

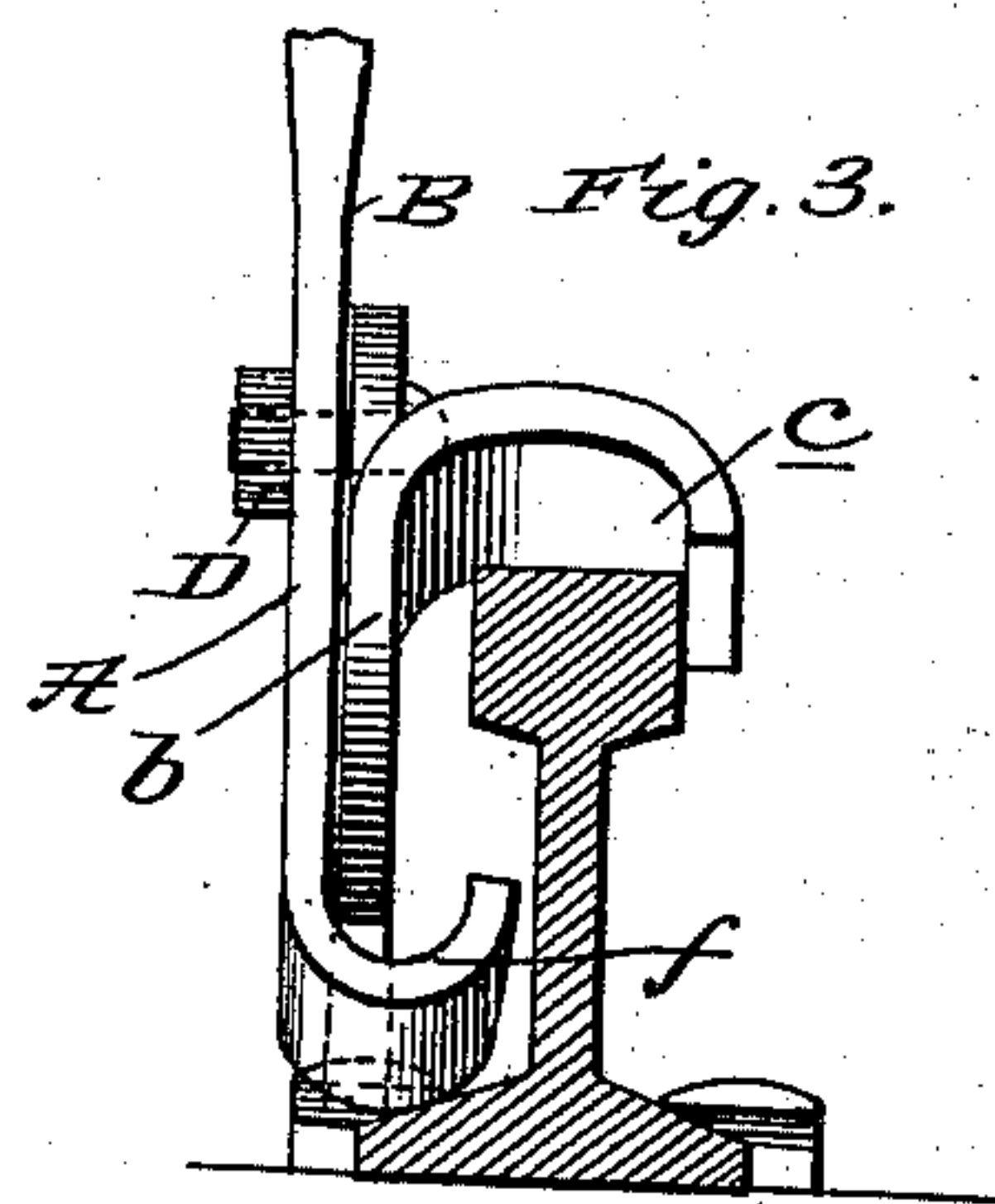
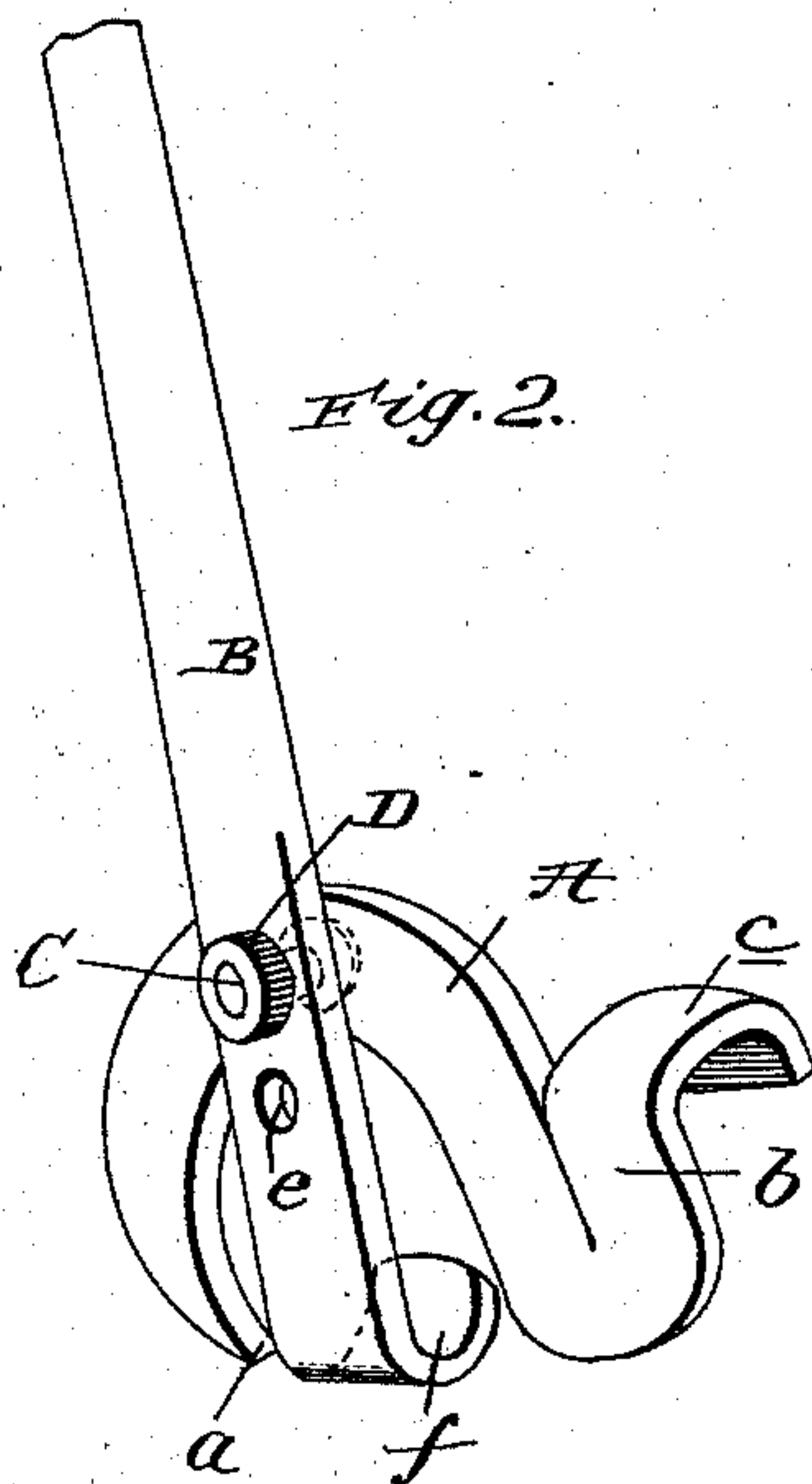
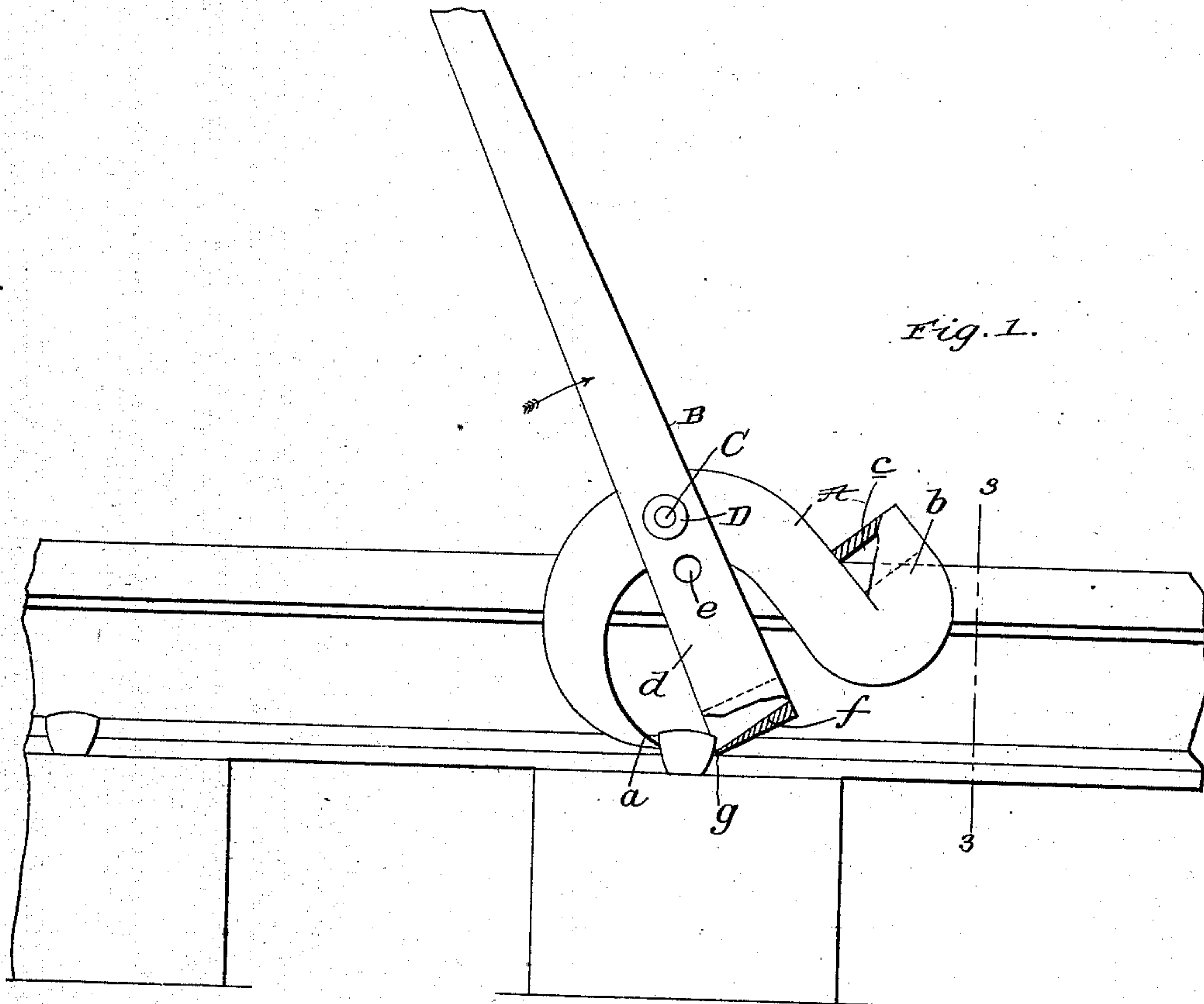
No. 714,250.

Patented Nov. 25, 1902.

G. SMITH.
SPIKE PULLER.

(Application filed July 31, 1902.)

(No Model.)



Witnesses
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GEORGE SMITH, OF CAMBRIDGE, OHIO.

SPIKE-PULLER.

SPECIFICATION forming part of Letters Patent No. 714,250, dated November 25, 1902.

Application filed July 31, 1902. Serial No. 117,818. (No model.)

To all whom it may concern:

Be it known that I, GEORGE SMITH, a citizen of the United States, residing at Cambridge, in the county of Guernsey and State of Ohio, have invented new and useful Improvements in Spike-Pullers, of which the following is a specification.

My invention relates to improvements in spike-pullers such as are designed more especially for extracting railway-spikes—i. e., spikes used to fasten railway-rails; and it consists in the peculiar and advantageous construction hereinafter described, and particularly pointed out in the claims appended.

In the accompanying drawings, Figure 1 is a view, partly in side elevation and partly in section, illustrating my improved spike-puller in its proper operative position. Fig. 2 is a perspective view of the spike-puller with the upper portion of its handle-bar broken away, and Fig. 3 is a transverse section taken in the plane indicated by the broken line 3 3 of Fig. 1.

Similar letters of reference designate corresponding parts in all of the views of the drawings.

The improved implement comprises a claw-bar A and a handle-bar B, both of which are preferably formed of steel. The claw-bar is bent upwardly in the direction of its length, Fig. 1, and is provided at one end with a claw or point *a*, adapted to engage a spike at one side and below the head thereof and at its opposite end with an upwardly-extending portion *b*, which terminates in a lateral hook or hook-shaped saddle *c*, adapted to straddle and bear on the head of a rail after the manner shown in Figs. 1 and 3. The handle-bar B is provided with a lower flattened portion *d*, in which are two, more or less, transverse apertures *e*, and at its lower end it is bent laterally to form a jaw *f*, adapted to engage the side of a spike opposite to that engaged by the claw *a*. Said jaw *f* is preferably concavo-convex in cross-section, and its edge adjacent to the claw *a* is by preference sharpened, as indicated by *g*, this in order to enable it to gauge a sleeper or tie and engage a spike below the head thereof when the spike-head is embedded in the sleeper or tie.

C is a bolt which extends through one of the apertures *e* in the handle-bar B and piv-

otally connects the same to claw-bar A, and D is a nut on said bolt. The plurality of apertures *e* are preferably provided in the handle-bar in order that the implement may be adapted to be used on rails of various heights.

In the practical use of the improved spike-puller the claw-bar A is disposed at one side of a rail, with the hook *c* bearing on the head of the rail and the claw or point *a* engaging one side of a spike below the head thereof. The handle-bar B is then rocked in the direction indicated by the arrow, Fig. 1, until the inner edge of its jaw *f* takes hold of the spike, after which it is forcibly moved in said direction, when by reason of the hook or saddle *c* bearing on the head of the rail the claw end of the claw-bar and the lower end of the handle-bar will be raised and with them the spike. In this way it will be observed that a very tight spike may be expeditiously drawn from a sleeper or tie with but a minimum amount of effort.

When the head of the spike to be pulled is embedded in a sleeper or tie or the like, the claw or point *a* and the sharp edge *g* of jaw *f* are obviously adapted to be forced downwardly in the wood, so as to take secure hold of the spike below the head thereof.

I have entered into a detailed description of the construction and relative arrangement of the parts embraced in the present and preferred embodiment of my invention in order to impart a full, clear, and exact understanding of the same. I do not desire, however, to be understood as confining myself to such specific construction and arrangement of parts, as such changes or modifications may be made in practice as fairly fall within the scope of my claims.

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

1. A spike-puller comprising a claw-bar having a claw to engage a spike, and also having a lateral, hook-shaped saddle arranged to straddle and bear on a rail, and a handle-bar pivotally connected to the claw-bar, and having a jaw to engage the spike.

2. A spike-puller comprising a claw-bar bent upwardly in the direction of its length, and having a claw at one end to engage a

spike, and also having an upwardly-extending portion at its opposite end, terminating in a lateral hook arranged to engage and bear on the head of a rail, and a handle-bar pivotally connected to the claw-bar and having a jaw to engage the spike.

3. A spike-puller comprising a claw-bar having a claw to engage a spike, and also having a lateral, hook-shaped saddle arranged to straddle and bear on a rail, and a handle-bar pivotally connected at an intermediate point of its length to the claw-bar, and having the lateral, concavo-convex jaw at its lower end, the forward edge of which is sharpened.

4. A spike-puller comprising a claw-bar bent upwardly in the direction of its length, and having a claw at one end to engage a spike,

and also having an upwardly-extending portion at its opposite end, terminating in a lateral hook arranged to engage and bear on the head of a rail, and a handle-bar pivotally connected at an intermediate point of its length to the claw-bar, and disposed at one side thereof, and having the lateral, concavo-convex jaw at its lower end, the forward edge of which is sharpened.

In testimony whereof I have hereunto set my hand in presence of two subscribing witnesses.

his
GEORGE X SMITH.
mark

Witnesses:

WM. KINNEY,
CHAS. BARTON.