R. J. CONWELL.

LIQUID DISPENSING DEVICE.

APPLICATION FILED DEC. 28, 1912.

1,081,019. Patented Dec. 9, 1913

Fig. 1.

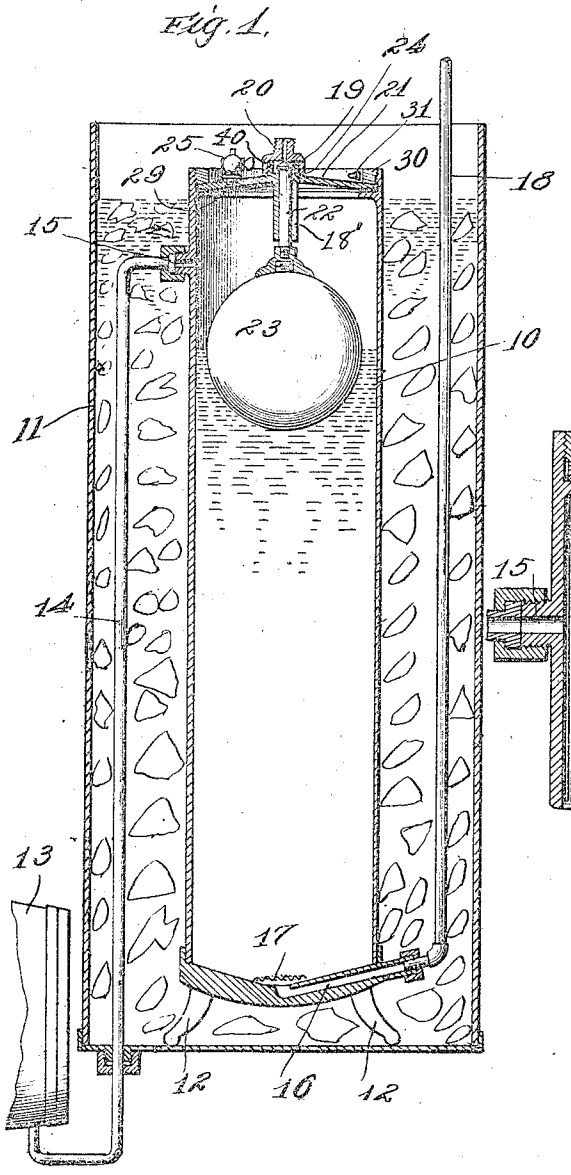
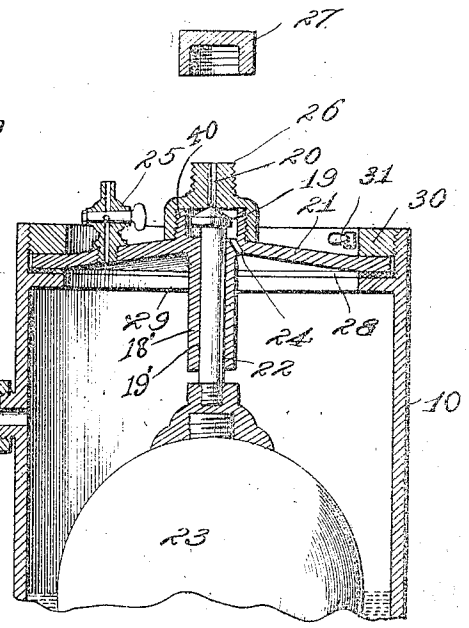


Fig. 2.



WITNESSES

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LIQUID-DISPENSING DEVICE.

1,081,019. Specification of Letters Patent. Patented Dec. 9, 1913.

Application filed December 28, 1912. Serial No. 739,138.

To all whom it may concern:

Be it known that I, ROBERT J. CONWELL, a citizen of the United States, and residing at Buffalo, in the county of Erie and State of New York, have invented certain new and useful Improvements in Liquid-Dispensing Devices, of which the following is a specification.

This invention relates to improvements in liquid dispensing devices and the same is more especially adapted for use in connection with beer and spirituous liquors.

An object of the invention is the provision of an automatic release of the gas and air arising from the liquid.

A further object is to provide such a device in which the liquid such as beer may be drawn from a faucet without excessive foaming or roiling.

With these objects in view and others that will appear as the nature of the invention is better understood, the same consists in the novel combination and arrangement of parts hereinafter fully described, illustrated in the accompanying drawings, and pointed out in the appended claim.

In the drawings forming a part of this application and in which like designating characters refer to corresponding parts throughout the several views: Figure 1 is a vertical sectional view of the device, and, Fig. 2 is a sectional detail view upon a large scale of the automatic release mechanism including its detachable cap.

Referring more specifically to the drawings, the main liquor or beer container 10 is positioned within the cooling chest 11, being here shown as provided with feet 12 resting upon the bottom of the latter while the space between said container and chest is designed for the cooling agent such as cracked ice, salt and water.

The barrel 13 containing the beer preferably placed under pressure by the usual pump, has the connecting pipe 14 leading therefrom to the inlet nipple 15 slightly removed below the top of the container and whereby the beer is admitted to the latter and normally fills the same to the height, substantially as indicated. An outlet 16 for the beer has the screen 17 thereover, the mesh of which may be regulated as desired, said outlet having a pipe connection 18 with the drawing faucets.

The free admittance of the beer under pressure to the container and a drawing of the same therefrom would ordinarily result in a considerable roiling and foaming of the liquid and this is prevented in the present provision by means of a needle valve 19 closing an outlet port 20 in the nipple 26, exteriorly threaded upon an upwardly extending collar 40 of the container cover 21. Said valve 19 is mounted upon a plunger 22 and is slidable within the bore 19′ of a depending boss 18′ in which it is closely journaled. Upon the lower end of the plunger is secured a glass ball float 23 by which means the fluid within the chest positions the valve in a normally closed position. Upon an excess of gas and air within the chest and above the surface of the beer the inflow of beer from the pipe 14 is retarded so that the outflow of the fluid reduces the level thereof and thus unseats the valve, thereby allowing the escape of an excess quantity of gas and air through the communicating port 24 and the valve port 20, all of which reduces the pressure and allows a fresh supply of beer to enter. The beer entrance being upon a level above the float 23 results in a flowing of the beer upon and over said float, whereby the float acts as a baffle for the fluid resulting in agitating the same while flowing in at the time the gas outlets are open and whereby the gas may freely escape. A pet cock 25 is tapped into said cover 21 while the threaded nipple 26 of the outlet has a removable cap closure 27. For washing out or cleansing the device when not in use so as to remove any foreign ingredients or corrosion, by means of flushing the same with a cleansing liquid, the cap 27 is designed to be applied and the pet cock 25 employed.

The cover 21 is seated upon a gasket 28 mounted upon a flange 29 adjacent the top of the container while a lock ring 30 retains the cover securely in position, said ring being provided with spanner wrench or turn handles 31.

From the above description, it is thought that the entire objects of the invention as first herein set forth will be at once apparent as well as the specific details of construction herein enumerated.

While the forms of the invention herein shown and described are what are believed to be the preferable embodiments thereof, the same may nevertheless be changed in minor points of form, size, or details of construction without departing from the

spirit and scope of the invention as set forth in the appended claim.

Having fully described my invention and in what manner the same is designed for use, what I claim as new and desire to secure by Letters Patent of the United States is:—

A liquid dispensing device comprising a ported container, an internal flange adjacent the top thereof, a removable cover positioned upon said flange and having a central opening therein, a lock ring engaging the container over said cover, a depending boss carried by said cover and having a central bore alining with said opening, an upwardly extending threaded collar concentric with said opening and of greater diameter than the opening, said cover provided with an oblique port therethrough communicating between the interior of said collar and the container, a closely fitting plunger mounted for reciprocation in said boss, a float upon the lower end of said plunger, a nipple threaded exteriorly upon said collar and having a central outlet therethrough, a conical needle valve of greater diameter than said bore and positioned upon the upper end of said plunger within the inclosure formed by said nipple collar and cover and adapted for seating over said outlet, and said container adapted to receive beer at a point above the level of said float.

In testimony whereof I affix my signature in presence of two witnesses.

ROBERT J. CONWELL.

Witnesses:

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