Oct. 22, 1935. J. A. MURDOCK 2,018,083

BOTTLE CAP REMOVER

Filed Nov. 9, 1934

Fig. 1

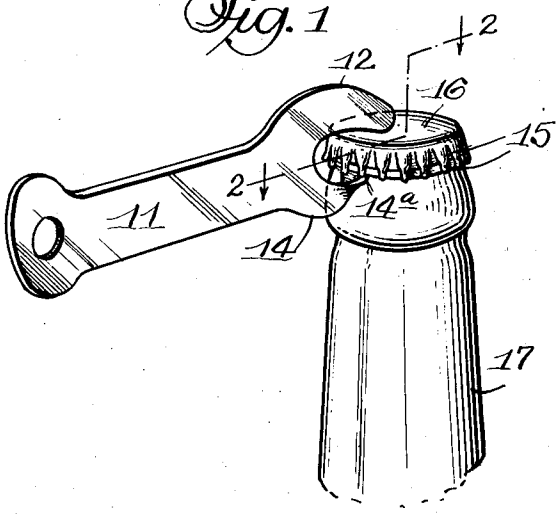
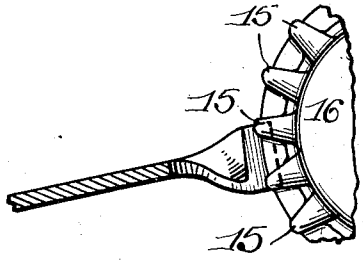


Fig. 2



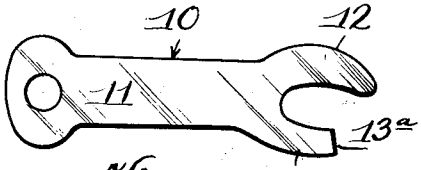


Fig. 3

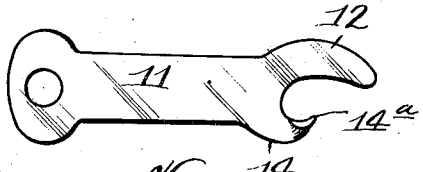


Fig. 4

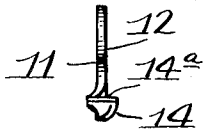


Fig. 5

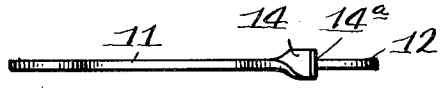


Fig. 6

Witness:
Chas. L. Lorsch.

Inventor,
James A. Murdock,
Offield Mehlhope Kott & Poole Attys.

Patented Oct. 22, 1935 2,018,083

UNITED STATES PATENT OFFICE

2,018,083

BOTTLE-CAP REMOVER

James Andrew Murdock, Chicago, Ill., assignor to Vaughan Novelty Mfg. Co., Chicago, Ill., a corporation of Illinois

Application November 9, 1934, Serial No. 752,201

2 Claims. (Cl. 65—46)

This invention relates to a bottle-cap remover, commonly called a bottle opener. The bottle cap, for the removal of which the opener is designed, is the familiar cork sealed metal cap with a depending flange held upon the bottle by means of circumferentially spaced indentations engaged upon a radial lip at the top of the bottle. In such a cap, duplex radial ribs are presented on the flange in alternation with the indentations and all bottle-cap removers are designed to operate by engagement with the bottom ends of said ribs.

The invention relates more particularly to that common type of bottle-cap remover which is stamped or cut from a comparatively thin, flat metal sheet and which constitutes a lever of the second class with extending prongs, a long prong for engagement with the top of the bottle cap as a fulcrum and a short prong for engagement with the bottom end of one of the aforesaid duplex ribs. It is known as the key ring type.

Bottle-cap removers of the kind are widely used because of their cheapness due to the minimum requirement of metal and to the economy of their manufacture. They are not, however, quickly effective in use. The duplex ribs of the flanged cap are not easily engaged singly by the short, narrow prong end of the bottle-cap remover. As a result, several attempts are generally required before the short prong of the cap remover is engaged. And even then, the engagement is so faulty that the metal cap is generally disengaged by successive steps, permitting the entrance of air between the cork seal and the metal head of the cap. Thus, while the metal cap may be dislodged from the bottle, the cork part often remains on the bottle, but ineffectually to prevent the escape of the gas of the charged liquid contained therein. The inefficiency of such cap removers is familiar to all who have used them.

The object of this invention is to produce a bottle-cap remover of the kind, which, though made of the same thin metal and with substantially the same economy of manufacture, has a short prong provided with a lip at its end extending at an angle to the plane of the main body of the remover and preferably of such width as to span and engage at least two of the duplex ribs of the flange of the bottle cap.

The foregoing and other advantages of the novel bottle-cap remover will appear more fully as I proceed with my specification.

In the drawing:—

Figure 1 is a perspective view of the improved bottle-cap remover shown as when applied to remove a cap from a bottle;

Figure 2 is a view on an exaggerated scale representing a partial top plan and sectional view of the bottle cap and cap-remover as when applied in Figure 1;

Figure 3 is a plan view of the stamped or cut blank from which the bottle-cap remover is to be made in its preferred form;

Figure 4 is a side elevation of the bottle-cap remover when finished;

Figure 5 is an end view of the bottle-cap remover looked at from the right of Figure 4;

Figure 6 is a plan view of the bottle-cap remover looked at from the bottom of Figure 4.

Referring now to that embodiment of the invention illustrated in the drawing, and particularly in Figures 1 to 6, inclusive:—10 indicates the flat metal blank cut or stamped from comparatively thin metal to form the improved bottle-cap remover. This blank comprises a handle or grip part 11; the long prong 12; and the short prong-forming member 13. The handle or grip member 11 and the long prong member 12 are of the usual familiar form and length and are finished and complete in the blank,—the grip or handle for grasping by the hand or fingers and the long prong 12 with its end for engagement as a fulcrum against the top of the bottle cap.

The short prong-forming member 13 of the blank has a wide end part 13*a*. In the preferred method of construction, the wide end part 13*a* of the prong-forming member of the blank is twisted at an angle, preferably a right angle, to the plane of the blank, so as to present a comparatively wide lip 14 which extends at either side of the plane of the comparatively thin body of the blank 10. Said lip 14 is preferably made of sufficient width to span and engage below at least two of the duplex ribs 15 on the flange of the bottle cap 16 on the bottle 17, as shown in Figures 1 and 2. Preferably, the end of the lip 14 is swaged or in other manner made thin, as indicated at 14*a*, in order to more readily engage beneath the ribs of the bottle cap which generally project very slightly from the bottle lip with which it is engaged.

It will be apparent from the foregoing that in the use of the improved bottle-cap remover, instead of operating upon and attempting to remove the cap from the bottle by engaging one of the duplex ribs of the cap, as in the case of the comparatively narrow end of the short prong of bottle-cap removers of the kind heretofore

made, the improved bottle-cap remover has a short prong with a wide lip 14*a* adapted to engage at least two of said ribs. Thus, instant and complete removal of the cap from the bottle upon the first operation is made possible. The improved bottle-cap remover has the same efficiency as the more expensive removers.

While in describing the invention I have referred to certain details of mechanical construction and method of production, it is to be understood that the invention is in no way limited thereto except as may be pointed out in the appended claims.

I claim as my invention:—

1. A bottle-cap remover stamped from a blank of comparatively thin metal, comprising a handle part and long and short spaced prong parts, the short prong part having an end part wider than the thickness of the metal of the blank and said end part being twisted upon itself through an angle of approximately 90 degrees to present a comparatively wide lip extending at right angles to and at each side of the plane of said handle and long prong.

2. A bottle-cap remover stamped from a blank of comparatively thin metal, comprising a handle part and long and short spaced prong parts, the short prong part having an end part wider than the thickness of the metal of the blank and said end part being twisted upon itself through an angle of approximately 90 degrees and formed to present a thin, comparatively wide lip extending at right angles to and at each side of the plane of said handle and long prong.

JAMES ANDREW MURDOCK.