

(No Model.)

S. SHIELDS.
TOBACCO PIPE.

No. 497,351.

Patented May 16, 1893.

FIG. 1.

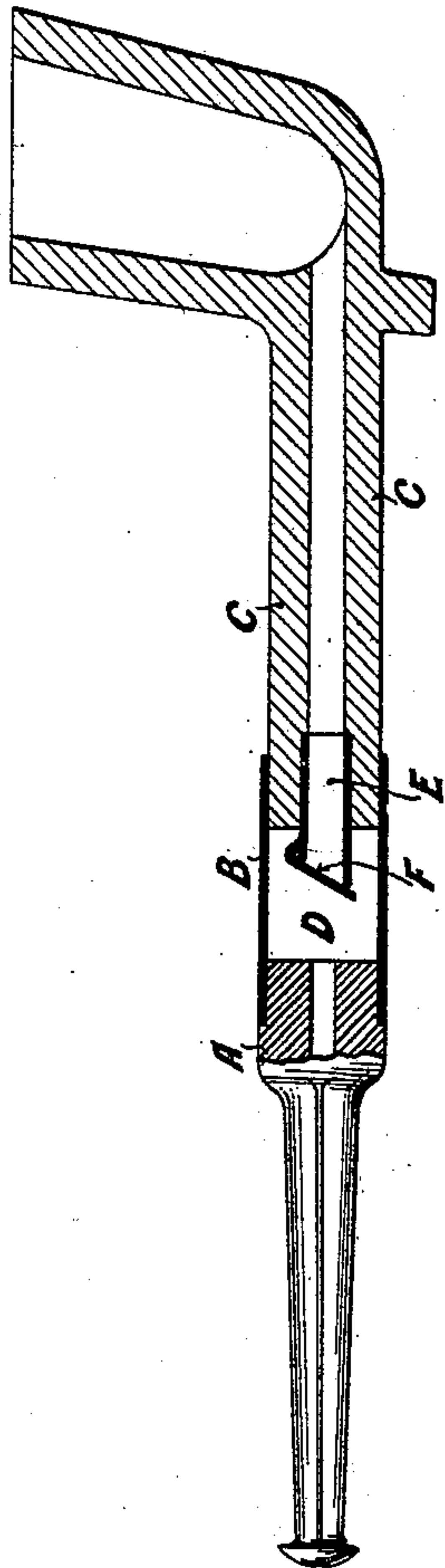


FIG. 2.

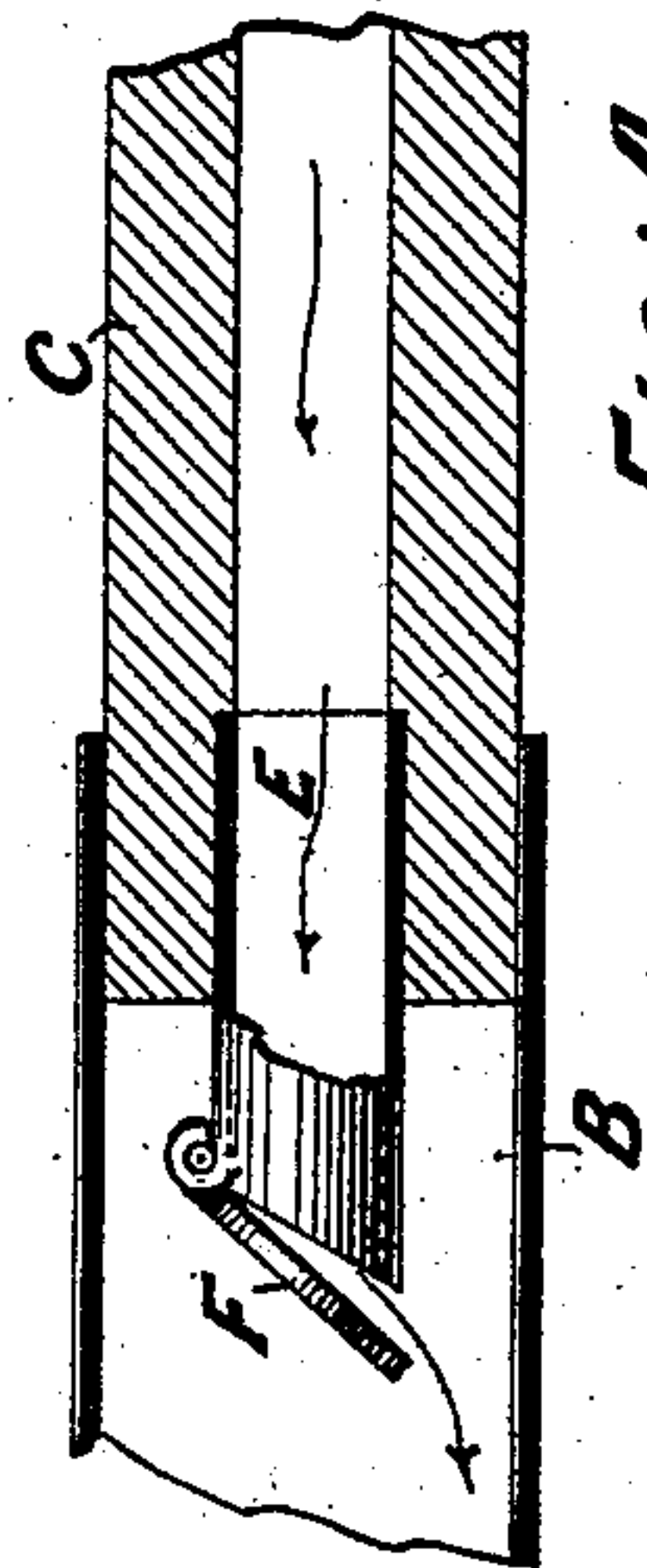


FIG. 3.

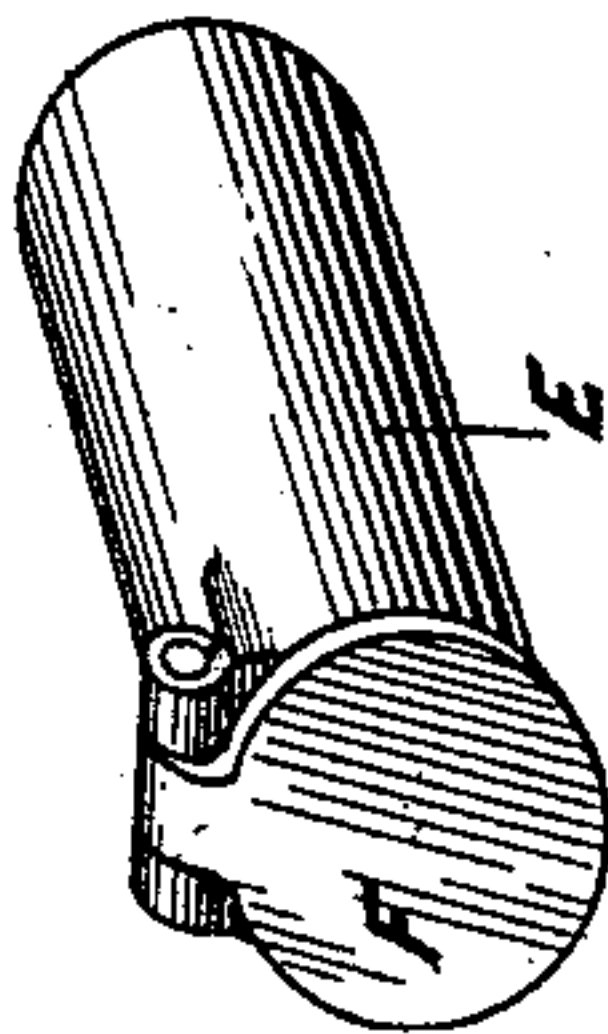


FIG. 5.

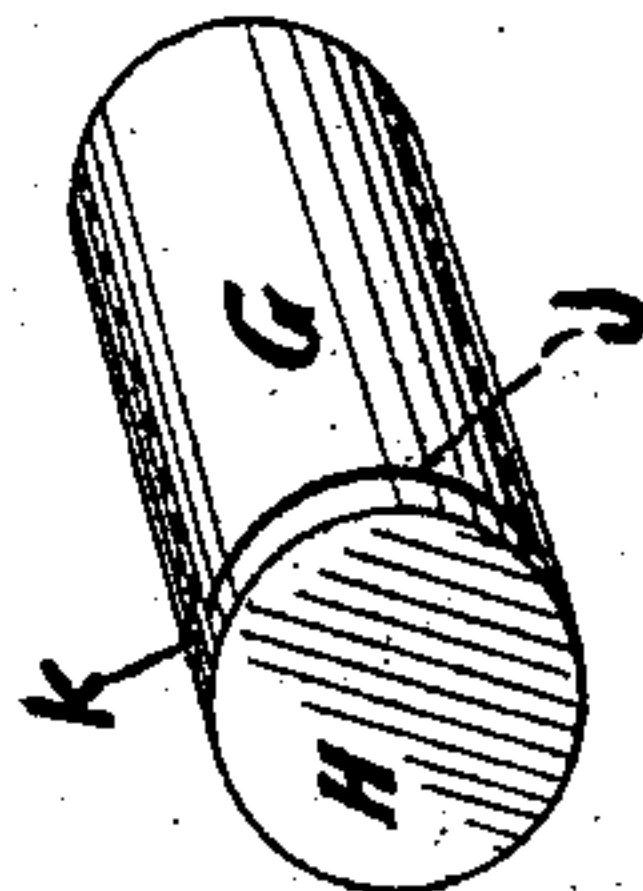
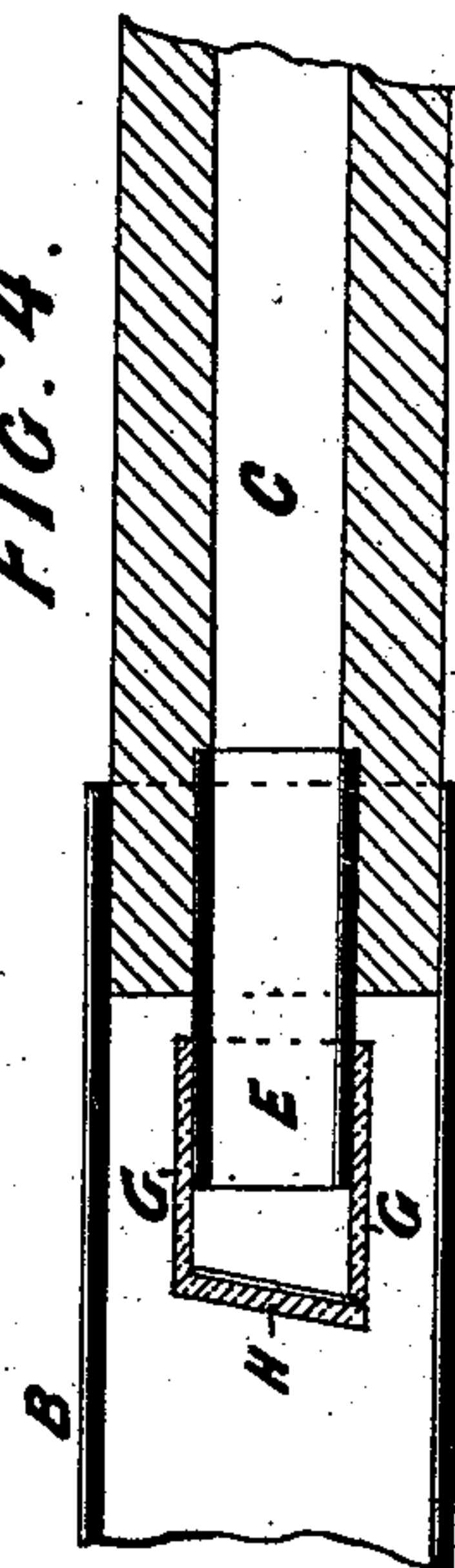


FIG. 4.



Witnesses:

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UNITED STATES PATENT OFFICE.

SAMUEL SHIELDS, OF LONDON, ENGLAND.

TOBACCO-PIPE.

SPECIFICATION forming part of Letters Patent No. 497,351, dated May 16, 1893.

Application filed July 11, 1892. Serial No. 439,635. (No model.)

To all whom it may concern:

Be it known that I, SAMUEL SHIELDS, a subject of the Queen of Great Britain, residing at London, England, have invented a certain
5 new and useful Improvement in Tobacco-Pipes or Cigarette-Holders; and I do hereby declare the following to be a full and exact description of the invention, which will enable
10 others skilled in the art to which it appertains to make and use the same.

This invention relates to a simple valve device fitted in the stem of a pipe to prevent the breath passing direct into the tobacco, but
15 allows the air to be drawn through it for smoking purposes.

To enable this invention to be properly understood, I will proceed to describe the same with aid of the accompanying drawings, in which--

20 Figure 1—illustrates a sectional view of a pipe fitted according to this invention with a metal valve; Fig. 2—an enlarged partial sectional view of the valve part; Fig. 3—a detached perspective view of the valve and part
25 carrying same; Fig. 4—a view of Fig. 2 fitted with an india-rubber valve; and Fig. 5 a detached perspective view of the india-rubber valve.

30 The mouth piece A, is fitted with a usual piece of socket tubing B, which fits on to the end of the stem C, leaving a chamber D, between the ends of mouth piece and stem. Fitted into the hole of the latter is a short
35 length of tubing E, having the front formed at an angle. Upon this is hinged a flap metal valve F, which owing to the angle of the front

of the tube E, normally closes the hole in stem when the pipe is held horizontally as is usual in smoking; any pressure of breath on the outside of the valve only tends to close the valve
40 the closer and so prevent the breath passing into the tobacco but the hinge and the lightness of the valve allow it to open inwardly by drawing air in through the tobacco for
45 smoking purposes. Instead of a metal valve I may use an india-rubber one made of a short length of india rubber tube G, having a bottom H; this bottom is nearly cut off at J, so
50 as to leave only a small part K, to form a hinge which acts as a slight spring to normally hold the valve closed; in this arrangement the cut J, may be either straight, round
55 or at an angle, or I may use a combination of india-rubber and metal. It will be seen that the valve chamber also acts as a drip chamber to catch the nicotine, which may be washed
60 out with hot water or sprayed with steam.

Having now described my invention, what I claim is—

The combination with a pipe or cigarette
60 holder formed in two or more pieces, of a box or tube inclosing the ends of two of said pieces and forming a valve chamber, and a
65 lifting valve fitted in the pipe stem or cigarette holder inclosed in said valve chamber, and opening toward the mouth piece, substantially as and for the purposes described.

SAMUEL SHIELDS.

Witnesses:

FREDERIC PRINCE,
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