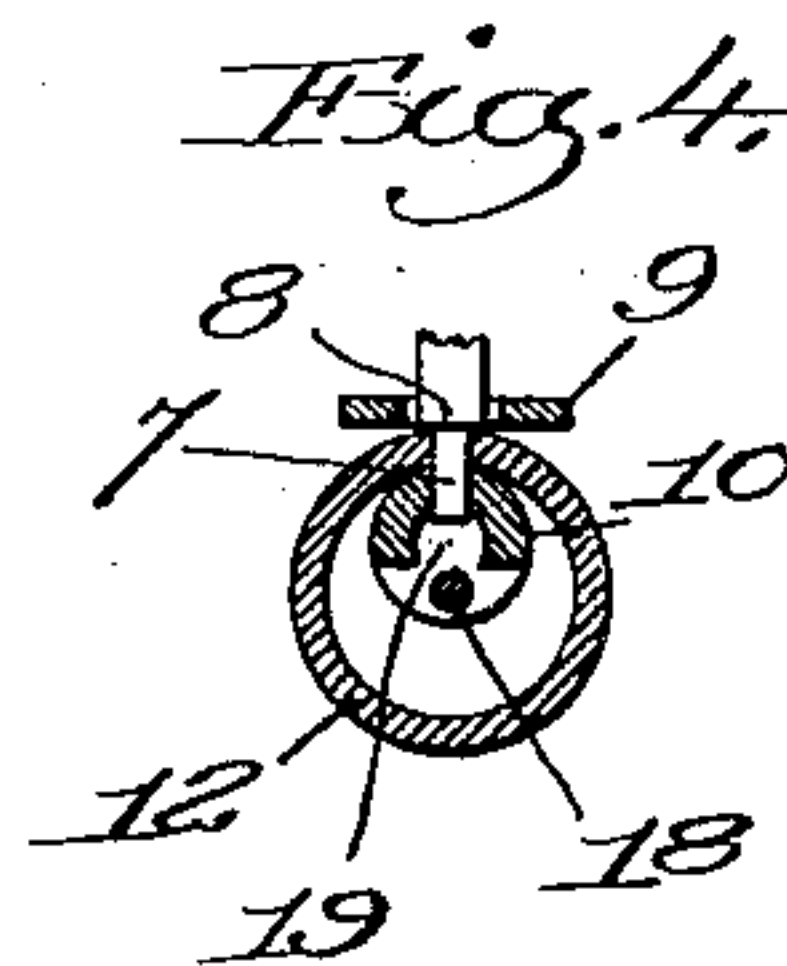
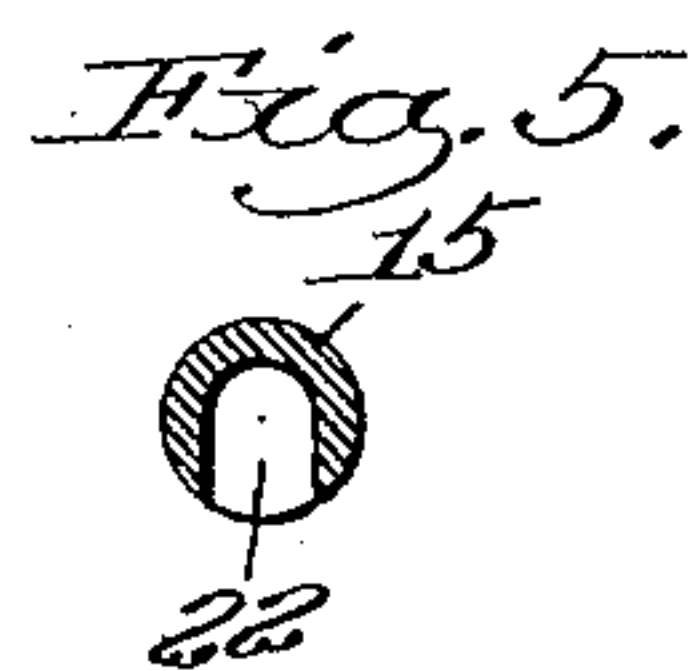
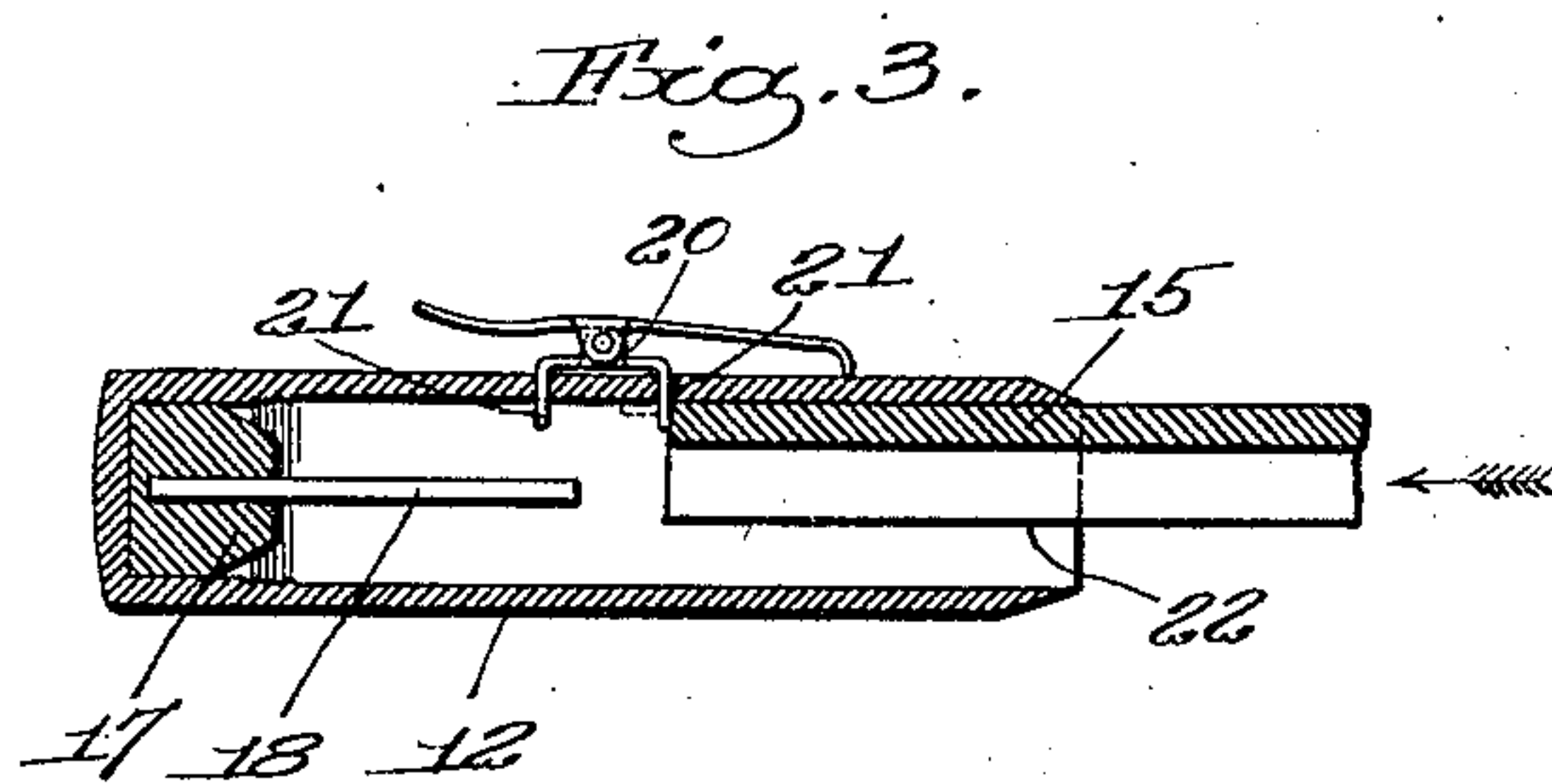
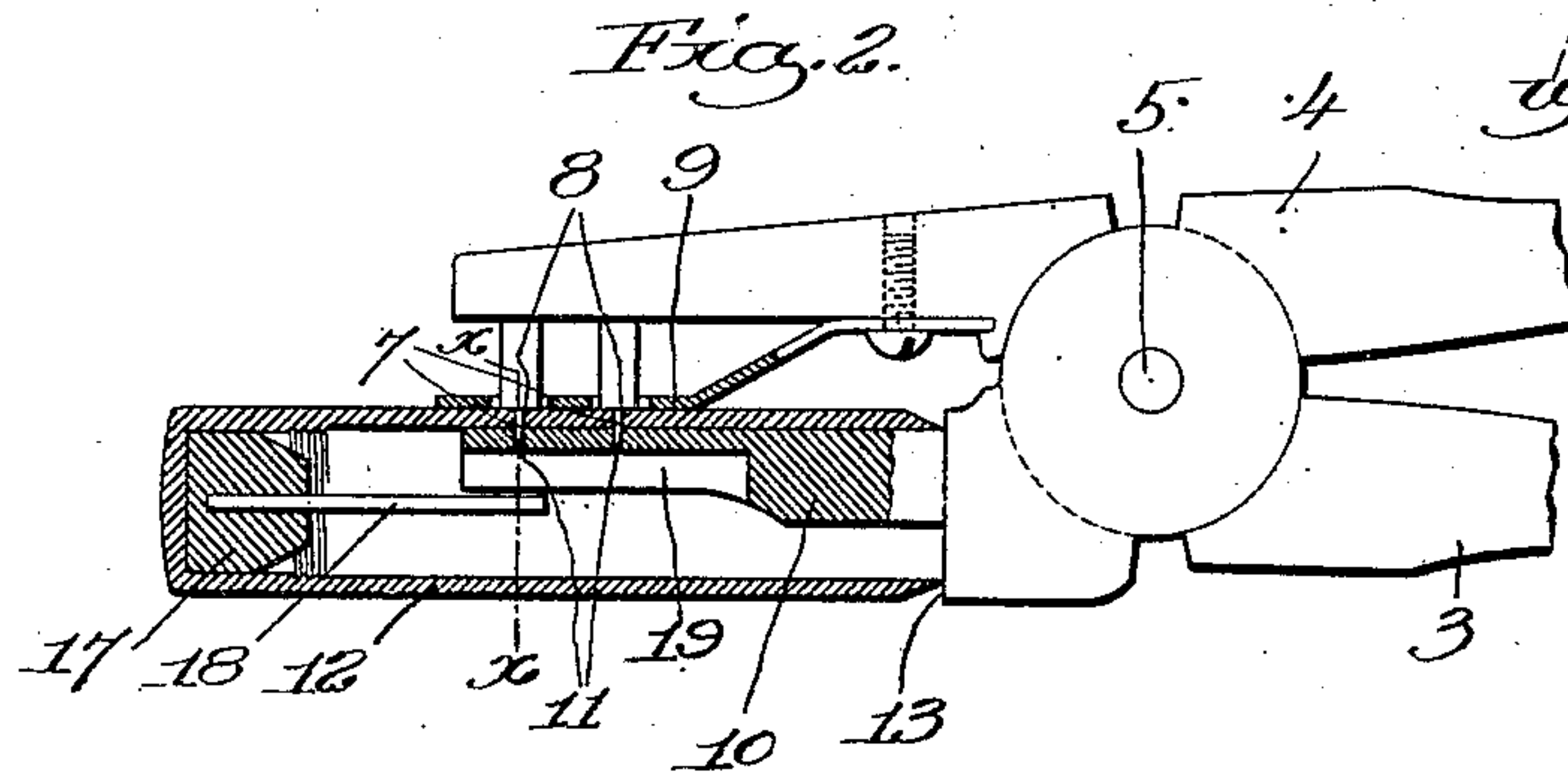
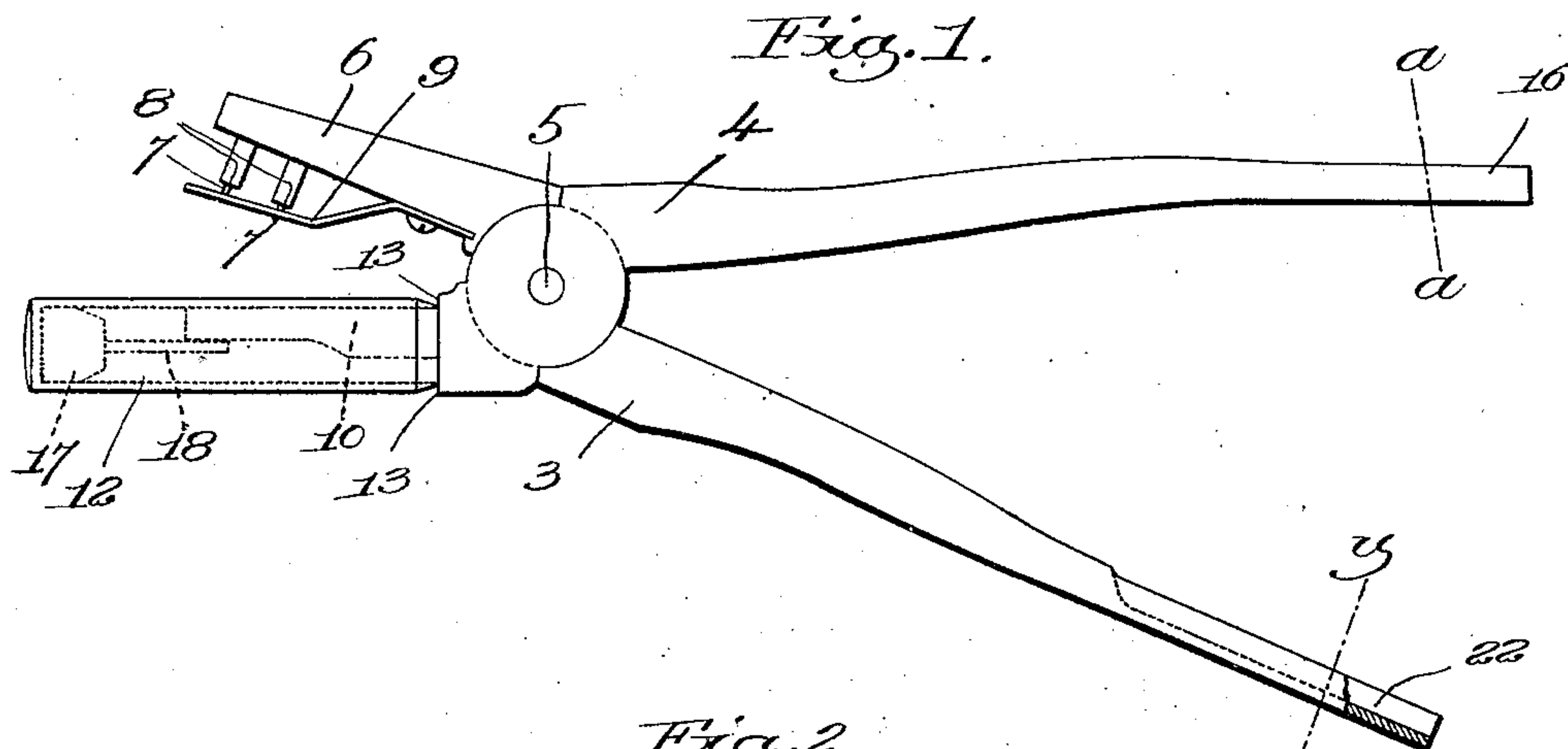


M. R. CROSSMAN.
 TOOL FOR APPLYING CLIPS TO FOUNTAIN PEN CAPS.
 APPLICATION FILED AUG. 9, 1909.

955,386.

Patented Apr. 19, 1910.



Witnesses:
 E. W. Cady
 Chas. E. Riordan

Inventor.
 Martin R. Crossman,
 by Crosby & Leary
 Attys.

UNITED STATES PATENT OFFICE.

MARTIN R. CROSSMAN, OF BOSTON, MASSACHUSETTS.

TOOL FOR APPLYING CLIPS TO FOUNTAIN-PEN CAPS.

955,386.

Specification of Letters Patent.

Patented Apr. 19, 1910.

Application filed August 9, 1909. Serial No. 511,955.

To all whom it may concern:

Be it known that I, MARTIN R. CROSSMAN, a citizen of the United States, residing at Boston, county of Suffolk, and State of Massachusetts, have invented an Improvement in Tools for Applying Clips to Fountain-Pen Caps, of which the following description, in connection with the accompanying drawing, is a specification, like characters on the drawing representing like parts.

There is now on the market a clip for fountain pen caps for the purpose of clasp-
ing the fountain pen to the pocket, which clip is provided with a body portion having feet or prongs adapted to extend through apertures formed in the side of the cap and to be clenched over on the inside of the cap, and a clip member pivoted to the body portion and adapted to engage the edge of the pocket.

My invention has for its object to provide a novel tool which is compact and portable, and by means of which these clips can be readily applied to the fountain pen caps.

I will first describe one embodiment of my invention and then point out the novel features thereof in the appended claims.

In the drawings, Figure 1 is a side view of a tool embodying my invention showing a fountain pen cap in place ready to have the holes punched therein; Fig. 2 is an enlarged view partly in section showing the punching operation; Fig. 3 is a sectional view through the cap showing the manner of clenching over the feet of the clip; Fig. 4 is a section on the line $x-x$, Fig. 2; Fig. 5 is a section on the line $y-y$, Fig. 1; Fig. 6 is a section on the line $a-a$, Fig. 1.

The tool herein illustrated is a hand tool and is provided with means for punching the apertures in the cap for receiving the feet of the clip and other means for clenching the ends of the feet within the cap.

The tool comprises the two members 3 and 4 which are pivoted together at 5 in a manner similar to an ordinary pair of pliers. The member 3 has a jaw 6 which carries two punches 7, each of which is formed with the shoulder 8 that limits the punching movement thereof.

9 is a clearer formed of resilient metal and associated with the punch, said clearer being sustained by the jaw 6.

The member 4 is provided with a jaw 10 which is formed with two punch-receiving apertures 11 adapted to receive the punches

7, as shown in Fig. 2. This jaw 10 is preferably rounded on the face which is adjacent the jaw 6. This jaw 10 is adapted to be inserted into a fountain pen cap 12 and the face thereof which is adjacent the jaw 6 is rounded so as to fit the interior surface of the cap. Said jaw 10 is also provided with the positioning shoulder 13 against which the end of the cap 12 is adapted to rest while the punching operation is in progress.

The ends 15 and 16 of the members 3 and 4 which constitute the handles by which the tool is operated are formed as mandrels adapted to enter the interior of the cap and to effect the clenching operation, as will be presently described.

The caps of some fountain pens, particularly the pen known to the trade as "Moore's non-leakable fountain pen", are provided at their inner ends with a plug or valve 17 from which extends a guard pin 18, the purpose of this pin being to force the pen down into the ink reservoir when the cap is applied if the pen has not already been withdrawn. In order to permit my tool to be used for placing clips on fountain pen caps having this construction, I provide the jaw 10 with the groove 19, which is open on that side of the jaw opposite the jaw 6, as clearly seen in the drawings.

In using my tool for applying clips to fountain pen caps, the cap is placed over the jaw 10, as shown in the drawings, and if the cap is of the type having the guard pin 18, said pin will occupy the groove 19 and thus will not present any obstruction to the placing of the cap over the jaw. The cap is properly positioned by bringing the end thereof against the positioning shoulder 13, as seen in Figs. 1 and 2. The handles are then forced together in usual way, thus causing the punches 7 to punch apertures through the side wall of the cap, the movement of the punches being limited by the shoulders 8, as seen in Fig. 2. After the holes are punched, the cap is removed from the jaw 10 and the clip 20 is applied to the cap with the feet or prongs 21 extending through the punched apertures, as seen in Fig. 3. The end 15 or 16 of the handle is then inserted into the cap, as seen in Fig. 3, and by forcing the cap over this mandrel portion, the ends of the prongs are clenched or bent over, as shown in dotted lines Fig. 3. The end 15 of the handle is preferably made with the groove 22 to accommodate the pin 18, while the

mandrel end 16 may be made without the groove in which case such mandrel end will be suitable for clenching the ends of the feet on those caps that do not have the guard
5 pin 18. I will preferably make the jaw 10 and the mandrel portions 15, 16 of the handle sufficiently small so as to permit the smaller-sized caps to be inserted over them, in which case they can be used both with the
10 small caps and with larger-sized caps, as shown in the drawings.

The tool is a very simple one and can easily be carried in a person's pocket.

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

1. In a tool for applying clips to fountain pen caps, the combination with two members pivoted together, each having a jaw, of
20 punches carried by one jaw, the other jaw having a size to permit it to enter a fountain pen cap and also having a positioning shoulder extending at right angles to the length of the jaw and adapted to engage the end of
25 the cap and properly position the latter.

2. In a tool for applying clips to fountain pen caps, the combination with two members pivoted together, each having a jaw, of punches carried by one jaw, the other jaw
30 being of a size to enter a fountain pen cap and having that side thereof adjacent the first-mentioned jaw rounded to fit the interior wall of said cap and also having a lon-

gitudinally-extending groove which is open on the side opposite the rounded side. 35

3. In a tool for applying clips to fountain pen caps, the combination with two members pivoted together, one end of each constituting a handle and the other end a jaw, of punches carried by one of said jaws, the
40 other jaw being adapted to enter a fountain pen cap and being provided with punch-receiving apertures and the handle end of one of the members being shaped to constitute a mandrel adapted to enter the cap and
45 to clench over the ends of the prongs of the clips.

4. In a tool for applying clips to fountain pens, the combination with two members pivoted together, each having a handle at
50 one end and a jaw at the other, of punches carried by one of said jaws, the other of said jaws being adapted to enter a fountain pen cap and having an open groove on the face opposite the first-named jaw, the end of
55 one of the handles being also of a size to enter a fountain pen cap and being provided on one side with an open groove.

In testimony whereof, I have signed my name to this specification, in the presence of
60 two subscribing witnesses.

MARTIN R. CROSSMAN.

Witnesses:

LOUIS C. SMITH,

THOMAS J. DRUMMOND.