

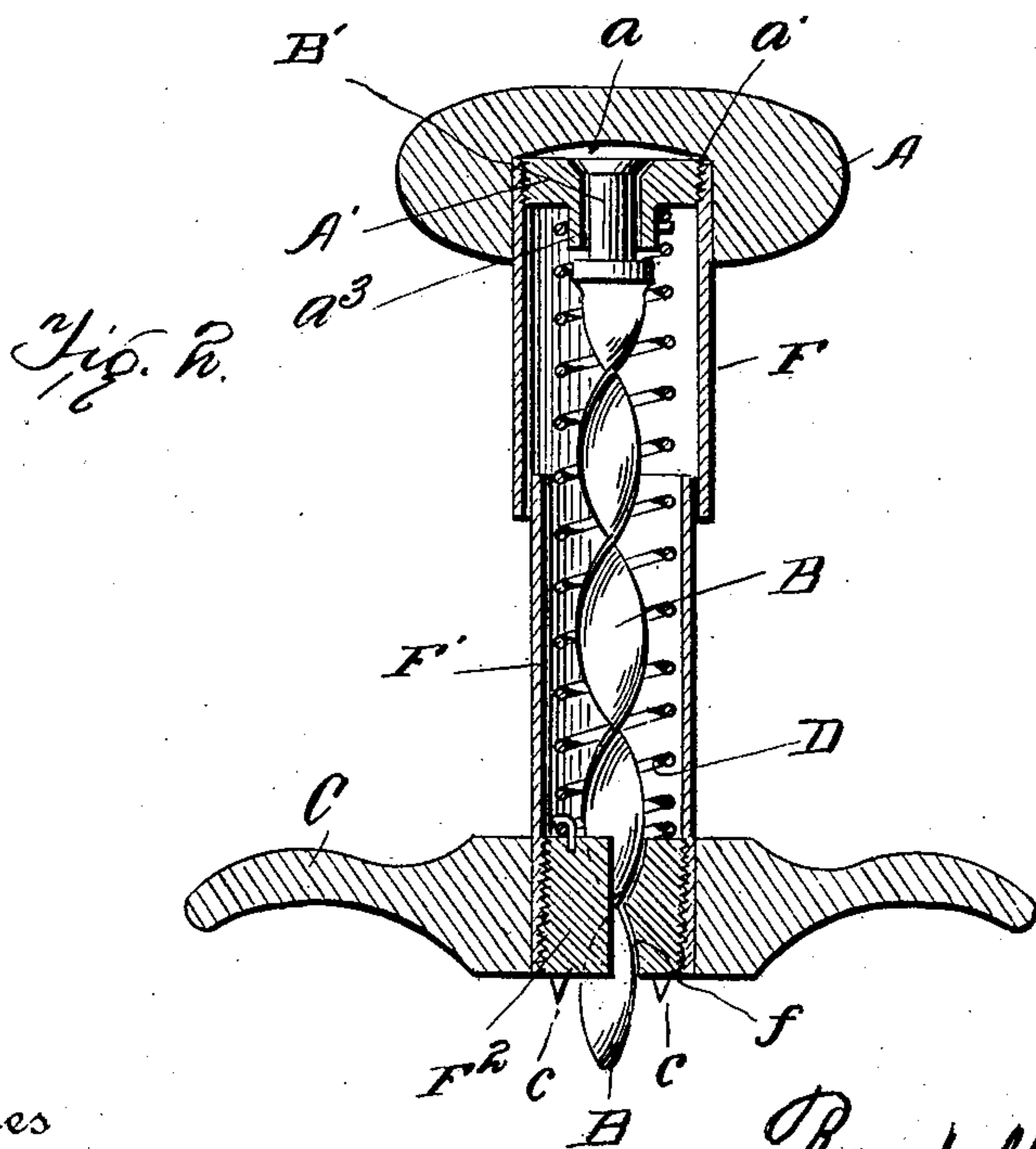
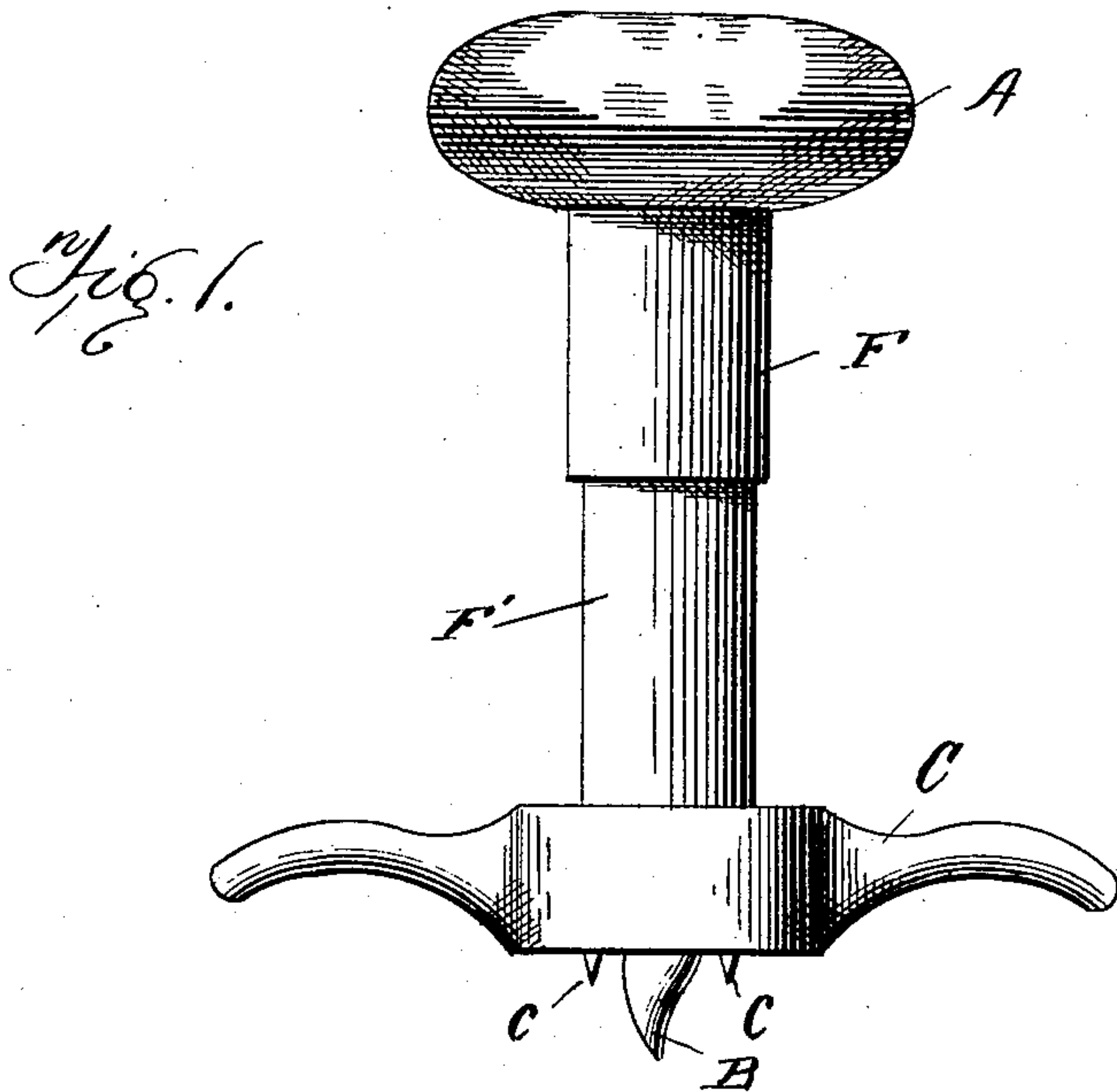
No. 701,791.

Patented June 3, 1902.

R. B. ANDROS.  
AUTOMATIC CORKSCREW.

(Application filed Jan. 14, 1902.)

(No Model.)



Witnesses  
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# UNITED STATES PATENT OFFICE.

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## AUTOMATIC CORKSCREW.

SPECIFICATION forming part of Letters Patent No. 701,791, dated June 3, 1902.

Application filed January 14, 1902. Serial No. 89,758. (No model.)

*To all whom it may concern:*

Be it known that I, RANDALL B. ANDROS, a citizen of the United States, residing at Boston, in the county of Suffolk and State of Massachusetts, have invented certain new and useful Improvements in Automatic Corkscrews; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to improvements in automatic corkscrews; and the object of the invention is to reduce to a minimum the friction caused by compressing the knob of the handle and forcing a spiral worm into the cork of the bottle.

A further object to be obtained is to automatically force the cork from the spiral worm by means of a coiled spring after the withdrawal of the cork.

With these ends in view the invention consists in the novel construction and combination of parts, as will be hereinafter described, and particularly pointed out in the claim.

In the accompanying drawings, to which reference is had and which fully illustrate my invention, Figure 1 is a front elevation of my device, and Fig. 2 is a vertical sectional elevation of the same.

Referring to the drawings, A designates the compression-knob or handle, having a recess *a* formed therein, within which is seated and secured the upper end of a tube F. The upper part of this tube is screw-threaded, as at *a'*, in which engage screw-threads formed upon the periphery of a screw-plug A', said screw-plug having a hole made centrally therethrough and a tubular shoulder *a*<sup>3</sup> formed integral therewith to receive revolutely the upper end of a spiral worm B, said parts being located in the upper part of the tube F.

F' designates another tube somewhat longer than the tube F and of less diameter which is arranged telescopically in relation to the tube F, the lower end of the tube being provided with a nut or solid portion F<sup>2</sup> and having screw-threads cut therein to engage screw-threads formed upon the lower and inner por-

tion of the tube F', this nut having also points *c c* integral with or secured to the under side of the nut, which engage the cork and prevent the same from revolving, and it is further provided with a channel or passage-way formed centrally, as at *f*, through it, corresponding in configuration to the spiral worm, which is projected and retracted through said channel in its operation.

B designates the spiral worm, provided at its upper end with a swivel B', which is formed integral with said worm and passed revolutely through the hollow shoulder *a*<sup>3</sup> and the screw-plug A', to which it is secured and within which it revolves.

D designates a coiled spring located in the tubing and surrounding the spiral worm, the upper end of said spring snugly and securely fitting around the hollow shoulder *a*<sup>3</sup> of the screw-plug A', the opposite and lower end of said spring being secured to the nut or solid portion F<sup>2</sup> within the tube F', upon which the handle C is secured, the securing of the spring to the shoulder of screw-plug A' and to the nut or solid portion within the tube being for the purpose of preventing the handle and its tube from becoming separated from the spiral worm, the tubing F and F' telescoping and serving as a casing for inclosing the mechanism. The worm is made of sheet-steel of the required width, and the peculiarity of the worm or screw is that the pitch of the worm or screw is obtained by a twisting or rolling process. The object of the screw or worm is to reduce friction caused by the compression of the knob forcing the worm through the nut or solid portion of the handle into the cork. The peculiar form of said worm reduces friction over the ordinarily-constructed corkscrew, inasmuch as it permits the piercing of the cork instantly.

The surrounding of the worm by the spring has for its object to force the handle to traverse vertically the swivel worm or screw, which causes the cork to be forced from the spiral worm or screw automatically after the withdrawal of the cork. To extract the cork, the operator simply holds the compression-knob and handle together and draws in the ordinary manner.



Having thus described my invention, what I claim as new, and desire to secure by Letters Patent, is—

5 The combination with the compression-knob and handle; of the telescopic tubes F and F', the former secured to the compression-knob A and the latter secured to the handle, the screw-plug secured within the tube F at its upper end, the tubular shoulder formed  
10 integral with said screw-plug, the worm, the swivel formed integral therewith, and revolvably secured in the screw-plug located in the upper part of the tube F, a coil-spring sur-

rounding the worm having its upper end secured to the tubular shoulder of the screw- 15 plug, the nut to which the lower end of the coiled spring is secured, a channel formed through said nut corresponding to the form of the worm, and points located on the under side of the nut, substantially as described. 20

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

RANDALL B. ANDROS.

Witnesses:

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