

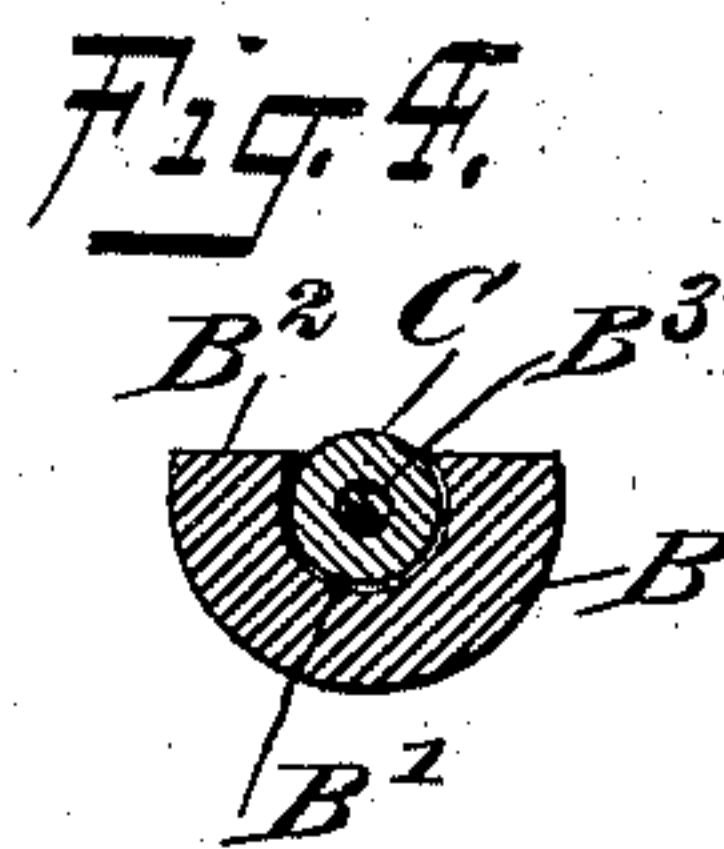
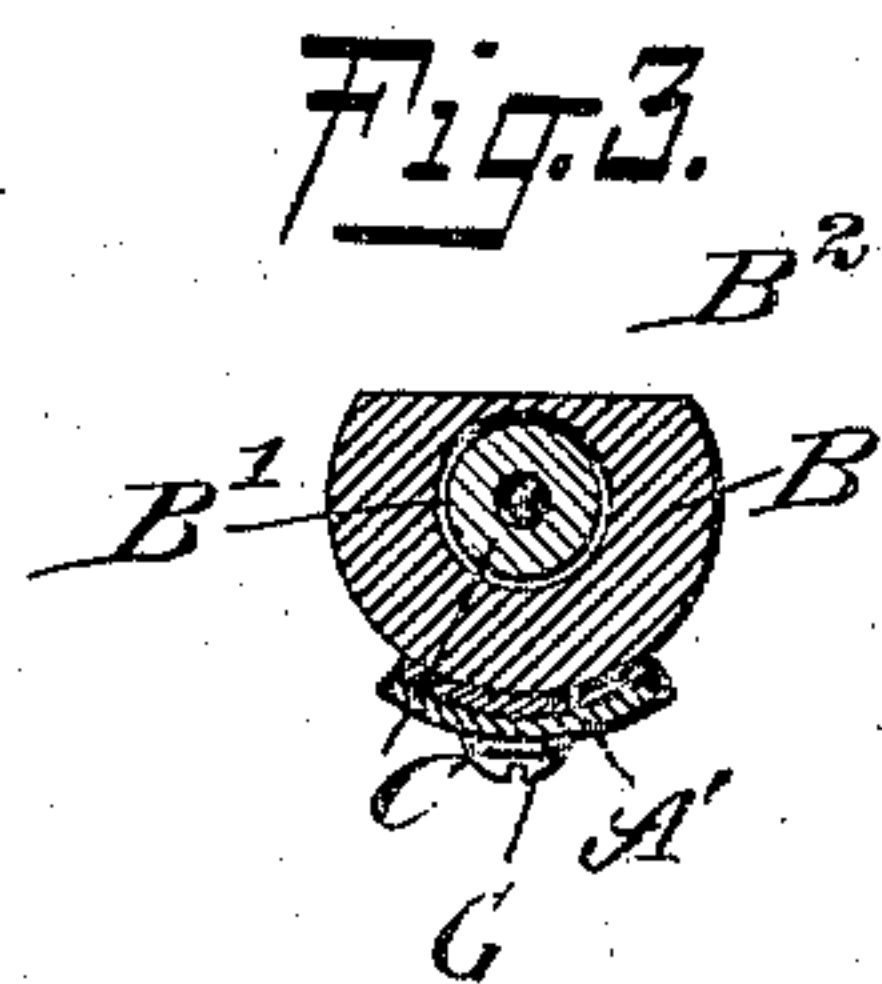
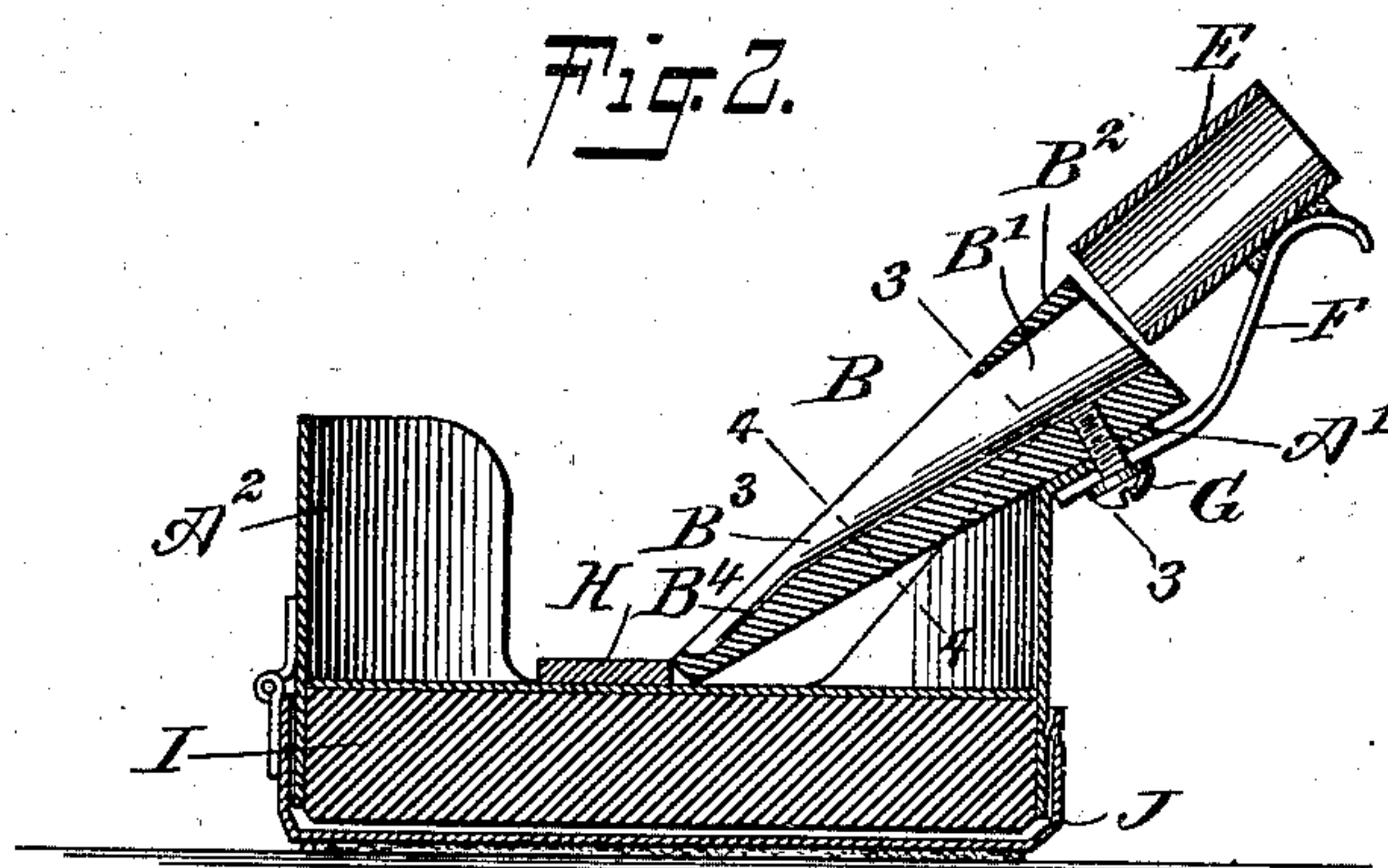
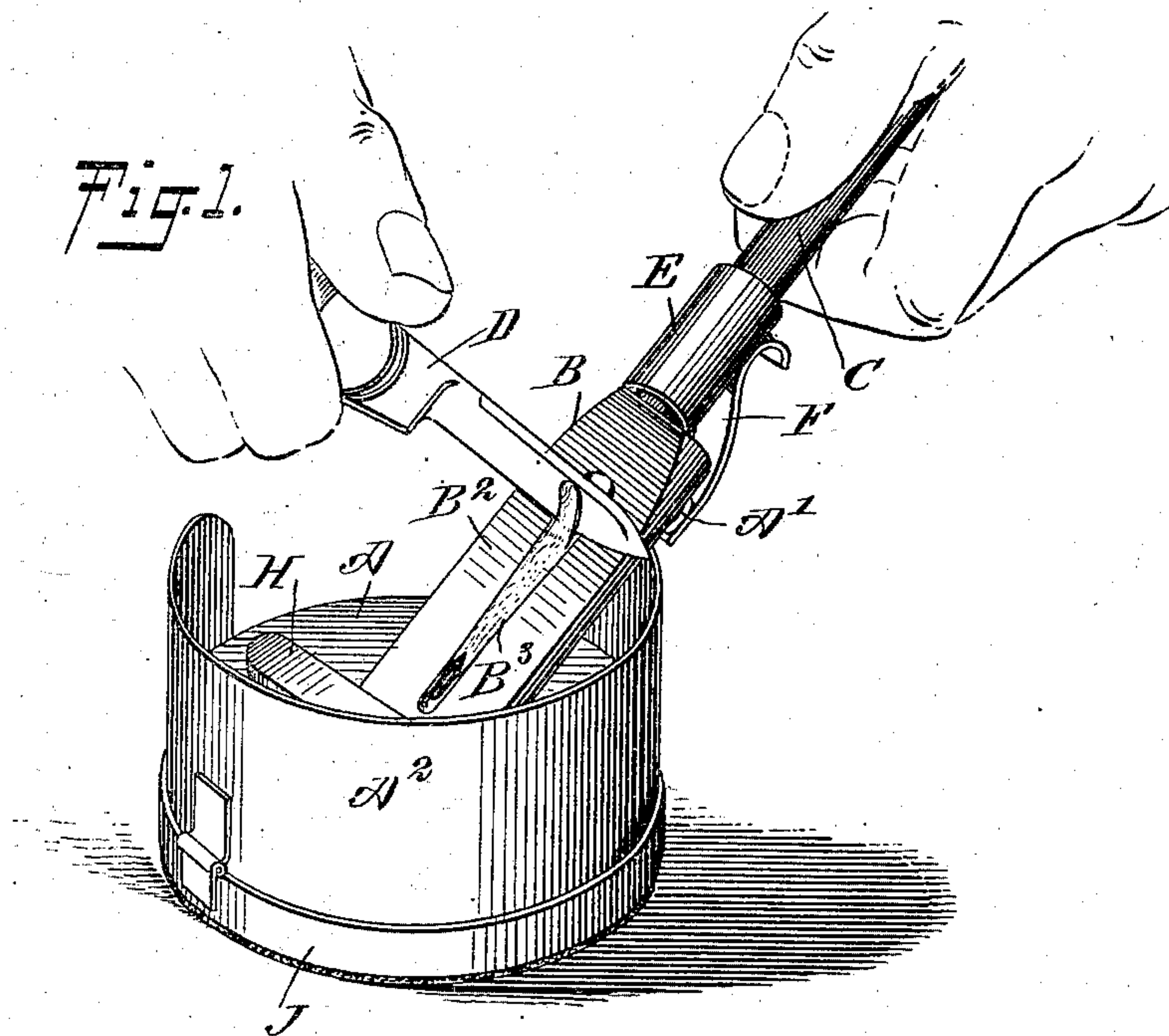
No. 749,666.

PATENTED JAN. 12, 1904.

W. S. DOE.
DEVICE FOR USE IN SHARPENING PENCILS.

APPLICATION FILED APR. 17, 1903.

NO MODEL.



WITNESSES:

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WALTER SCOTT DOE, OF JERSEY CITY, NEW JERSEY.

DEVICE FOR USE IN SHARPENING PENCILS.

SPECIFICATION forming part of Letters Patent No. 749,666, dated January 12, 1904.

Application filed April 17, 1903. Serial No. 153,070. (No model.)

To all whom it may concern:

Be it known that I, WALTER SCOTT DOE, a citizen of the United States, and a resident of Jersey City, in the county of Hudson and State of New Jersey, have invented a new and Improved Device for Use in Sharpening Pencils, of which the following is a full, clear, and exact description.

The invention relates to pencil-sharpeners; and its object is to provide a new and improved device for use in sharpening pencils and the like which is simple and durable in construction, not liable to easily get out of order, and arranged to permit the use of an ordinary knife to cut down the wood and core of the pencil to give a fine regular finish to the sharpened end.

The invention consists of novel features and parts and combinations of the same, as will be more fully described hereinafter and then pointed out in the claims.

A practical embodiment of the invention is represented in the accompanying drawings, forming a part of this specification, in which similar characters of reference indicate corresponding parts in all the views.

Figure 1 is a perspective view of the improvement. Fig. 2 is a sectional side elevation of the same. Fig. 3 is a transverse section of the same on the line 3 3 of Fig. 2 with a section of pencil also shown, and Fig. 4 is a similar view of the same on the line 4 4 of Fig. 2 with a section of pencil also shown in position to be operated upon.

From the top of a suitable base A extends upwardly and outwardly an inclined receiver having a die B, preferably made of steel and formed with a conical recess B', and an exterior guide B² in the form of a straight face produced on the exterior of the receiver at the upper side thereof, the plane of the said face extending at an angle to the axis of the recess B', the vertex of the angle being approximately at the lower or apex end of the recess and the said face intersecting the recess B' in the lower portion thereof to produce a slot B³, through which extends the side of the end of the pencil C passed into the receiver. Now when a pencil is passed into the recess B' at the upper or base end then the side of the pencil extends through the slot B³ into the path of a

knife D, moved downward and upward on the guide B² to cut or trim the wood projecting through the slot B³ during the downstroke of the knife wielded by the operator—that is, the knife-blade is held at an angle to the guide B², with its cutting edge downward against the cutting-face, as plainly indicated in Fig. 1. The pencil is held at its outer end by one hand of the operator and turned in the receiver during the cutting operation—that is, during the time that the operator with the other hand manipulates the knife as above described—to trim the end of the pencil equally all around to a fine conical shape. In order to cause the side of the pencil at the slot B³ to project through the latter into the path of the cutting edge of the knife a tubular holder or presser E is provided at the upper or entrance end of the receiver, and this holder is arranged with its axis spaced slightly upward from and approximately parallel to the axis of the recess B', as plainly shown in Fig. 2. The holder or presser E is held on the free end of a spring F, secured by a set-screw G to the receiver B, together with a lug A', extending from the rim A² of the base and serving to fasten the receiver in position on the said base. The opening in the holder E corresponds approximately to the thickness of an ordinary lead-pencil, round or polygonal, and hence tends to press the pencil end to cause the side thereof to project through the slot B³ into the path of the knife D. The apex end B⁴ of the conical recess B' terminates in a groove slightly at an angle to the axis of the recess B' to allow the point or graphite end of the pencil to yield downwardly when the knife reaches the lower end of the pencil and guide B², so that the point is not broken off but the knife trims the graphite to a fine point.

On the top of the base A extends transversely a stop-plate H across the guide B², so as to limit the downward-sliding motion of the knife, the plate H being preferably of lead or other comparatively soft material to prevent dulling of the cutting edge of the knife.

In order to enable the user of the device to readily sharpen the knife, a grindstone I is provided, preferably fastened in the lower portion of the base A, the grindstone being of

emery or other suitable material, and the lower portion of the base containing the grindstone is ordinarily closed by a hinged cap J, as plainly indicated in the drawings. The under
5 surface of the hinged cap J is provided with felt or other soft-fabric material, so as not to mar the table or other support on which the device is placed and used during the sharpening of the pencil.

10 From the foregoing it will be seen that any ordinary knife may be readily used for sharpening the pencil and a fine appearance is given to the sharpened end of the pencil without danger of breaking the lead or graphite there-
15 of at the point. The rim A² of the base A readily retains the shavings, which can be dumped out of the base after the pencil is sharpened, it being understood that the rim A² is cut out at one side for the ready entrance
20 of the knife, as indicated in the drawings.

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

1. A device for use in sharpening pencils, comprising a receiver for the end of the pen-
25 cil, a guide for a knife, to bring the cutting edge thereof in engagement with the side of the pencil, and a yieldingly-mounted holder for the pencil, to bring the pencil side into the path of the knife, said holder consisting of a
30 cylinder adapted to receive the pencil and to be brought into longitudinal axial alinement with the receiver-opening, as set forth.

2. A device for use in sharpening pencils, comprising a receiver having a conical recess
35 for the end of the pencil, a guide for a knife, to trim the side of the pencil in the said receiver, and a yieldingly-mounted holder for the pencil, to project the pencil side through the said slot into the path of the knife, said
40 holder consisting of a spring-supported cylinder adapted to receive the pencil, said cylinder being pressed by the spring in the direction of the open side of the receiver with its axial center always held parallel with the axial
45 center of the receiver-opening, as set forth.

3. A device for use in sharpening pencils, comprising a receiver having a conical recess for the end of the pencil, a guide for a knife,

to trim the side of the pencil in the said re-
ceiver, a yieldingly-mounted holder for the 50
pencil, to project the pencil side through the said slot into the path of the knife, said holder consisting of a spring-pressed cylinder in front of the receiving-opening, said cylinder being
55 normally held with its axial center elevated slightly above the axial center of the receiver-opening and in parallelism therewith and a limiting stop-plate for the knife, as set forth.

4. A device for use in sharpening pencils, comprising a base, a receiver secured on the
60 base and projecting from the top thereof in an inclined direction, the receiver having a conical recess, a guiding-face for a knife, and a slot connecting the recess with the said face, and a yieldingly-mounted holder for the pen-
65 cil, arranged at the entrance end of the receiver, the holder serving to press the pencil, to project the pencil side through the said slot into the path of the knife, as set forth.

5. A device for use in sharpening pencils, 70
comprising a receiver having a guide-face for a knife and a conical recess for the end of the pencil, said recess being intersected at one side by said guide-face and terminating at its apex
75 end in a groove at an angle to the axis of the recess, to allow the point or graphite end of the pencil to yield downwardly when acted upon by the knife, for the purpose set forth.

6. A device for use in sharpening pencils, 80
comprising a box-shaped base, a receiver secured on the base and projecting downwardly within the same from the top thereof in an inclined direction, the receiver having a re-
cess, and a guiding-face for a knife intersecting one side of said recess, said box-shaped
85 base having a portion of its rim cut away at one side to facilitate a ready entrance of the knife within the base.

In testimony whereof I have signed my name to this specification in the presence of 90
two subscribing witnesses.

WALTER SCOTT DOE.

Witnesses:

THEO. G. HOSTER,
EVERARD BOLTON MARSHALL.