

No. 699,207.

Patented May 6, 1902.

S. A. MOE.
COMBINATION TOOL.

(Application filed July 22, 1901.)

(No Model.)

Fig. 1

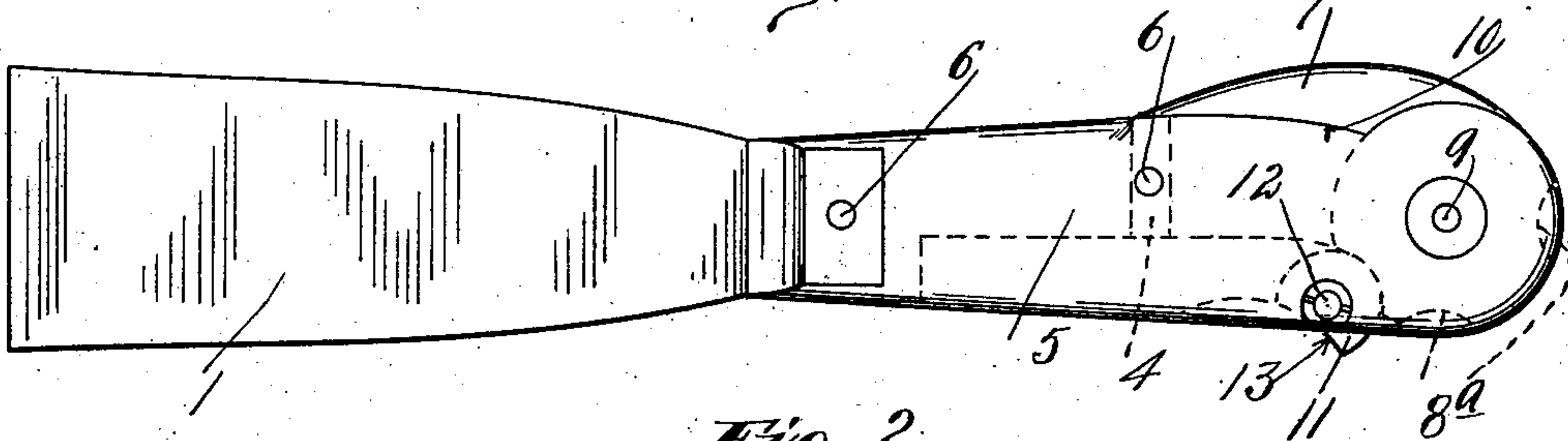


Fig. 2.

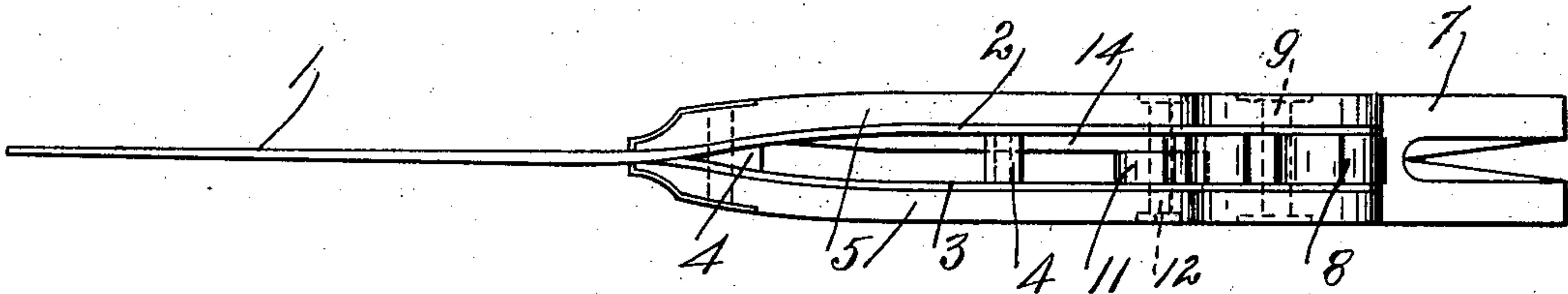


Fig. 3

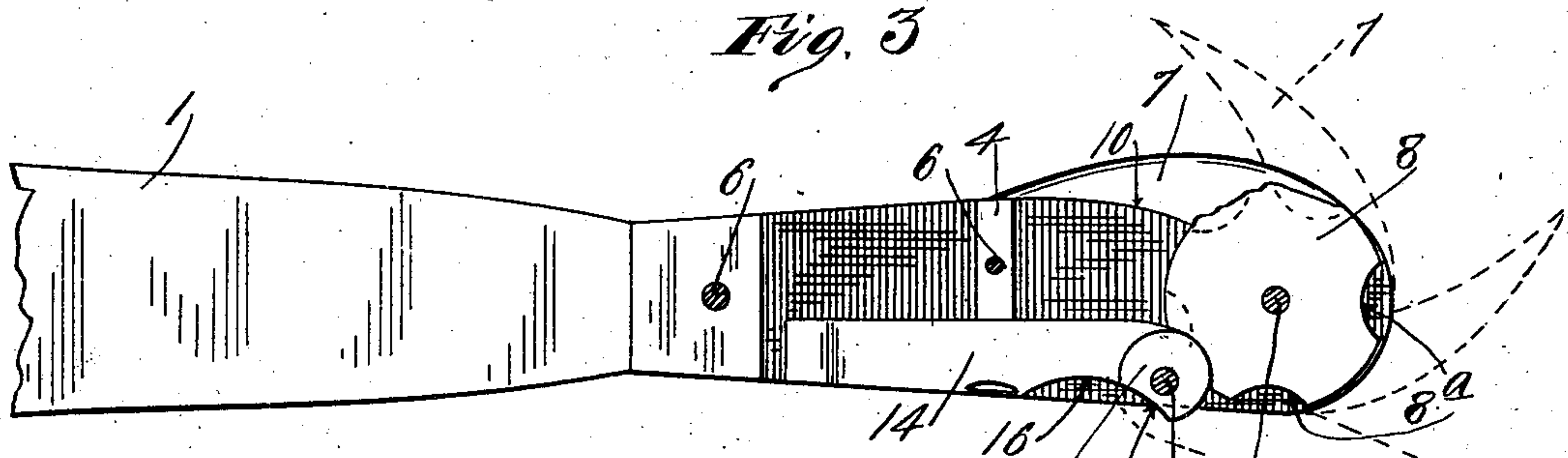
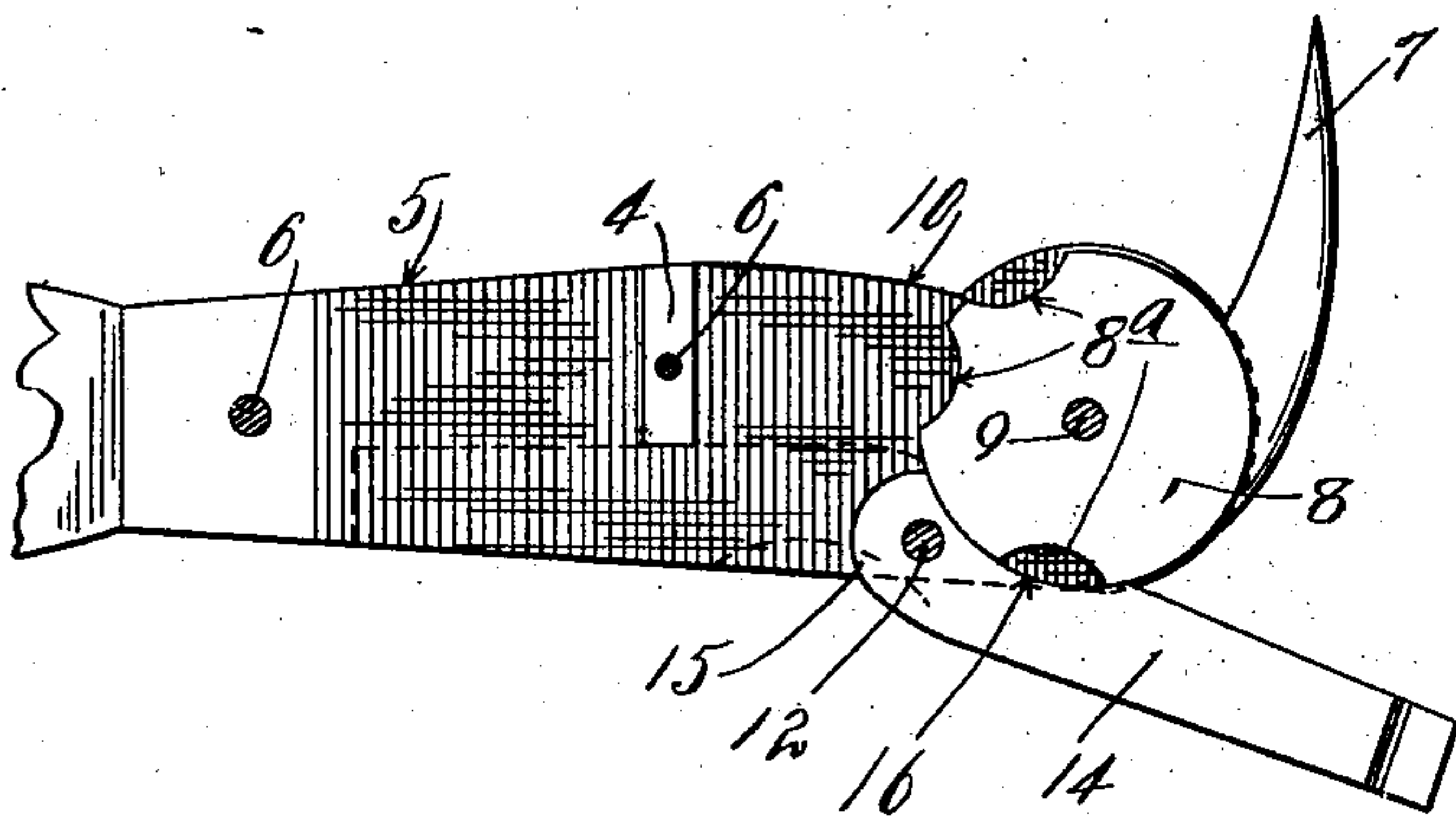


Fig. 4.



Witnesses.
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UNITED STATES PATENT OFFICE.

SAMUEL A. MOE, OF MINNEAPOLIS, MINNESOTA.

COMBINATION-TOOL.

SPECIFICATION forming part of Letters Patent No. 699,207, dated May 6, 1902.

Application filed July 22, 1901. Serial No. 69,201. (No model.)

To all whom it may concern:

Be it known that I, SAMUEL A. MOE, a citizen of the United States, residing at Minneapolis, in the county of Hennepin and State of Minnesota, have invented certain new and useful Improvements in Combination-Tools; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention has for its especial object to provide an improved combination-tool.

To the above end the invention consists of the novel devices and combinations of devices hereinafter described, and defined in the claims.

The invention is illustrated in the accompanying drawings, wherein like characters indicate like parts throughout the several views.

Figure 1 is a view in side elevation, showing my improved combination-tool with the movable parts thereof closed. Fig. 2 is a plan view of the tool with the claws opened up. Fig. 3 is a view corresponding to Fig. 1 with one side of the handle removed and the various positions of the movable parts being indicated by dotted lines; and Fig. 4 is a view corresponding to Fig. 3, but with some parts broken away and with both the screw-driver and the claws opened up.

The numeral 1 indicates the blade of a putty-knife, the inner end of which is extended at 2 and is rigidly secured to but spaced apart from a cooperating lining-strip 3 by means of spacing-blocks 4. The handle-forming pieces 5 are suitably secured by rivets 6 to the outer faces of the metal portions 2 and 3.

The numeral 7 indicates a pair of claws, which is provided with a disk-like inner end 8, having a plurality (as shown, three) of lock-notches 8^a. The said disk portion 8 is pivoted at its center between the ends of the lining-pieces 2 3 and handle-pieces 5 by means of a strong rivet 9. The projecting claws 7 are in width approximately the width of the tool-handle, and the said handle is cut at 10, so as to permit the said claws to be closely

folded against the handle, as shown in Figs. 1 and 2.

To lock the claws 7 in any one of the three positions indicated in Fig. 3, I provide a notched lock tumbler or eccentric 11, which is pivoted between the sides of the handle by means of a rivet or pin 12. This lock-tumbler 12 is provided with a segmental notch 13, which when turned into line with the periphery of the disk 8 permits the said disk and its claws 7 to be freely moved. When, however, the said lock-tumbler 11 is turned into any other position, it will engage one or the other of the notches 8^a and will lock the said disk 8 and its claws 7 in one or the other of its three positions. The said lock 11 is preferably made slightly eccentric, so that it may be moved first freely into one of the said notches and then brought into tight engagement therewith.

The third tool, which is preferably in the form of a screw-driver or similar instrument 14, is pivoted on the pin 12 by the side of the lock-tumbler 11. At its inner end the screw-driver 14 is provided with a rounding surface 15, which is also adapted to closely engage with one or the other of the notches 8^a, and it is also provided with a segmental notch or depression 16, which when turned as indicated in Fig. 4 permits the free movement of the disk 8 and its claws 7, but is itself closely engaged by the periphery of said disk 8, so that the screw-driver is locked in an open position.

From the above it will be seen that the pivoted end of the screw-driver cooperates with the lock-tumbler 11 to lock the claws in any one of their three positions, and that the screw-driver is in turn adapted to be locked by the disk 8 of the said claws. When the parts are closed, as indicated by full lines in Figs. 1 and 3, the claws are locked, and when the parts are turned as shown in Fig. 4 the screw-driver is locked in its open position.

So far as the broad idea of my invention is concerned the screw-driver or member 14 might be dispensed with. Again, instead of the putty-knife some other tool might be provided. The invention is also capable of other modifications. The tool described, however,

makes a combination-tool which is very serviceable to carpenters, painters, and many other workmen.

What I claim, and desire to secure by Letters Patent of the United States, is as follows:

1. The combination with a tool-handle, of a tool pivoted thereto and provided with a notched disk, and a locking element pivoted to said handle and provided with a notch adapted to be moved into registration with the periphery of said disk to permit free movements of said pivoted tool, said locking element in other positions being engageable with one of the notches of said disk, to lock said pivoted tool in a set position.

2. The combination with a tool-handle, of a pair of tools pivoted thereto and provided with disk-like pivoted ends, the peripheries of which intersect, and each of which disk-like ends have notches cut on the line of an

are struck from the center of the other member, whereby either tool may be locked by the disk-like end of the other, substantially as described.

3. The combination with the bifurcated tool-handle having a rigidly-connected blade 1 of the jaws 7 provided with a notched disk 8 8^a pivoted between the sides of the handle at 9, the lock-tumbler 11 pivoted between the sides of the handle at 12 and provided with the notch 13, and the tool 14 also pivoted at 12, and provided with the rounded lock portion 15 and notch 16, which parts coöperate, substantially as described.

In testimony whereof I affix my signature in presence of two witnesses.

SAMUEL A. MOE.

Witnesses:

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