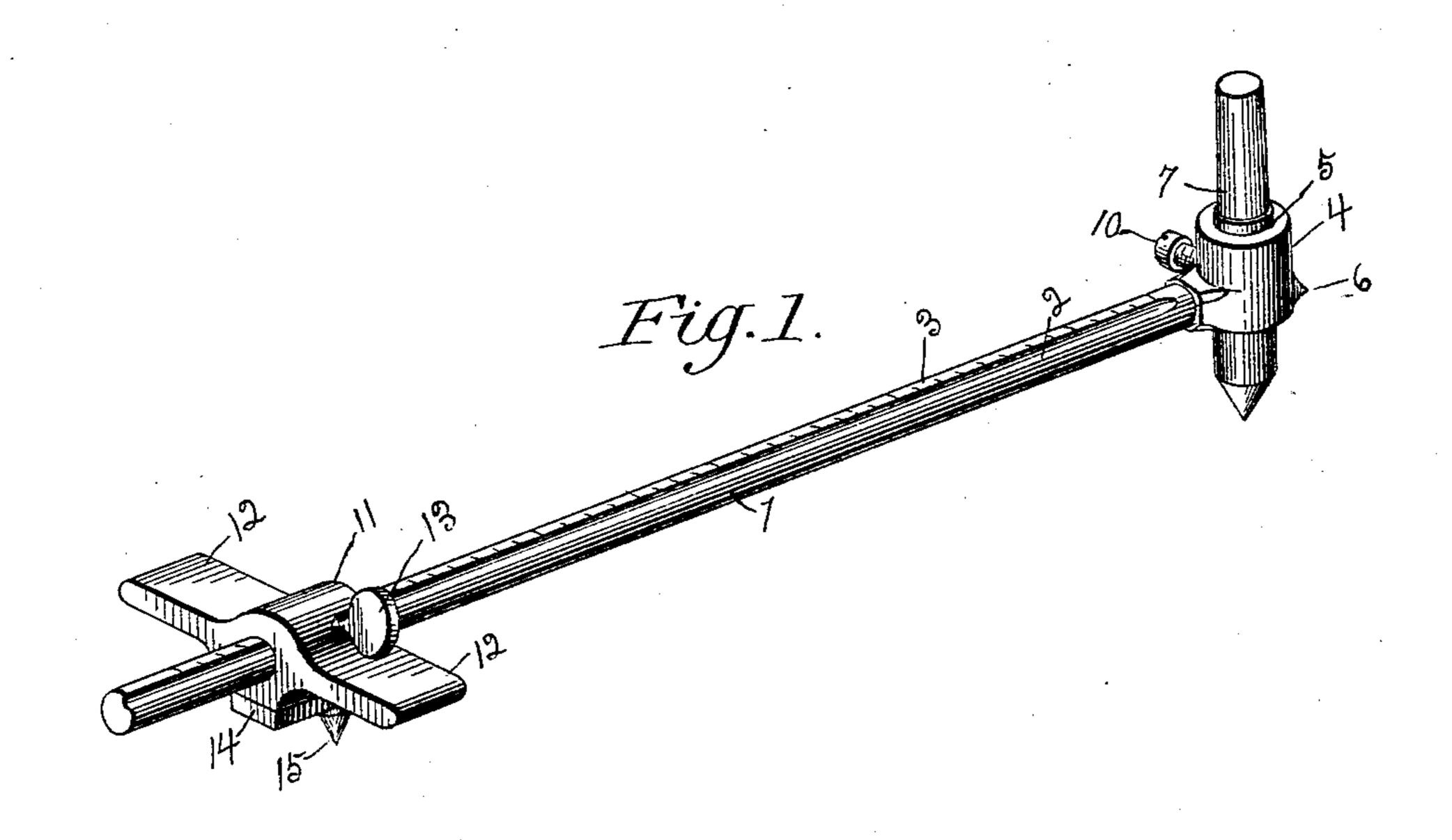
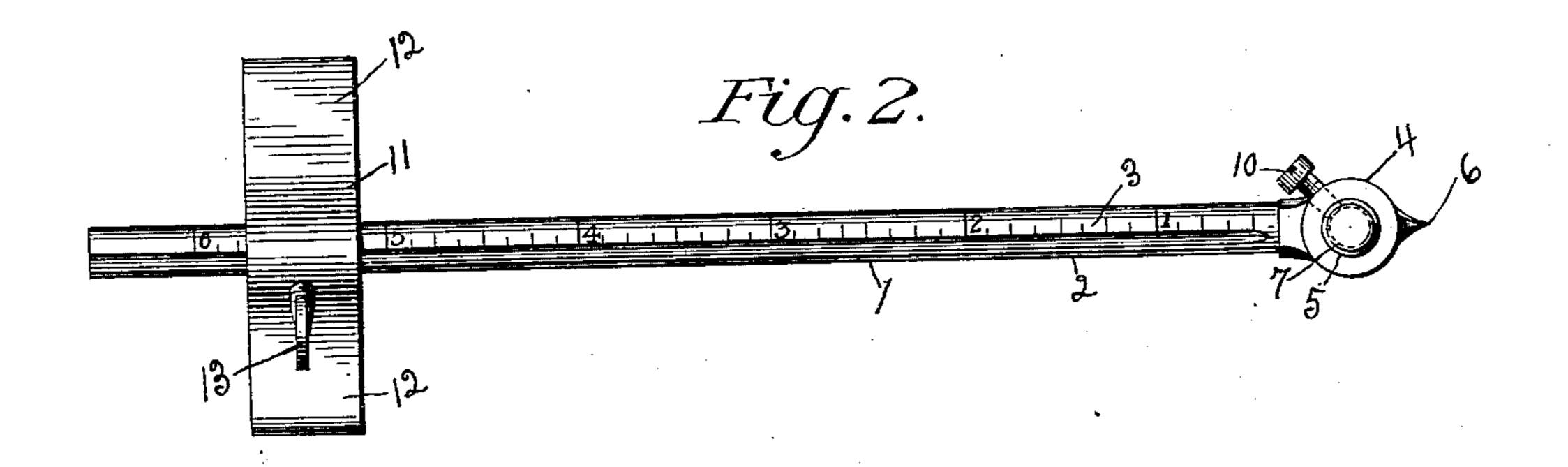
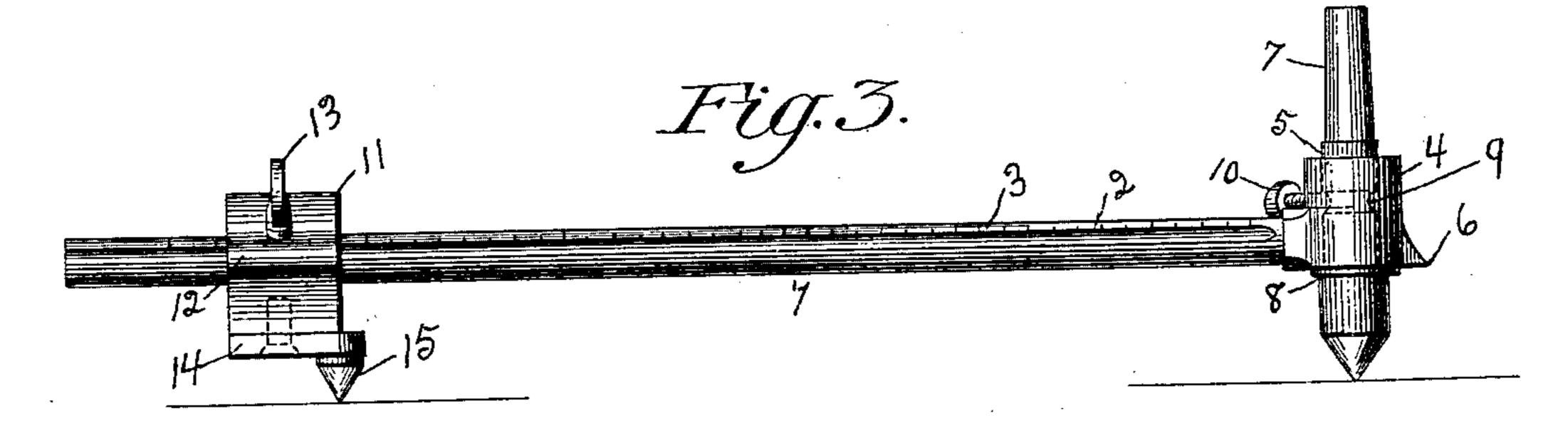
E. M. COMSTOCK. CENTER PUNCH AND GAGE.

(Application filed Nov. 1, 1900.)

(No Model.)







Witnesses: R.K. Gamble O. C. Billman Invertor.

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UNITED STATES PATENT OFFICE.

EDWIN M. COMSTOCK, OF CASCADE VALLEY, NEW YORK.

CENTER PUNCH AND GAGE.

SPECIFICATION forming part of Letters Patent No. 677,339, dated July 2, 1901.

Application filed November 1, 1900. Serial No. 35,119. (No model.)

To all whom it may concern:

Be it known that I, EDWIN M. COMSTOCK, a citizen of the United States, residing at Cascade Valley, in the county of Broome and State of New York, have invented a new and useful Improvement in Center Punches and Gages, of which the following is a specification.

My invention relates to improvements in center punches and gages for metal-workers' to use; and one object of the same is to provide an improved tool of this character which will be simple in construction and efficient in operation.

A further object of the invention is to provide a device for holding the punch in proper position for use, and which will at the same time indicate the exact distance of the latter from any given point.

The invention consists in the novel con-20 struction, arrangement, and combination of parts hereinafter described, and pointed out in the appended claims.

Referring to the accompanying drawings, Figure 1 is a perspective view of the tool constructed in accordance with my invention. Fig. 2 is a plan view of the same. Fig. 3 is a side elevation of the same.

Similar numerals of reference indicate corresponding parts throughout all the figures of the drawings.

In the drawings, 1 designates a scale-bar provided with a longitudinal guideway or groove 2 and a graduated scale 3. At the end of this scale-bar or integral therewith is an enlarged head or block 4, which is provided with a vertical opening 5 and a fixed indicating-point 6.

A center punch 7, provided with a shoulder 8 and an annular groove or recess 9, is removably mounted within the opening 5 of the block 4 and is retained in position by means of a set-screw 10, the point of which projects within the said recess. Mounted upon the scale-bar 1 is a longitudinally-adjustable sliding block 11, provided with laterally-extending ears 12 and a thumb-screw 13, the point of which rests within the longitudinal guideway or groove 2 of the scale-bar. By this arrangement, it will be readily observed, the sliding block 11 can be held in a horizontal position by means of the laterally-extending

ears 12, and the parts will be held in proper position and the block 11 can be readily adjusted to any desired position on the scalebar.

Attached to the under side of the block 11 or integral therewith directly beneath the scale-bar is a plate 14, provided with an indicating-stud 15, the point of which is directly beneath the front face of the block 11. 60

Various changes in the form, proportion, and the minor details of construction may be resorted to without departing from the principles or sacrificing any of the advantages of this invention.

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

1. In a center punch and gage, the combination with a scale-bar terminating in an en-70 larged head or block provided with a vertical opening and a fixed indicating-point and a set-screw; of a punch, provided with a shoulder and an annular groove or recess, removably mounted within the said opening of the 75 block, a longitudinally-adjustable block mounted upon the said scale-bar, and provided with a fixed indicating-stud and laterally-extending ears whereby the parts may be held in proper position, substantially as de-80 scribed.

2. As a new article of manufacture, a center punch and gage, the same consisting of a scale-bar terminating in an enlarged head or block provided with a fixed indicating-point 85 and a set-screw, a guideway or recess formed upon the surface of said scale-bar and extending longitudinally thereof to a point adjacent to the said block, a punch, provided with a shoulder and an annular groove or recess, re- 90 movably mounted within the said block, a longitudinally-adjustable block mounted upon the said scale-bar and provided with a fixed indicating-stud and a thumb-screw the point of which rests and slides within the recess of 95 the scale-bar, and ears extending laterally from the said block whereby the parts are held in proper position, substantially as and for the purpose set forth.

3. A center punch and gage, the same consisting of a scale-bar provided with a longitudinal groove and terminating in an enlarged

head or block having a fixed indicating-point and a set-screw, a punch, provided with a shoulder and an annular groove or recess, mounted within the said block, a longitudi-5 nally-adjustable indicating-block mounted upon the scale-bar and provided with laterally-extending ears whereby the same is held in a horizontal position, and a fixed indicating-stud carried by the said block, said stud to having its point or center directly beneath i

the front face of the block, substantially as shown and for the purpose specified.

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

EDWIN M. COMSTOCK.

Witnesses:

F. E. TIFFANY, FRANK PLUNKETT.