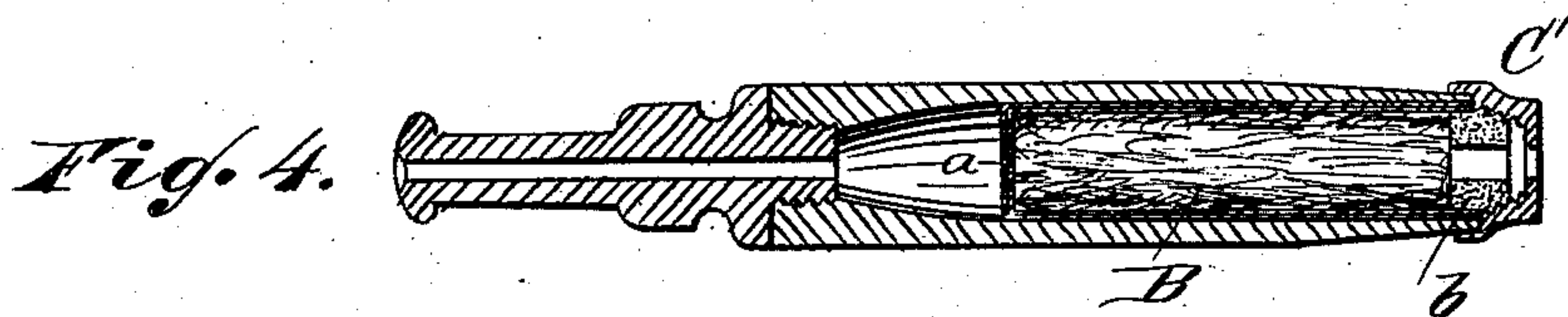
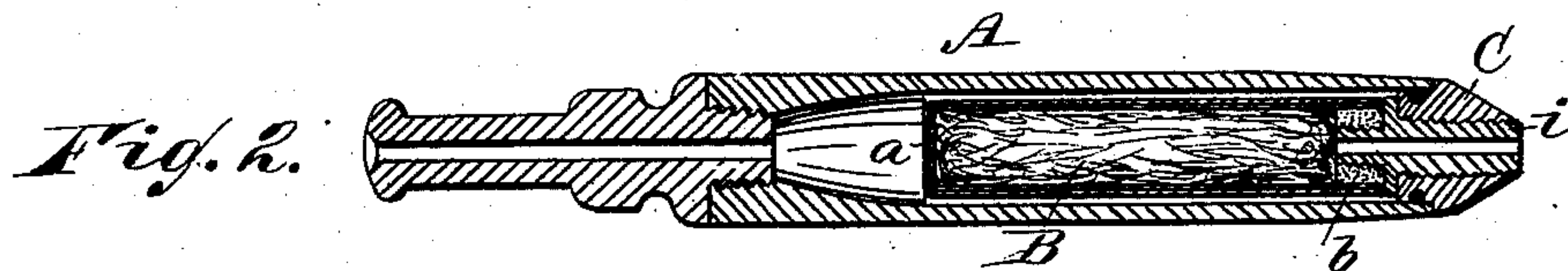
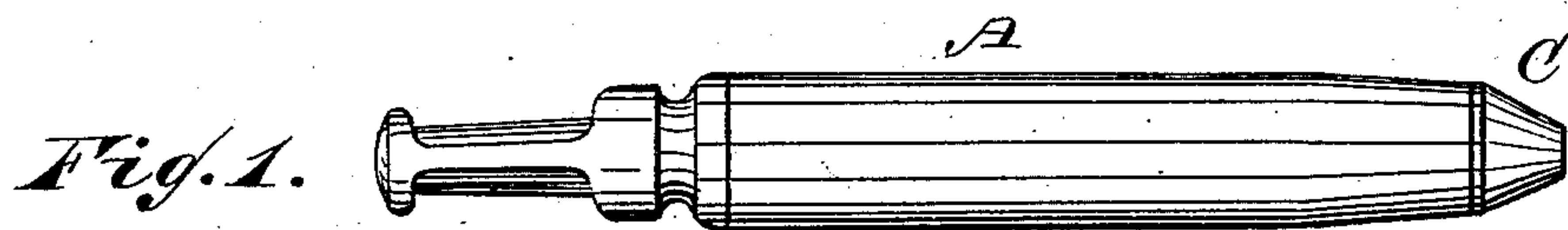


(No Model.)

E. A. SMITH.
SMOKING TUBE.

No. 281,573.

Patented July 17, 1883.



WITNESSES:

Geo. G. Foster
C. Sedgwick

INVENTOR:

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UNITED STATES PATENT OFFICE.

EDWARD A. SMITH, OF ST. ALBANS, VERMONT.

SMOKING-TUBE.

SPECIFICATION forming part of Letters Patent No. 281,573, dated July 17, 1883.
Application filed February 2, 1883. (No model.)

To all whom it may concern:

Be it known that I, EDWARD A. SMITH, of St. Albans, in the county of Franklin and State of Vermont, have invented a new and useful Improvement in Smoking-Tubes, of which the following is a full, clear, and exact description.

My invention relates to improvements in smoking-tubes; and it consists of a holder for sustaining the cartridges in the tube, as hereinafter described and claimed.

Reference is to be had to the accompanying drawings, forming part of this specification, in which similar letters of reference indicate corresponding parts in all the figures.

Figure 1 is a side view of the smoking-tube and holder. Fig. 2 is a longitudinal section of the tube and cartridge. Fig. 3 is a section of the cartridge detached. Fig. 4 represents a modification.

The tube A may be of any suitable construction and made of any suitable material, and is constructed to receive the cartridge B, which is held in place by the plug C in the outer end of the tube. The cartridge is formed by compressing tobacco within a case made of asbestos paper. The case or shell is closed at one end and provided with holes *a* for draft, and at its outer end is fitted with a ring, *b*, of asbestos, cork, or other suitable material, this ring having a central aperture. The covering of asbestos is preferably turned over the face of the ring *b*, as shown in Fig. 3, so as to retain it in place. Outside of the asbestos paper is a covering, *c*, of tin or lead foil. In using the cartridge the asbestos shell, being unconsumed, contains the ashes and other refuse, so that on withdrawing the shell the tube is left clean. At the same time the asbestos prevents the tube from becoming heated and burned. The outer covering of the foil renders the cartridge impervious to moisture and

gives a neat finish to the cartridge. The plug or holder C is formed to fit snugly in the end of the tube A, and is provided with a packing of suitable material, so as to make an air-tight joint. In the plug is a tube, *i*, of metal or other material, that projects at the inner end, and the projecting end is threaded for screwing into the end of the ring *b* in the cartridge.

In applying the cartridge to the tube the plug is first screwed upon the end of the cartridge and the cartridge and plug then inserted in the tube. The plug serves to close the joint air-tight, and also as a means for withdrawing the empty shell.

If desired, the plug may have a collar to fit over the tube snugly, with or without a screw-thread. I do not limit myself in these respects.

In the modification shown in Fig. 4, instead of a plug to enter the tube A, a ferrule, C', is shown, into which the cartridge is screwed, and which fits over the end of the smoking-tube.

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

1. The combination, with a smoking-tube, of a cartridge-holder fitted to the outer end of the tube, and screw-threaded to adapt it to be secured to a cartridge to sustain the same within the tube, substantially as herein shown and described.

2. The combination, with the smoking-tube A and the cartridge B, of the plug C, secured to the outer end of said tube, and provided with the tube *i*, having its inner end screw-threaded, substantially as herein shown and described.

Witnesses:

EDWARD A. SMITH.

C. SEDGWICK,
W. S. WALKER.