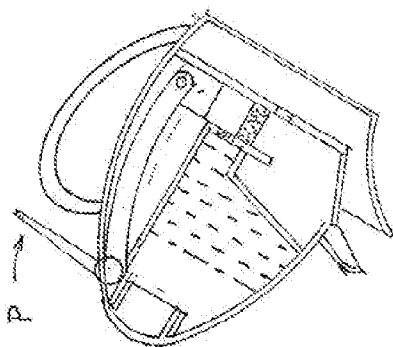


Fig. 9

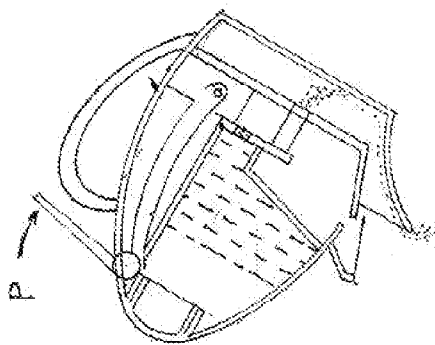


Fig. 10

CONTAINER

SUMMARY OF THE INVENTION

BACKGROUND OF THE INVENTION

[0001] 1. Field of the Invention

[0002] The present invention relates to a container to hold grained or powered material.

[0003] 2. Description of the Prior Art

[0004] Conventional containers includes a spoon attached thereon to feed material on the spoon, includes a plurality of bores formed thereon to pour material, includes a feeding tube inserted thereon to pour material through the tube, or includes a door secured thereon to pour material after opening the door, however such conventional containers can not feed material fixedly every time.

[0005] U.S. Pat. No. 5,490,615 discloses a dispenser has a plunger which is pressed downwardly by the user to dispense condiments, such as salt, pepper, sugar, spices, etc. An adjusting device can be set to determine a predetermined amount to be dispensed by each stroke of the plunger. The plunger structure has a dispensing head which passes through an outlet opening in the base of the device. The head has a plurality of vertically spaced recesses with walls separating the recesses. The walls form an acute angle with the plane of the outlet opening. The base can be slipped over a resilient sealing member at the lower end of the dispensing head to remove and replace the base for refilling and cleaning of the dispenser. Resilient seals are used to seal the openings between the housing and the outside air so as to minimize clogging and jamming of the moving parts of the device due to humid air. The plunger can be locked to prevent unwanted dispensing, and to tighten the seals to facilitate washing, refilling and transportation of the dispenser. The device dispenses a predetermined quantity of condiment with each stroke reliably and with a minimum danger of jamming. However, such a dispenser can not pour fixed amount of material every time, and remains attach on the plastic loop to get the material wet.

[0006] U.S. Pat. No. 5,169,049A disclose a shaker for sprinkling a preset amount of a granulated material, such as table salt, having a removable closure with a plurality of small apertures, an upper discharge chamber below the closure for receiving a granulated material from a measuring chamber in a lower portion of the shaker and an intermediate chamber between the upper discharge chamber and lower measuring chamber for storing granulated material. The intermediate chamber has a plurality of small apertures for filling the measuring chamber with a preset amount of granulated material from the intermediate chamber. A delivery tube extends upwardly from the lower measuring chamber to the discharge chamber for emptying the measuring lower chamber of the preset amount of granulated material when the shaker is inverted. The upper portion of the measuring chamber forms a shake-back guard to prevent additional granulated material from entering the measuring chamber when the shaker is inverted and shaken to sprinkle the material from the shaker. However, such a shaker can not pour material at a fixed amount, and the material is easy to attach on the shaker to get wet or jammed.

[0007] The present invention has arisen to mitigate and or obviate the afore-described disadvantages.

[0008] The primary object of the present invention is to provide a container which is capable of overcoming the shortcomings of the conventional container.

[0009] A further object of the present invention is to provide a container which is capable of feeding material fixedly every time.

[0010] Another object of the present invention is to provide a container which is capable of scraping remains attached on a wall as feeding material to keep the sliding block moving smoothly and obtain a sealing effect, thus preventing material from getting wet and decayed.

[0011] To obtain the above objective, a container provided by the present invention comprises:

[0012] a housing having a feeding opening and an outlet and severing to receive grained or powered material, characterized in that the housing also includes

[0013] a storing room;

[0014] a sliding block;

[0015] a feeding room; wherein

[0016] the storing room includes a feeding opening disposed on an upper end thereof, and a first hole mounted on a lower end thereof; the sliding block includes a store chamber, and the feeding room includes a second hole fixed on an upper end thereof and an outlet secured on a side thereof; wherein the sliding block is defined between the storing room and the feeding room, and upper and a lower ends of the store chamber of the sliding block are in communication with the storing room or the feeding room;

[0017] wherein the first hole of the storing room and the second hole of the feeding room are not in the same axial line;

[0018] wherein between the storing room and the feeding room is defined a recess to slide the sliding block therein, and the first hole and the second hole are in communication with the recess;

[0019] wherein the sliding block is in connection with a lever and a press arm, the lever is assembled with an upper end of the press arm, and a lower end of the press arm connects with the sliding block, the lever and the press arm are hinged to the housing;

[0020] wherein the housing includes a slot formed on an inner wall thereof, and the press arm is fixed in the slot, between the slot and the press arm is defined a spring;

[0021] wherein the store chamber includes a cylindrical cavity;

[0022] wherein the sliding block includes a rack mounted on a front end thereof to actuate a driving gear, an intermediate wheel, and a driven gear, and the rack engages with a driving gear, the driven gear is fixed to the plate member, and the rack actuates the plate member to open and to cover the outlet through the driving gear, the intermediate wheel, and the driven gear;

[0023] wherein the recess includes a front positioning block secured therein to limit the sliding block to slide;

[0024] wherein the first and the second holes include scrape loops to scrape remains fixed on peripheral sides thereof respectively;

[0025] wherein the cavity includes scrape loops arranged on an upper and a lower sides thereof individually.

BRIEF DESCRIPTION OF THE DRAWINGS

- [0026] FIG. 1 is a cross sectional view showing the assembly of a container in accordance with a preferred embodiment of the present invention;
- [0027] FIG. 2 is a top plan view of FIG. 1;
- [0028] FIG. 3 is a side plan view of FIG. 1;
- [0029] FIG. 4 is a cross sectional view taken along lines C-C of FIG. 1;
- [0030] FIG. 5 is a cross sectional view taken along lines B-B of FIG. 1;
- [0031] FIG. 6 is a cross sectional view taken along lines E-E of FIG. 1;
- [0032] FIG. 7 is a cross sectional view taken along lines D-D of FIG. 1;
- [0033] FIG. 8 is a plan view showing the operation of the container according to the preferred embodiment of the present invention;
- [0034] FIG. 9 is another plan view showing the operation of the container according to the preferred embodiment of the present invention;
- [0035] FIG. 10 is also another plan view showing the operation of the container according to the preferred embodiment of the present invention.

DETAILED DESCRIPTION OF THE PREFERRED EMBODIMENTS

[0036] Referring to FIGS. 1-7, a container according to a preferred embodiment of the present invention comprises a housing 1, a storing room 11, a sliding block 2, and a feeding room 10, wherein the closed storing room 11 is located at the housing 1 and includes a feeding opening 22 disposed on an upper end thereof, the feeding opening 22 includes a lid 23 covered thereon, and the storing room 11 includes a loading member 5 mounted on a lower end thereof, the loading member 5 includes a first hole 6 fixed thereon, the first hole 6 includes a scrape loop 26 secured on one side thereof, and the loading member 5 also includes a recess 13 arranged on a lower side thereof, the recess 13 includes the sliding block 2 received therein, and the sliding block 2 includes a cylindrical cavity 3 formed therein, the cavity 3 includes a scrape loop 26 disposed on an upper side thereof and another scrape loop 26 mounted on a lower side thereof. When the sliding block 2 is located at an original position, the cavity 3 is aligned to the first hole 6, and the cavity 3 is made to have 0.5 ml, 1 ml, 1.5 ml or 2 ml of volume selected by user, and the housing 1 further includes an index formed thereon to indicate the volume of the cavity 3. The recess 13 includes a partition 7 fixed on a lower side thereof, and the partition 7 includes a second hole 12 secured thereon, the second hole 12 includes a scrape loop 26 attached on a peripheral side thereof, and is located in front of the first hole 6 (the first and the second holes are crossed apart), and a distance between a rear side of the second hole 12 and a front side of the first hole 6 is equal to a width of the cavity 3 plus 1 to 2 mm. The scrape loop 26 is used to scrape remains attached on a wall as feeding material to keep the sliding block 2 moving smoothly and obtain a sealing effect, thus preventing material from getting wet and decayed. Between the partition 7 and the housing 1 is defined the feeding room 10 which includes an outlet 8 fixed on a side surface thereof, and the outlet 8 includes a plate member 9

covered thereon. The housing 1 also includes a slot 21 disposed on an inner wall thereof to correspond to a rear end of the sliding block 2, and the slot 21 includes a lever 16 and a press arm 18, wherein the lever 16 is assembled with an upper end of the press arm 18, and the press arm 18 includes an elongated bore 30 arranged on a lower end thereof to connect with a shaft 19 on a rear end of the sliding block 2 so that the press arm 18 swings reciprocately to actuate the sliding block 2 to move linearly. The lever 16 and the press arm 18 are hinged to the housing 1 by using a hinge pin 15, and most part of the lever 16 extends out of the housing 1. Between the press arm 18 and the slot 21 is defined a spring 20, and at a suit position of the housing 1 below the lever 16 is disposed a handle 14 to facilitate operation. The sliding block 2 includes a rack 31 mounted on a front end thereof to engage with a driving gear 32, and the driving gear 32 engages with a driven gear 34 through an intermediate wheel 33, and the driven gear 34 is fixed to the plate member 9.

[0037] Referring to FIGS. 8-10, in operation, the cavity 3 is aligned to the first hole 6 and stores material fully, and the plate member 9 is covered to the outlet 8, the lever 16 is pressed to actuate the press arm 18 to push the sliding block 2 so that the sliding block 2 moves forward, and the cavity 3 leaves from the first hole 6 to contact with the second hole 12 correspondingly so that the material falls to the feeding room 10. In the meantime, the rack 31 actuates the driving gear 32 to rotate, and then the driving gear 32 actuates the driven gear 34 to rotate via the intermediated wheel 33 and to open the plate member 9, thereby feeding material. Thereafter, the lever 16 is released to push the sliding block 2 to return original position by using the spring 20 so that material in the storing room 11 falls to the cavity 3, and the plate member 9 is covered to the outlet 8.

[0038] The container is made of glass, plastic or metal material.

[0039] While we have shown and described various embodiments in accordance with the present invention, it is clear to those skilled in the art that further embodiments may be made without departing from the scope of the present invention.

What is claimed is:

1. A container comprising
 - a housing having a feeding opening and an outlet and severing to receive grained or powered material, characterized in that the housing also includes
 - a storing room;
 - a sliding block;
 - a feeding room; wherein
 - the storing room includes a feeding opening disposed on an upper end thereof, and a first hole mounted on a lower end thereof; the sliding block includes a store chamber, and the feeding room includes a second hole fixed on an upper end thereof and an outlet secured on a side thereof; wherein the sliding block is defined between the storing room and the feeding room, and upper and a lower ends of the store chamber of the sliding block are in communication with the storing room or the feeding room.
2. The container as claimed in claim 1, wherein the first hole of the storing room and the second hole of the feeding room are not in the same axial line.
3. The container as claimed in claim 1, wherein between the storing room and the feeding room is defined a recess to slide the sliding block therein, and the first hole and the second hole are in communication with the recess.

4. The container as claimed in claim 1, wherein the sliding block is in connection with a lever and a press arm, the lever is assembled with an upper end of the press arm, and a lower end of the press arm connects with the sliding block, the lever and the press arm are hinged to the housing.

5. The container as claimed in claim 1, wherein the housing includes a slot formed on an inner wall thereof, and the press arm is fixed in the slot, between the slot and the press arm is defined a spring.

6. The container as claimed in claim 1, wherein the store chamber includes a cylindrical cavity.

7. The container as claimed in claim 1, wherein the sliding block includes a rack mounted on a front end thereof to actuate a driving gear, an intermediate wheel, and a driven

gear, and the rack engages with a driving gear, the driven gear is fixed to the plate member, and the rack actuates the plate member to open and to cover the outlet through the driving gear, the intermediate wheel, and the driven gear.

8. The container as claimed in claim 3, wherein the recess includes a front positioning block secured therein to limit the sliding block to slide.

9. The container as claimed in claim 1, wherein the first and the second holes include scrape loops to scrape remains fixed on peripheral sides thereof respectively.

10. The container as claimed in claim 6, wherein the cavity includes scrape loops arranged on an upper and a lower sides thereof individually.

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