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GLASS PLIERS

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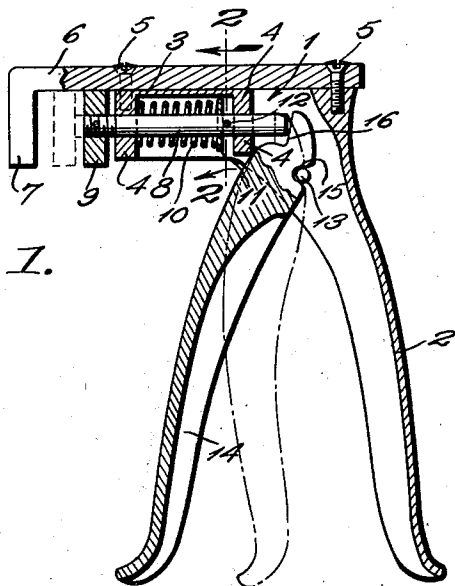
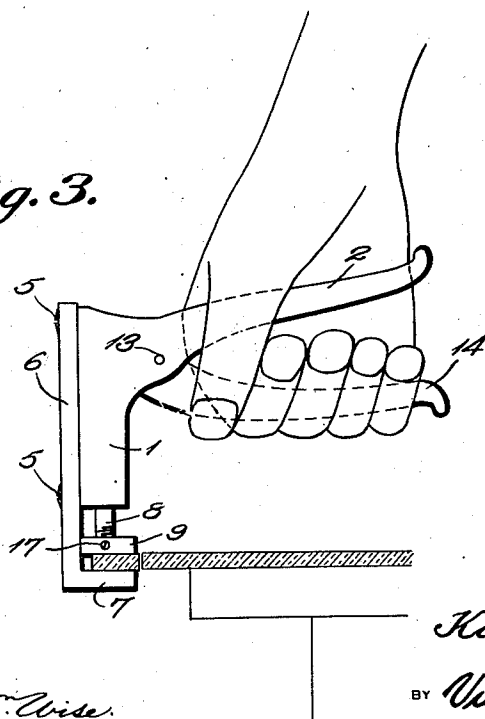


Fig. 1.



Fig. 2.

Fig. 3.



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GLASS PLIERS

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1 Claim. (Cl. 49—52)

This invention relates to tools, and its general object is to provide a tool in the form of pliers, that are primarily designed for use by glaziers, for trimming the edges of plate glass, particularly in places where ordinary pliers or tools cannot be used, such as for instance at the upper portion of a show window, while installing a piece of glass that must be trimmed in order to fit the window space.

A further object of the invention is to provide pliers of the character set forth, that are simple in construction, inexpensive to manufacture, and extremely efficient in use, operation and service.

This invention also consists in certain other features of construction and in the combination and arrangement of the several parts, to be hereinafter fully described, illustrated in the accompanying drawing and specifically pointed out in the appended claim.

In describing my invention in detail, reference will be had to the accompanying drawing wherein like characters denote like or corresponding parts throughout the several views, and in which:

Figure 1 is a vertical sectional view taken through the pliers which forms the subject matter of the present invention.

Figure 2 is a sectional view taken approximately on line 2—2 of Figure 1, looking in the direction of the arrows.

Figure 3 is a side elevation illustrating my pliers in use.

Referring to the drawing in detail, the reference numeral 1 indicates the body of my tool or pliers and which as shown, is hollow and elongated, in that it includes relatively long, spaced parallel walls having formed on one end thereof and depending therefrom at substantially right angles with respect thereto, as well as at an outward inclination, a hollow handle 2 of substantially oval configuration in cross section, and the outer end of the handle 2 is outwardly flared as shown.

Bridging the side walls of the body and depending from the ends of a relatively narrow top wall 3 is a pair of lugs 4 having openings there-through for a purpose which will be presently apparent.

Mounted on the upper end of the body 1 and fixed thereto through the medium of screws 5 is the attaching plate 6 of a stationary jaw 7, the latter being disposed at right angles with respect to the attaching plate 6 and arranged in spaced parallel relation with respect to the outermost lug 4. By that construction, it will be apparent that the attaching plate and the stationary jaw is detachably associated with the body so that it

can be easily and expeditiously replaced in the event it becomes damaged.

Mounted for slidable movement in the openings of the lugs 4 is a shaft or rod 8 which has threadedly secured to its forward end a movable jaw 9, the latter being movable upon movement of the rod 8, as will be apparent, and the jaw 9 is movable between the outermost lug 4 and the stationary jaw 7 for cooperation with the latter, with the upper end of the movable jaw bearing against the undersurface of the attaching plate 6. By threadedly securing the jaw 9 to the rod 8, it will be obvious that the jaw 9 is adjustable, and it is held in adjusted position by a set screw 17.

The jaw 9 is spring pressed and for that purpose I employ a coil spring 10 which has one of its end convolutions engaging the outermost lug 4 and its opposite convolution engaging a washer 11 which is mounted on the rod 8 and held against rearward movement by a pin 12 that extends through the rod, as best shown in Figure 1, therefore it will be seen that the spring 10 is disposed between the lug 4 and the side walls of the body, so as to be amply protected.

Bridging the sides of the body at the juncture of the stationary handle 2 therewith is a pin 13 that acts as a pivot for the movable handle 14 which is provided with a recess 15 receiving the pin 13, and the upper end of the handle 14 is reduced to provide a seat 16 for the purpose of receiving the rear end of the rod 8, with the result, it will be seen that the coil spring 10 not only acts to urge and hold the movable jaw to and in retracted position, but acts upon the movable handle to normally hold the latter spaced with respect to the stationary handle. However, when pressure is applied to the movable handle, it moves the rod 8 forwardly and disposes the jaw 9 in cooperation with the stationary jaw 7, as shown in dotted lines in Figure 1.

From the above description and disclosure of the drawing, it will be obvious that I have provided pliers that are primarily designed for use by glaziers in trimming glass, in places where it would be impossible to use pliers of the usual construction, such as for instance about the edges of plate glass when setting or installing the same in a show window frame or the like.

It is thought from the foregoing description that the advantages and novel features of my invention will be readily apparent.

I desire it to be understood that I may make changes in the construction and in the combination and arrangement of the several parts, pro-

vided that such changes fall within the scope of the appended claim.

What I claim is:

Pliers comprising an elongated body including
5 spaced parallel walls, a stationary jaw, an attaching plate therefor with the jaw extending at right angles with respect thereto and said plate secured to the body for disposal along the walls thereof, a stationary handle fixed to the body and
10 extending substantially at right angles with re-

spect thereto and in a plane substantially parallel with that of the jaw, spaced lugs fixed between the walls, a spring pressed rod mounted for slidable movement through the lugs, a jaw adjustably secured to one end of the rod and cooperating with the stationary jaw, a handle 5 pivotally secured to the stationary handle and engageable with the opposite end of the rod for moving the latter against the action of its spring.

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