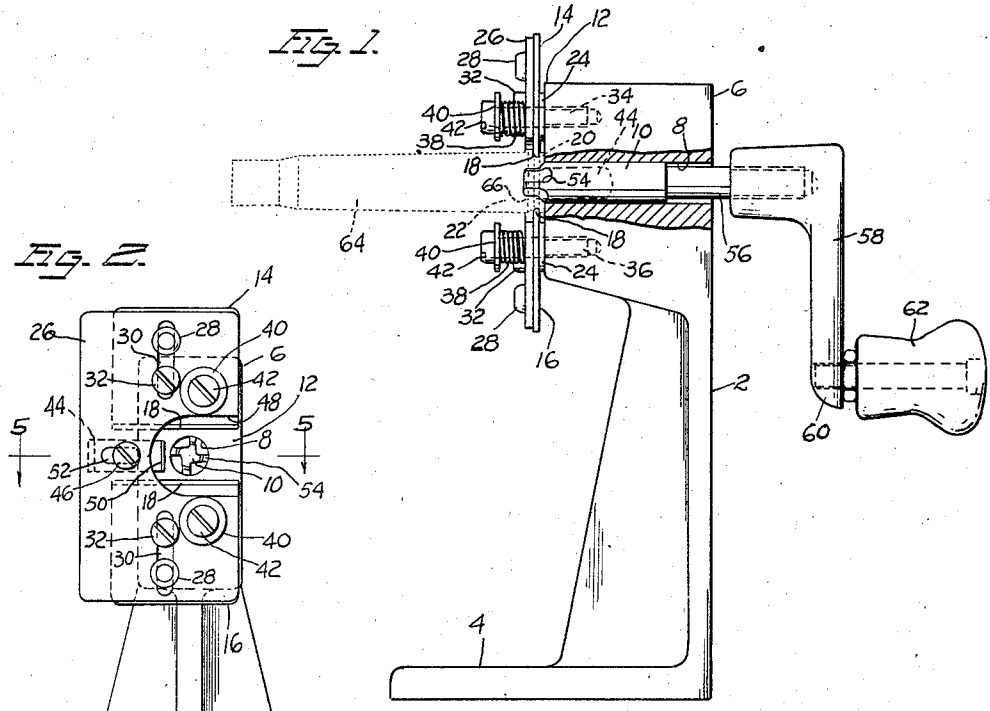
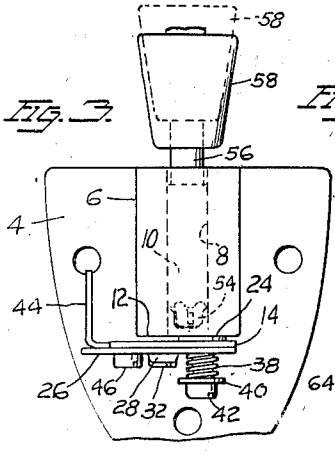
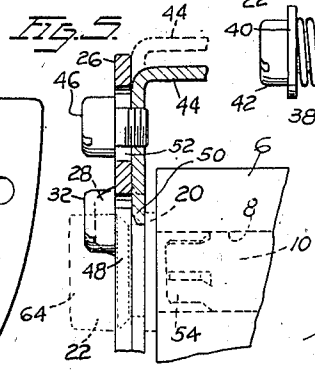
June 22, 1948. G. T. SMILEY 2,443,807

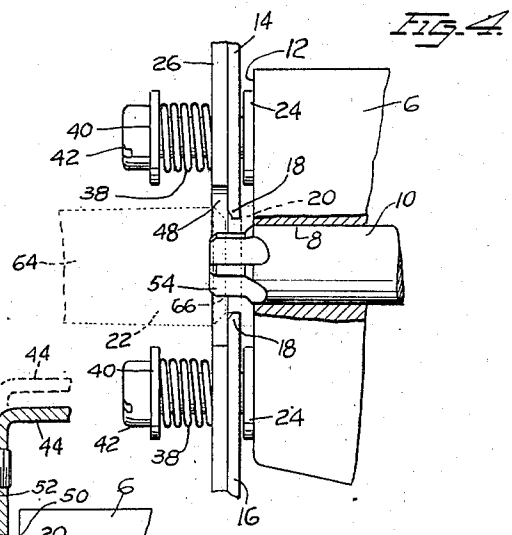
PRIMER POCKET REAMING APPARATUS AND THE LIKE

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PRIMER POCKET REAMING APPARATUS AND THE LIKE

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1 Claim. (Cl. 77—3)

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My invention relates to a primer pocket reaming apparatus and more particularly to a device having a reamer and a holder therefor, adapted for reaming and cleaning a primer pocket of a cartridge case head.

Accordingly an object of my invention is to provide an apparatus comprising a cartridge holder and a reamer therefor, said holder being adapted for mounting a cartridge case head therein when reaming a primer pocket within the case head, also, for removing the crimp around the primer, so that said cartridge case may be re-loaded and be used again.

Another object of my invention is to provide said apparatus with means for adjusting the holder of said cartridge case head whereby any standard size cartridge case may be held in place and when reaming the primer pocket therein, whether it may be the rim type or a rimless head.

Further object of my invention is to provide said apparatus with a precision reamer means having a step angle thereon, so that said reaming may be accomplished in one operation, also, to ream a true primer pocket in the cartridge case head, and thereby preventing serious damage to the gun and for preventing the escape of gases when a cartridge is fired therefrom.

My invention also has for its objects to provide such means that are positive in operation, convenient in use, easily installed in working position and easily disconnected therefrom, economical in manufacture, relatively simple, and of general superiority and serviceability.

Other and further objects and advantages of my invention as will herein after more fully appear, I attain by the construction herein shown on the drawings and described in the specification, forming a part of my application.

Reference is now had to the accompanying drawings in which the similar reference characters denote the same parts.

In the drawings;

Fig. 1 is a side elevational and partly sectional view of the apparatus, showing a cartridge case holder and a reamer in position.

Fig. 2 is a front elevational view of the apparatus, taken from the left of Fig. 1.

Fig. 3 is a fragmentary top view thereof.

Fig. 4 is an enlarged fragmentary and partly sectional side view of the holder and showing a reamer when in its reaming position.

Fig. 5 is a fragmentary and sectional view of the holder, taken in the direction of arrows 5—5 in Fig. 2, and showing the adjustable gage lever in position.

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Describing my invention more in detail, said invention comprises a stand 2, having a mounting base 4 and a head section 6.

Said head section 6 is provided with a suitable socket 8 wherein a reamer 10 is held in a slidable and rotatable position.

The front section 12 of said head 6 is provided with a pair of adjustable plates 14 and 16, each having a tapered edge 18 adapted for engaging the rim section 20 of a cartridge case head member 22.

Said plates 14 and 16 are supported upon a pair of washers 24, which are for the purpose of holding said plates in a slightly extended position, thereby facilitating the location of said cartridge case head 22, when placed therebetween, as shown in Fig. 4.

Also, said plates 14 and 16 are held in place by means of a suitable front plate 26, upon which said plates are located and held in their respective positions by means of rivets 28, each being disposed and passing through a suitable slot 30 and each having a screw 32 provided therein for facilitating the adjustments of said plates 14 and 16, as required.

Said front plate 26 including said adjustable plates 14 and 16 are held in position upon said head 6 by means of a pair of studs 34 and 36, each of which extends outwardly as shown, and each is provided with a pressure spring 38, supported by a washer 40 which bears against the stud head 42, thus allowing the cartridge case head 22 to be held firmly in place and position.

In order to secure a central position for said cartridge case head 22, a suitable adjusting lever or plate 44 is provided, which is mounted upon the inner side of said front plate 26 and is held in place by means of a screw 46.

Also, for accommodating variable cartridge head diameters, a suitable side opening 48 is provided in said front plate 26, which is large enough to permit any size of a cartridge case head to be placed therein when necessary.

For adjusting the extended end 50 of said lever 44 against said case head 22, in order to hold it in a central position, said front plate 26 is provided with a suitable slot 52, so that any suitable adjustment may be made, and thereby holding said case head 22 in line with said reamer socket 8.

Said reamer 10 at its end, is provided with a primer pocket cutter 54, which is moved inwardly into said socket 8, when said case head 22 is being placed into reaming position.

Said reamer 10 is also provided with a suit-

able extension shank **56** upon which a suitable crank member **58** is mounted, having its extended end **60** provided with a knob **62**, so that the turning and rotating of said reamer **10** may be facilitated.

When said cartridge case head **22** of the cartridge **64** is set in its position, then said reamer **10** is moved frontwardly and into the prime pocket **66**, and by imposing a slight hand pressure said prime pocket is reamed correctly and accurately, removing any and all nicks or crimp which may be present and champhering the edge correctly in one operation.

It may also be noted, that in holding said case head **22** squarely in position and against the surface of said front section **12**, said prime pocket **66** may be reamed true in line, and thereby an off-center, oblong or sideward reaming of the pocket is prevented.

While I have thus described my invention with great particularity, it will be clear that the same may be modified throughout a wide range.

I accordingly do not propose to be limited to the exact details of construction herein shown and described, but reserve the rights in practice to make the necessary changes and modifications therein which may come within the scope of the appended claim.

I claim as my invention.

In a device of the class described comprising, a stand having a base and a head member, a reamer rotatably mounted in said head member having the front end thereof terminating with a primer pocket cutter, a crank member at the rearwardly extending end of said reamer, a front surface in said head member, a pair of studs mounted in and extending frontwardly from said front surface, a washer on each stud, a front plate mounted on said studs, a pair of adjustable front plates mounted between said front plate and said washers, a tapered edge in each front plate for engaging the rim section of a cartridge case, an adjustable lever plate mounted upon said front plate having the extended end thereof disposed in close proximity to said pair of adjustable front plates for holding the head of said cartridge case in a central position and at the center line with said rotatable reamer, and a pair of resilient means at the mounting of said front plate means for forcing the head of said cartridge case squarely against the front surface of said head member and for holding said cartridge case head rigidly in position when said primer pocket is being reamed.

GERALD T. SMILEY.

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