

W. L. CHRYSLER & J. W. KAYS.

PITMAN CONNECTION.

APPLICATION FILED NOV. 18, 1908.

935,140.

Patented Sept. 28, 1909.

Fig. 1.

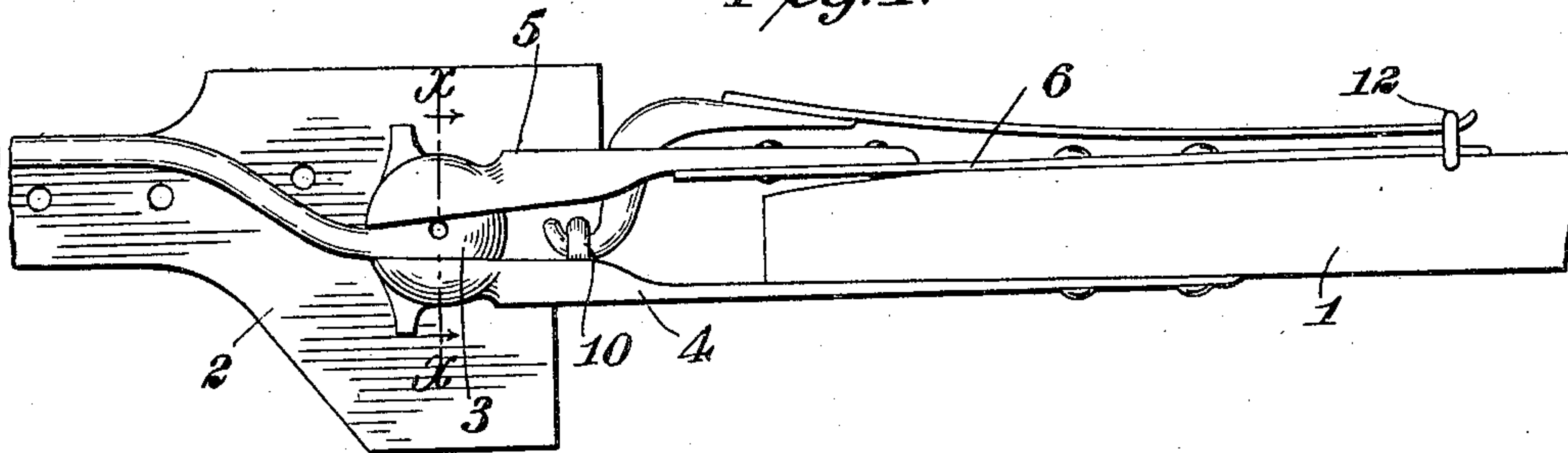


Fig. 2.

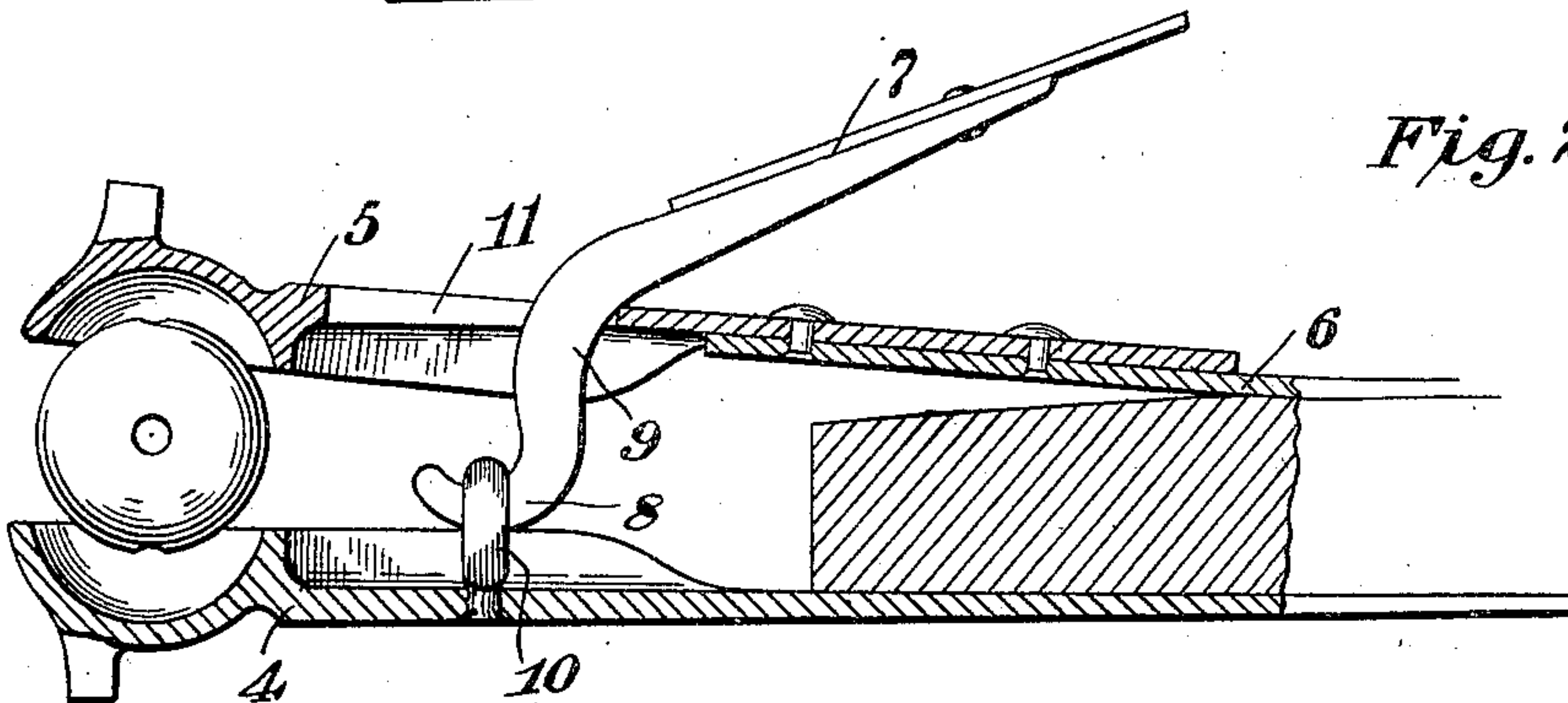


Fig. 3.

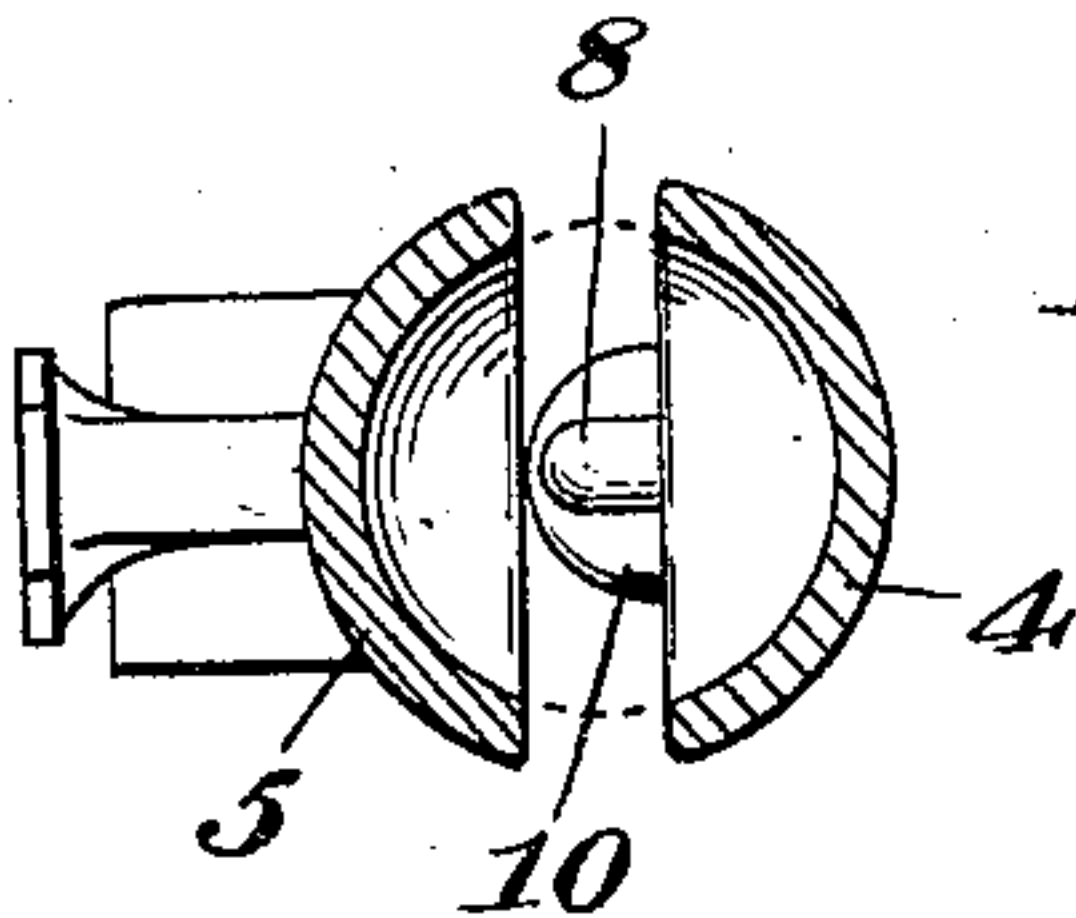


Fig. 4.

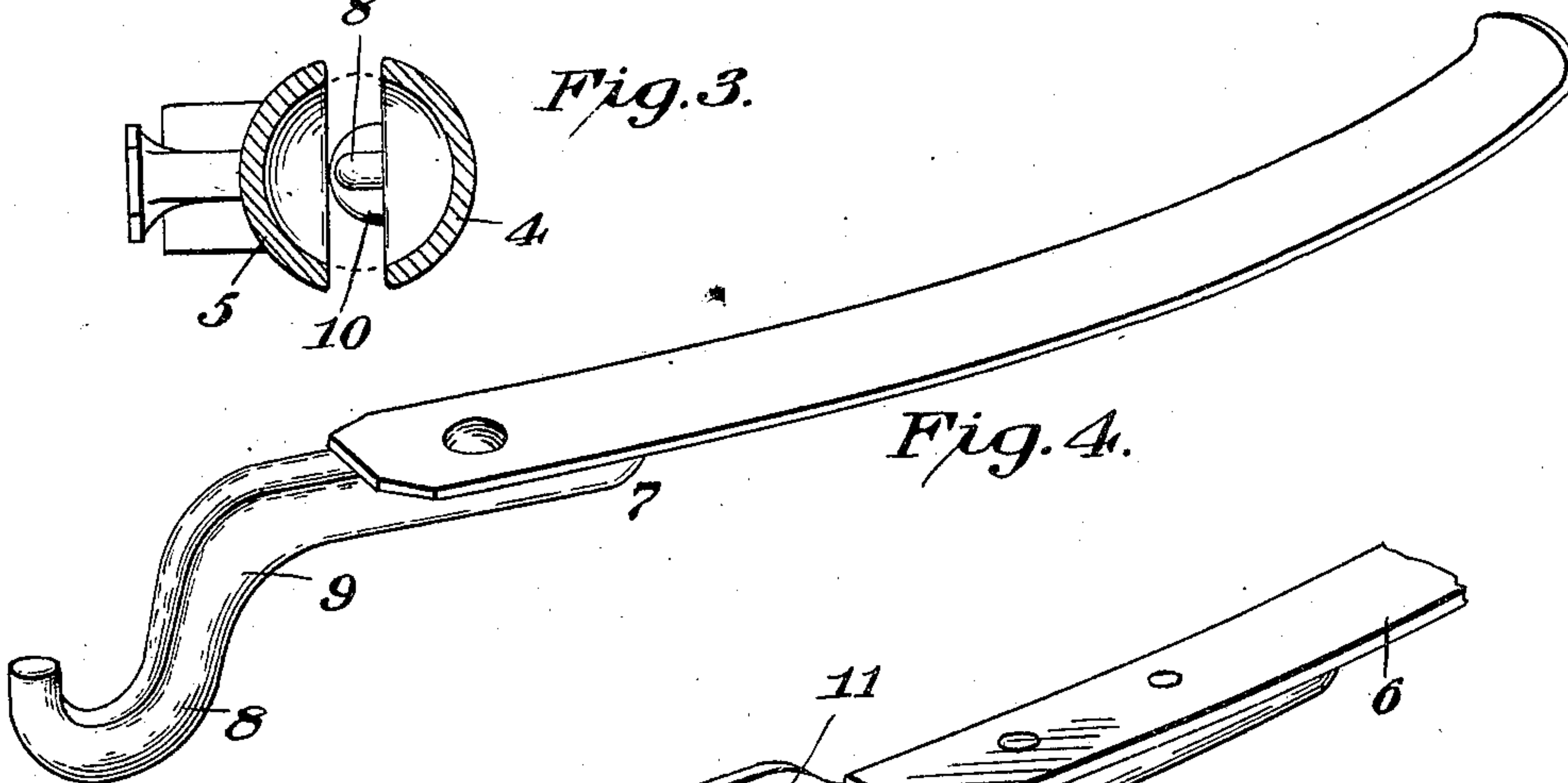
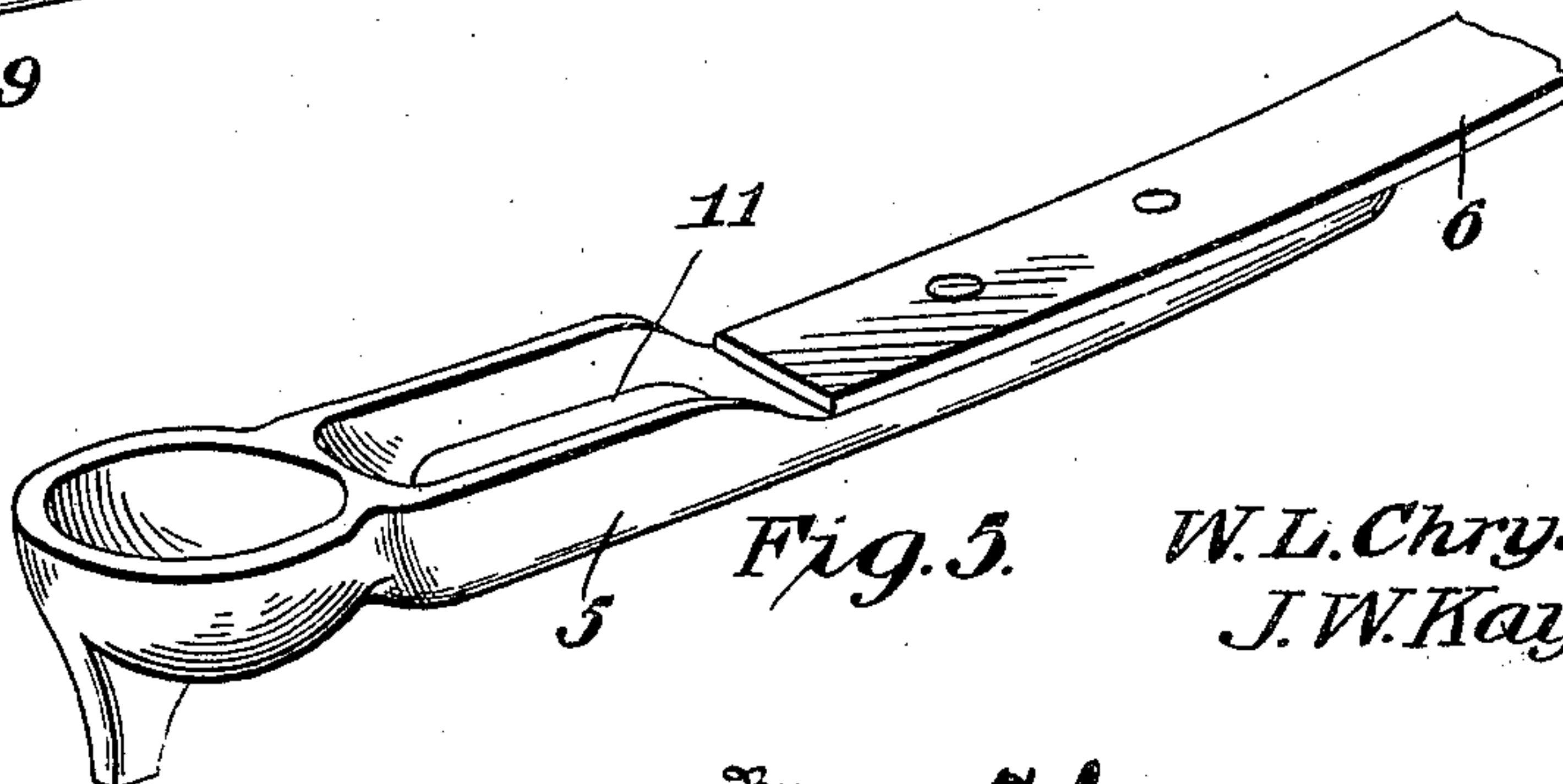


Fig. 5.



Witnesses

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By

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# UNITED STATES PATENT OFFICE.

WILLIAM L. CHRYSLER AND JOSEPH W. KAYS, OF EUGENE, OREGON.

## PITMAN CONNECTION.

935,140.

Specification of Letters Patent. Patented Sept. 28, 1909.

Application filed November 18, 1908. Serial No. 463,246.

*To all whom it may concern:*

Be it known that we, WILLIAM L. CHRYSLER and JOSEPH W. KAYS, citizens of the United States, both residing at Eugene, in the county of Lane and State of Oregon, have invented certain new and useful Improvements in Pitman Connections, of which the following is a specification.

This invention is designed to supply a novel connection between the pitman and the knife head of a mowing machine, thereby admitting of the coupling and uncoupling being readily effected and the joint automatically compensating for wear and variations, so as to obviate looseness and rattle and to insure positive movement of the knife bar without any play or lost motion, which is objectionable for various reasons.

For a full understanding of the invention and the merits thereof and to acquire a knowledge of the details of construction and the means for effecting the result, reference is to be had to the following description and accompanying drawings, in which:

Figure 1 is a top plan view of a pitman connection and the knife head of a mowing machine embodying the invention: Fig. 2 is a horizontal section of the parts shown in Fig. 1, the spoon or socket members being spread; Fig. 3 is a transverse section on the line  $x-x$  of Fig. 1; Fig. 4 is a detail view of the spring hooked lever; and Fig. 5 is a detail view in perspective of the spring spoon or socket member.

Corresponding and like parts are referred to in the following description and indicated in all the views of the drawings by the same reference characters.

The pitman 1 may be of any construction generally employed for transmitting motion from the operating mechanism of a mowing machine to the knife bar. The knife head 2 has a ball 3 forming a bearing to receive and cooperate with the spoons or socket members applied to the outer or lower end of the pitman 1.

One spoon or socket member, as 4, is rigid and is secured by a strap or shank to a side of the pitman 1. The other spoon or socket member 5 is similarly attached to the opposite side of the pitman 1 by means of a spring strap or shank, thereby admitting of the member 5 moving toward and from the member 4. The spring or strap 6 may be attached to the spoon 5 or form a part thereof and normally serves to hold the

spoons or socket members separated, as indicated in Fig. 2. The end of the pitman 1 is reduced to admit of the spoons or socket members 4 and 5 being pressed together, so as to closely embrace opposite sides of the ball 3 when the pitman is properly coupled to the knife head.

The means for pressing the spoon or socket members together consists essentially of a lever 7, the handle portion of which is resilient or constructed so as to possess a spring action. The operating lever 7 terminates in a hook 8, and a portion of the lever adjacent to the hook 8 is bent or offset, as indicated at 9 for a purpose presently to be explained. The handle or spring portion of the lever may be separated from the hooked portion and attached thereto, or said parts may be formed of a single piece. The spoon member 4 is provided upon its inner side with an eye 10 which is engaged by the hook 8 of the operating lever. The spoon member 5 is formed with a slot 11 through which the hooked end of the lever 7 passes, the inner end of the slot being engaged by the bent or offset portion 9 of the lever, which acts as a cam to press the members 4 and 5 together, when the end of the lever 7 is moved toward the pitman 1. When the outer end of the lever 7 is pressed close against the side of the pitman 1, it is retained in position by means of a link 12 engaging thereover, said link being confined to the pitman by the strap or shank of the member 5.

When coupling the pitman to the knife head 2, the parts are arranged so that the ball 3 comes between the spoons or socket portions of the members 4 and 5, and upon pressing the outer end of the lever 7 toward the pitman, the member 5 is moved toward the member 4 and grips the ball 3. By reason of the strap or shank of the spoon or socket member 5 being a spring and the handle portion of the lever 7 being likewise a spring, the ball 3 may be firmly gripped between the spoons or socket members in a manner to prevent any play or lost motion and also to obviate any binding or abnormal friction, which would detract materially from the effectiveness of the connection. It will be understood also that the connection is equally well adapted for a new knife head or for a knife head that has been in use and whose bearing member or ball 3 has become worn. When the link 12 is disengaged from the lever 7 and the latter is released from re-



strait, the member 5 automatically moves away from the member 4, thereby releasing the ball 3 and admitting of the pitman being easily and quickly disconnected from the knife head. When coupling the pitman, should the ball 3 be gripped between the spoons before the outer end of the spring hooked lever 7 reaches the side of the pitman 1, the spring shank or strap of the member 5 yields, thereby permitting of a further movement of said member 5 without causing the ball 3 to be gripped between the spoons with such force as to bind and prevent the usual movement between the ball and socket members of the joint. The spring handle portion of the lever 7 admits of the latter being pressed close against the pitman, so as to be out of the way and engaged by the link 12.

20 Having thus described the invention, what is claimed as new is:

A pitman connection of the character set forth, comprising a pitman, spoons or socket members attached to opposite sides of the pitman, one of said spoons having a spring strap or shank and formed with a slot, an eye extending inwardly from the other spoon and housed between said spoon members, and a lever having one end thereof provided with a hook engaging the eye and its other end adapted to be pressed toward and held against one side of the pitman, the intermediate portion of the lever being offset and adapted to bear against one wall of the slot. 35

In testimony whereof we affix our signatures in presence of two witnesses.

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Witnesses:

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