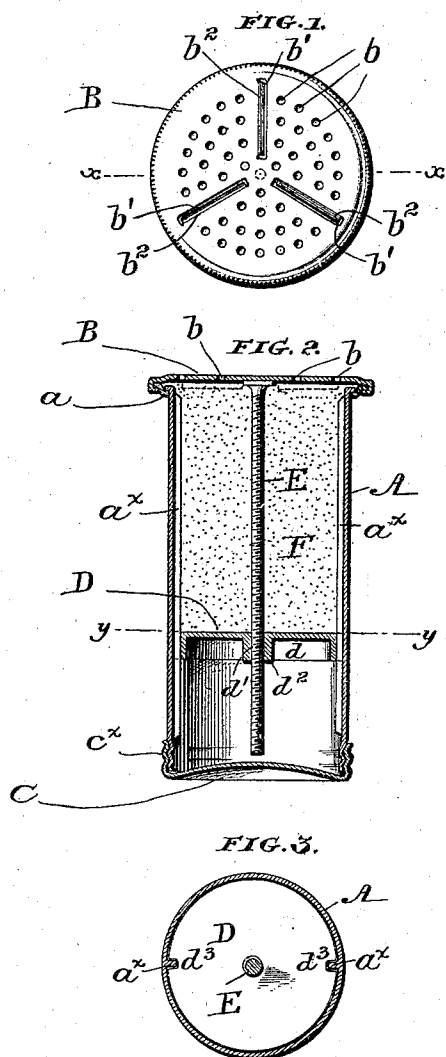


(No Model.)

F. N. DIXON.
SALT CONTAINER AND SPRINKLER.

No. 470,422.

Patented Mar. 8, 1892.



WITNESSES:
John J. Nolan,
Lewis Altmaier.

INVENTOR:
Frederic Norman Dixon

UNITED STATES PATENT OFFICE.

FREDERIC NORMAN DIXON, OF PHILADELPHIA, PENNSYLVANIA.

SALT CONTAINER AND SPRINKLER.

SPECIFICATION forming part of Letters Patent No. 470,422, dated March 8, 1892.

Application filed August 30, 1890. Serial No. 363,551. (No model.)

To all whom it may concern:

Be it known that I, FREDERIC NORMAN DIXON, a citizen of the United States, residing in the city and county of Philadelphia, and State of Pennsylvania, have invented certain new and useful Improvements in Salt Containers and Sprinklers, of which the following is a specification.

It is the object of my present invention to provide simple and inexpensive means by which to effect positively the elevation and depression of said follower, and in the accompanying drawings I show and herein I describe a preferred form of a convenient embodiment of my invention the particular subject-matter claimed as novel being hereinafter definitely specified.

In the drawings, Figure 1 is a top plan view of my device. Fig. 2 is a vertical central partially sectional elevation of the same on the line $x x$ of Fig. 1. Fig. 3 is a sectional plan on the line $y y$ of Fig. 2.

In the accompanying drawings A is the body of the container, which is shown as of cylindrical plan, but which may be of any preferred cross sectional form, and a is an outwardly flaring lip at the upper end of the same.

B is a cap, embodying outlets for the salt, which outlets are formed in any preferred manner and disposed in any preferred arrangement,—but which are shown as consisting of orifices b , and slots b' , in connection with each of which latter is shown a downwardly turned knife edge b^2 , formed conveniently by cutting the outline of the slot and bending down the flap or tongue of metal so formed. The cap is mounted for rotation upon the container body and this mounting is conveniently accomplished by bending its rim or outer edge downwardly and inwardly beneath the flange a .

C is the removable bottom mentioned, the engagement of the same with the container being effected in any desired manner. In the drawings I show it as provided with an upwardly turned rim c^x , embodying a screw thread by which it is adapted for engagement with a corresponding thread upon the lower end of the container.

D is the follower, the same consisting of a disk of form and diameter corresponding with that of the interior of the body of the con-

tainer so as to snugly fit within the same, and preferably provided with a depending guide flange d by which it is maintained in a level position. The means to which I resort to effect the positive movement of said follower are as follows: Said follower embodies a central screw threaded aperture d' the bore of which is conveniently lengthened by the presence at the center of the follower of a boss d^2 , through which it extends.

E is a screw threaded shaft, the upper end of which is rigidly secured to the center of the cap in any preferred manner, and the shank of which extends down through the body of the container and through the aperture of the follower, with the thread of which aperture its own thread corresponds.

When the body of the container is as shown in the drawings, circular in cross section, I provide means for preventing the rotation of the follower. In the drawings said means are shown as consisting of two straight splines e^x , extending lengthwise of the container at opposite sides thereof, which splines take into corresponding recesses d^3 formed in the follower.

The operation of the device will be readily understood. Assuming the device empty, it is replenished by removing the bottom, and rotating the cap to the left until the follower drops off of the shaft E. The container is then inverted and filled to a point just short of the tip of the screw shaft; the follower is replaced upon the end of said screw shaft, being engaged therewith by the rotation of the cap and shaft; and the bottom is placed in position. Rotation of the cap and screw shaft to the right draws the follower upward and forces the salt F against the cap. As soon as the salt is brought into contact with the cap, the rotation of the latter will by means of the edges of its apertures, and the knife edges, if both the apertures and the knife edges are present, shear off and cause to pass out, the top portions of the mass. The rotation of the cap therefore performs two functions at the same time, namely, first, by means of the screw shaft engaged with the follower, it occasions the elevation of the mass and its pressure against the cap, and, second, by reason of the contact of said cap with said mass, the shearing off the topmost particles of the latter.

I do not herein claim or seek to cover broadly the idea of providing in a device of the general character herein set forth, a follower and means for actuating said follower, as such
5 broad idea forms the subject matter of an application for United States Letters Patent filed by me upon August 12, 1890, as Serial No. 361,767,—but

What I herein claim and desire to secure by
10 Letters Patent is,—

1. The combination to form a salt container and sprinkler, of a body, a rotatable cap mounted thereon, a movable threaded follower within said body, and a shaft existing within
15 said body, engaged with said follower, and having its upper end secured so as to be rotated with the cap, substantially as set forth.

2. The combination to form a salt container and sprinkler, of a body, a rotatable cap
20 mounted thereon, a screw shaft connected with said cap, and a follower situated within said body and engaged with so as to be positively operated by the rotation of said screw shaft, substantially as set forth.

25 3. The combination to form a salt container and sprinkler, of a body, a rotatable cap mounted thereon, a follower situated within said body and embodying a screw threaded

aperture, and a screw shaft the upper end of which is secured to the cap, and the body of
30 which is engaged in the aperture of the follower, substantially as set forth.

4. The combination to form a salt container and sprinkler, of a body, a rotatable cap mounted thereon, a follower embodying a
35 screw threaded aperture, situated within said body, and held against rotation therein, a screw shaft the upper end of which is secured to the cap and the body of which is engaged in the aperture of the follower, substantially
40 as set forth.

5. The combination to form a salt container and sprinkler, of a body, a rotatable cap, a removable bottom, a movable follower exist-
45 ing within the body, and embodying a screw threaded orifice, and a screw shaft secured to and rotatable with the cap and engaged in the orifice of the follower, substantially as set forth.

In testimony that I claim the foregoing as
50 my invention I have hereunto signed my name this 28th day of August, A. D. 1890.

FREDERIC NORMAN DIXON.

In presence of—

JOHN RAMSEY NOLAN,
LEWIS ALTMAYER.