

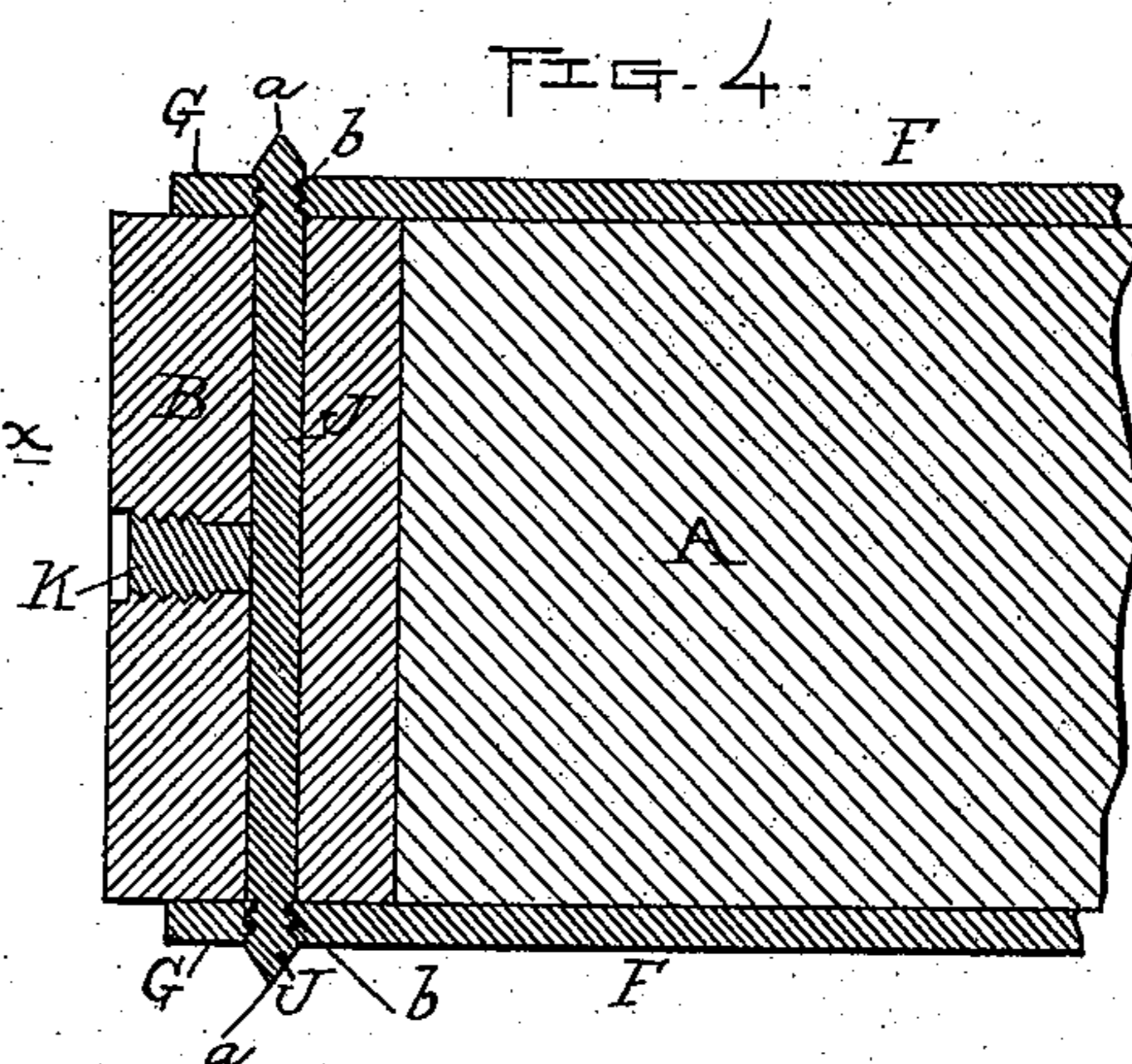
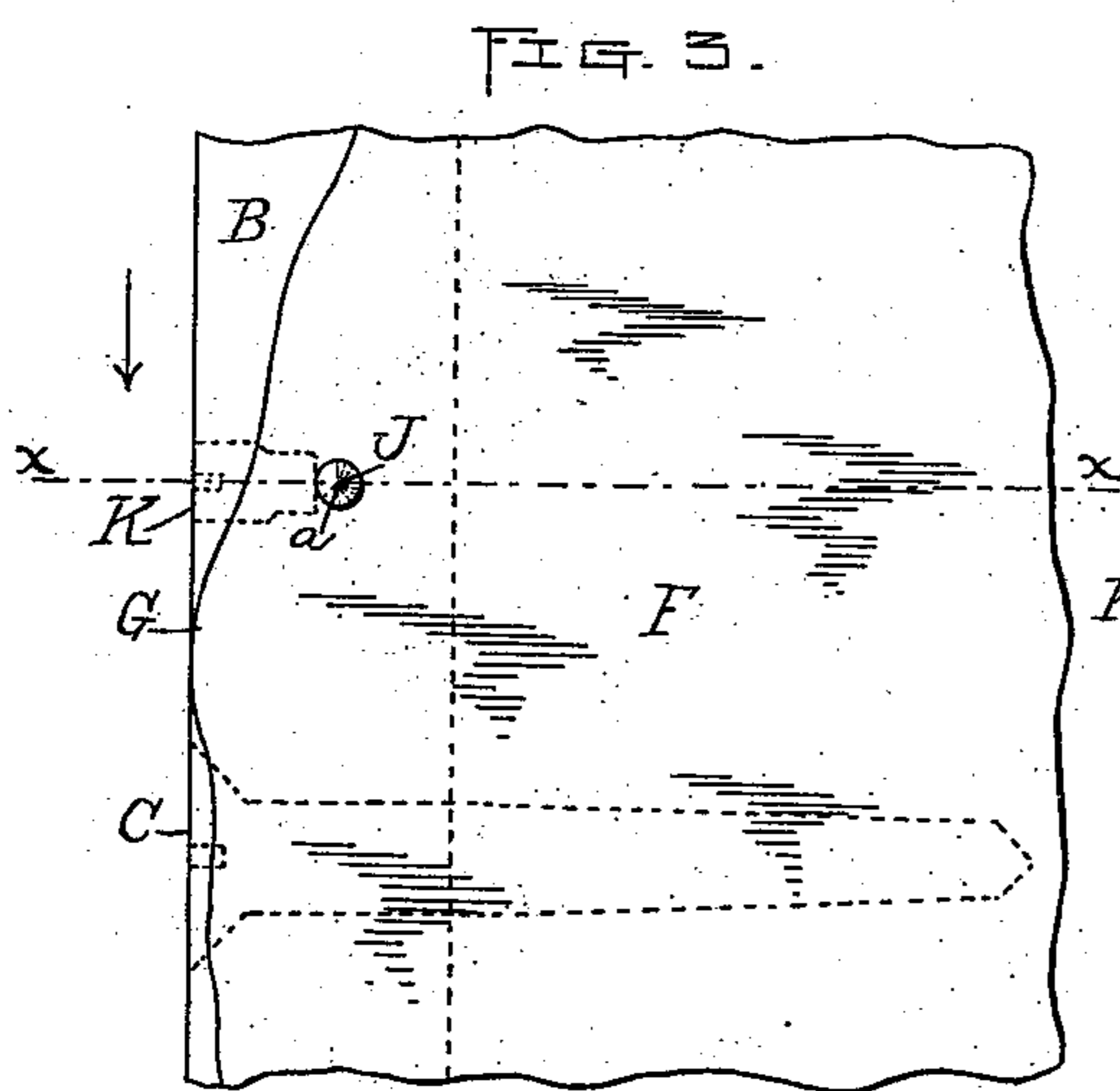
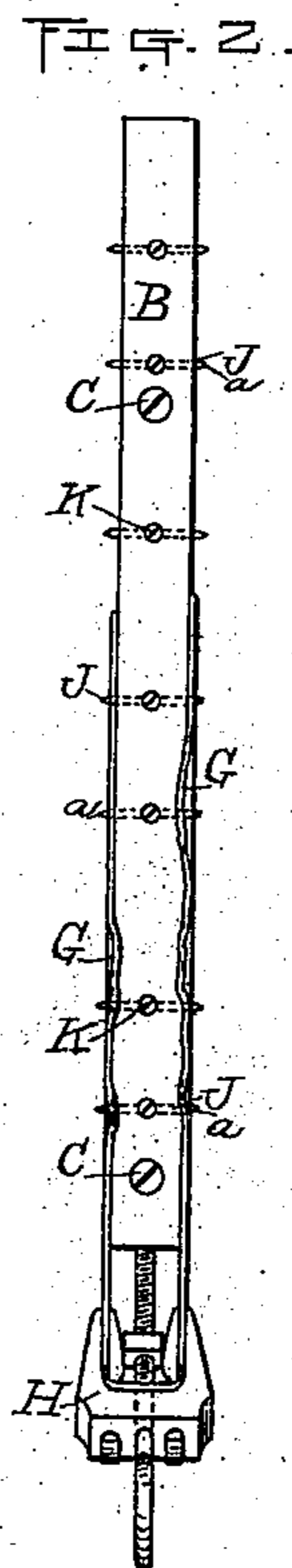
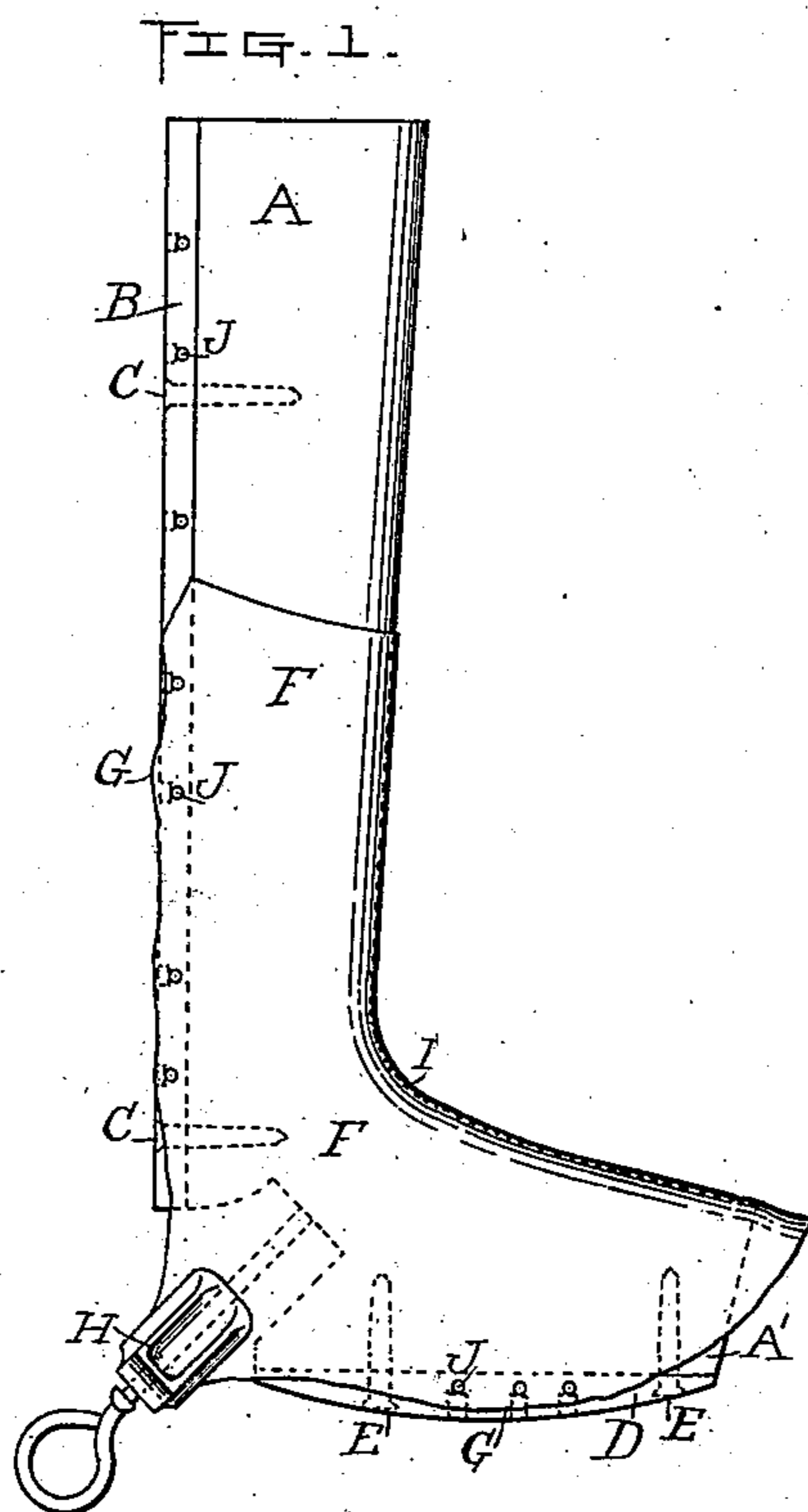
(No Model.)

E. HOUDE.

BOOT CRIMPING FRAME.

No. 377,898.

Patented Feb. 14, 1888.



Witnesses;

Louis Allaire.
Lucius W. Briggs.

Inventor;

Emile Houd,
By Thos. W. Dodge, Att'y.

UNITED STATES PATENT OFFICE.

EMILE HOUD, OF GRAFTON, MASSACHUSETTS.

BOOT-CRIMPING FRAME.

SPECIFICATION forming part of Letters Patent No. 377,898, dated February 14, 1888.

Application filed December 13, 1887. Serial No. 257,809. (No model.)

To all whom it may concern:

Be it known that I, EMILE HOUD, of Grafton, in the county of Worcester and Commonwealth of Massachusetts, have invented certain new and useful Improvements in Boot-Crimping Frames; and I do hereby declare that the following is a full, clear, and exact description, reference being had to the accompanying drawings and letters of reference marked thereon, forming a part of this specification, and in which—

Figure 1 represents a side view of a boot-crimping frame embracing my invention as it appears when in use, as will be hereinafter more fully described. Fig. 2 represents a rear edge view of the parts shown in Fig. 1, as will be hereinafter described in full. Fig. 3 represents, upon an enlarged scale, a side view of a section of the leg part shown in Fig. 1, as will be fully described hereinafter; and Fig. 4 represents, also upon an enlarged scale, a cross-section on line *x x*, Fig. 3, looking in the direction of the arrow, same figure.

To enable those skilled in the art to which my improvements relate to make and use my invention, I will now describe the same more in detail.

In the drawings, the parts marked A and B constitute the boot-crimping frame of the common form, but which common form has been made in one piece and of wood.

In my improved crimping-frame the part A is made of wood; but the part B is made of iron and securely fastened to the wood part A by screws C, as fully indicated in full and dotted lines in the drawings. A foot or bottom piece, D, also of iron, is fastened by screws E to the under side of the foot part A' of the part A.

In the ordinary and common form of crimping-frame the leather F, to form the front of the leg and top of the foot of the boot, is drawn over the crimping-frame by means of pinchers, and the edges G of the leather fastened to the back and bottom of each side of the frame by tacks driven through the edges of the leather into the wooden frame, the common and well-known clamp device H being employed to draw each side of the leather back from the instep I.

The objection to the use of tacks driven through the edges of the leather into the wooden frame is that the tacks soon puncture the wooden edges of the frame and soon split and

wear the same to such an extent that new wooden backs and bottoms have to be fitted on, which is attended with considerable expense. This, however, is not all, since the tacks entering the old tack-holes do not hold good, and much valuable time is lost in resetting the tacks, while it often happens that the workman fails to notice the failure of some of the tacks to hold, and the frame and its leather are laid away to have the crimp set, and thus defective work is produced. Still, again, the tacks become bent, and in trying to drive them so as to hold the leather properly the workman has to often make several attempts, and then often fails, and has to resort to new tacks. The loss of time and tacks used amount to a large item of expense. It has also been the practice in some cases to employ crimping-frames for boots having metallic plates provided with holes or sockets, into which the tacks are driven to secure the leather thereon, and my invention obviates, as those skilled in the art will understand, the objections to this plan. To remedy these objections to the old frames and to save the expense and trouble attending their use, is the object of my improvements, and, as before stated, I make the parts B and D of iron and dispense with the use of tacks, said iron back and bottom pieces having horizontal holes bored through them to receive double-pointed steel or iron pins J, which are held in place by set-screws K, inserted in the iron back piece, B, and bottom piece, D, as fully indicated in full and dotted lines in the drawings. Pins J have points *a a*, and I prefer to provide the ends of the pins, against which the edges of the leather draw, with serrations or screw-threads *b b*, to hold the edges G of the leather more securely. There will be less liability to accidents by this arrangement.

Of course it will be understood that pins J may be short, set from each side, and may be driven in tight, and thus dispense with set-screws; but I prefer the arrangement shown in the drawings, as being more convenient in practical use.

The operator draws the edges G of the leather F over the point *a* of a pin, J, and then with a quick blow of a wood mallet or wood hammer, applied at a point above one of the points of the pins, sets the leather down over the point of the pin, and the operation is contin-

ued until the boot-leg front and top of foot are secured to the crimp-frame, as fully indicated in the drawings, the several points of the pins J passing through the leather, which
5 is held in place by parts *b b* of the pins.

Those skilled in the art to which my invention relates will readily see and understand the great practical advantages and benefits of my said invention in the manufacture of boots.
10 The crimp-frames will last a long time without repairs, while the crimping operation can be performed in an expeditious manner. From actual tests I estimate that with my improved crimp-frames, as above described, a saving can
15 be made of at least eighty cents per day on each skilled crimper employed, while the actual exertion and fatigue of the operator are less than on the old style of crimp-frame.

When the number of boots made in a year
20 in the United States is figured up, a saving,

even if small, on each pair shows a very large sum in the aggregate.

Having described my improved boot-crimp frame, what I claim therein as new and of my invention, and desire to secure by Letters Pat- 25 ent, is—

1. The combination, in a boot-crimping frame, with the wooden parts A and A', of the metal pieces B and D, and metal-pointed pins J, permanently secured in said pieces, substan- 30 tially as and for the purposes set forth.

2. The combination, in a boot-crimping frame, with the metal parts B and D, of the pins J, provided with points *a a*, holding-serrations *b b*, and set-screws K, substantially 35 as and for the purposes set forth.

EMILE HOUD.

Witnesses:

THOS. H. DODGE,
LOUIS ALLAIRE.