Nov. 14, 1950 K. F. LEACH 2,530,307

WRENCH HOLDER

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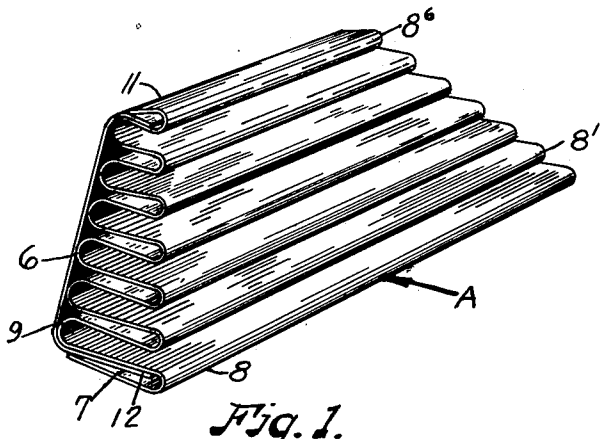


Fig. 1.

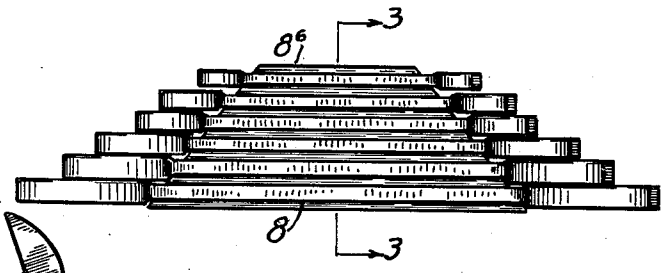


Fig. 2.

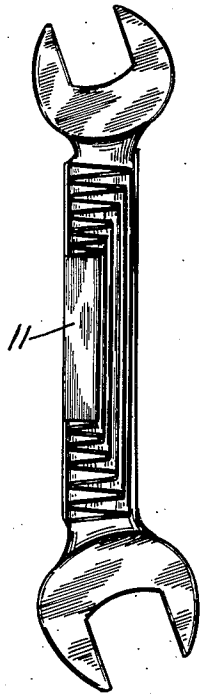


Fig. 4.

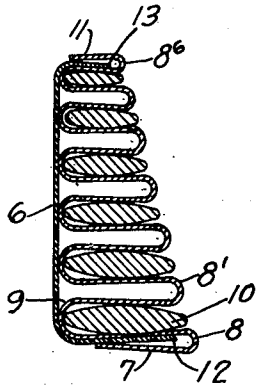


Fig. 3.

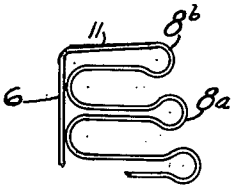


Fig. 5.

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WRENCH HOLDER

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1 Claim. (Cl. 211—120)

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This invention relates to improvements in wrench holders of a type especially designed for holding a graded set of similar wrenches in such a way that any one wrench of the set may be removed and replaced without interfering with the other wrenches of the set.

It is the principal object of this invention to produce a holder of the type in which each wrench is firmly, but yieldingly, held in a separate pocket of a corrugated sheet steel holder in such a way that they may be carried in a tool kit, or supported on a bench.

Another object of the invention is to produce a holder that shall be provided with a reenforced back that prevents the holder from becoming bent and distorted when roughly handled and make the use of a cover or restraining plate unnecessary.

The above and any other object that may become apparent as the description proceeds are attained by means of a construction and an arrangement of parts that will now be described and reference for this purpose will be had to the accompanying drawing in which the invention has been illustrated, and in which:

Figure 1 is a perspective view showing the holder;

Figure 2 is a top plan view showing the holder with a set of wrenches positioned therein;

Figure 3 is a side elevation looking downwardly in Figure 2;

Figure 4 is a section taken on line 3—3, Figure 2; and

Figure 5 is an explanatory diagram in cross section similar to Figure 3.

In the drawing reference character A designates the holder in its entirety. The holder consists of two parts, namely, a corrugated wrench holding clip and a reenforcing or strengthening back 6. The holding clip is made of sheet material, preferably of steel and should have considerable elasticity, any elastic sheet may be used.

The clip is folded or corrugated transversely. The blank sheet has the shape of a truncated triangle. The wide end has been designated by numeral 7 and this is folded along the rounded return bend 8 from which it extends to the lower return bend 9, thence to the outer return bend 8' forming a pocket for the reception of a wrench handle 10. The folding is continued until there has been formed a pocket for each wrench in the set. In the example shown on the drawing, there are six wrenches and six pockets. The narrow end of the holder is bent rearwardly as shown at 11. Steel plate 6 has its two ends 12 and 13 positioned between ends 7 and 11 and the adjacent pocket walls. Ends 12 and 13 may be spotwelded to parts 7 and 11. Plate 6 may be as heavy as may be found necessary and is preferably of material having considerable resiliency so that if it is accidentally bent, it will resume its normal shape.

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The clip is normally bulged at the return bends 8 as indicated most clearly in Figure 5 where these bends have been designated by reference characters 8a and 8b. The space between the two sides of the pockets may be somewhat smaller in proportion than shown in Figure 3 and preferably as shown in Figure 5. The thickness of the space will, of course, depend upon the thickness of the wrench heads and must be governed thereby. The end walls of the clip are tapered so as to lie just along the inner surfaces of the wrench heads as shown in Figure 2.

When the wrenches are in place, the assembly has the appearance shown in Figure 2 and the set of wrenches can thus be carried in a tool kit or they may be resting on a bench. Any one of the wrenches may be removed and replaced without disturbing any of the other wrenches in the set as distinguished from many wrench holding clips now on the market where the wrenches are held firmly only when all of them are in position.

It is evident that a clip like that shown in the drawing and shown most clearly in cross section in Figure 3 would hold a set of wrenches whether or not the reenforcing back 6 were in place. Without the reenforcing back the clip would become very flexible and vulnerable. Such a clip could easily be distorted by an accidental application of force to such an extent that it would become practically useless. By providing the reenforcing back 6, the clip is protected against accidental bending and the back of the reenforcing plate provides a smooth flat surface for a steel stamp by means of which the manufacturer's name and address and/or the trade-mark can be applied by means of a suitable steel stamp.

Applicant is aware that somewhat similar wrench holders have been invented and does not claim to be the originator of the idea in its broadest aspect, but he believes he is the first one to have provided such clips with a reenforcing back plate so as to produce a strong assembly and make it possible to construct the corrugated clip portion out of much thinner steel

than would be practicable if the reenforcing plate were absent. By means of the construction shown, the need of a cover to hold the wrenches in position is obviated, because the bulged ends 8 serve to positively hold the wrenches in place and due to the comparatively thin material that can be used, the wrenches may be easily inserted and removed even when the edges 8 are bulged considerably.

In the above description the backing plate 6 has been shown as a separate piece. It is to be understood, however, that it may be integral with the folded part and form an extension of end 11 as shown in Figure 5 instead of being positioned in the space between end 11 and the adjacent pocket wall. Such a construction would be the equivalent but would somewhat complicate the manufacture.

Having described the invention what is claimed as new is:

A wrench holder comprising, a corrugated clip whose corrugations serve as pockets to receive and hold the various wrenches of a graduated set, the ends of the clips being both bent rearwardly in substantially parallel relation to the outer walls of the end pockets, and a reenforcing backing plate having its ends projecting substantially perpendicularly therefrom, the said ends extending into the spaces between ends of the clip and the outer surfaces of the adjacent pocket walls, the ends of the clip and the ends of the reenforcing plate being interconnected by spotwelding or the like.

KANT F. LEACH.

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The following references are of record in the file of this patent:

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