July 12, 1938. E. STECCONE 2,123,638

SQUEEGEE

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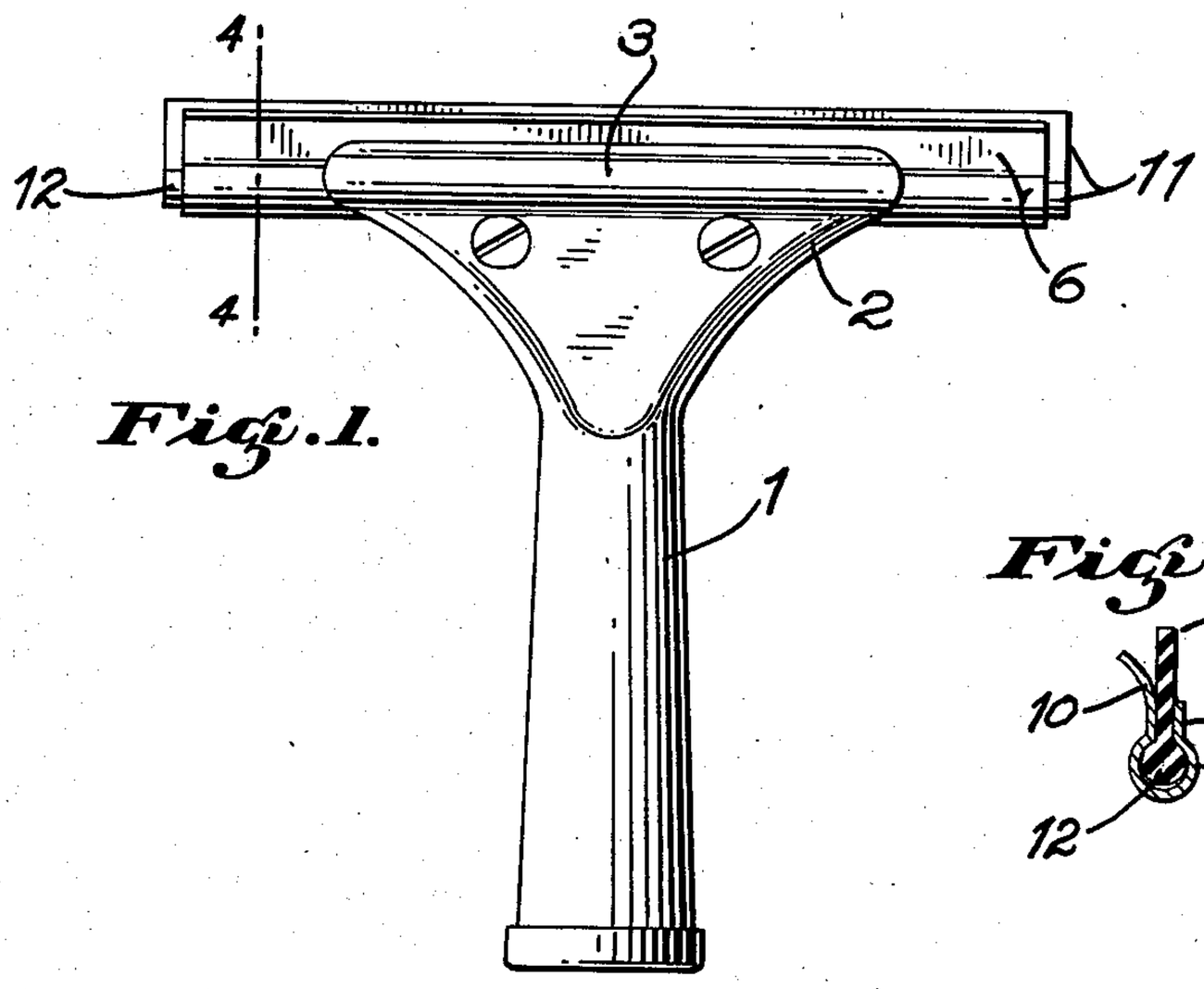


Fig. 1.

Fig. 4.

Fig. 2.

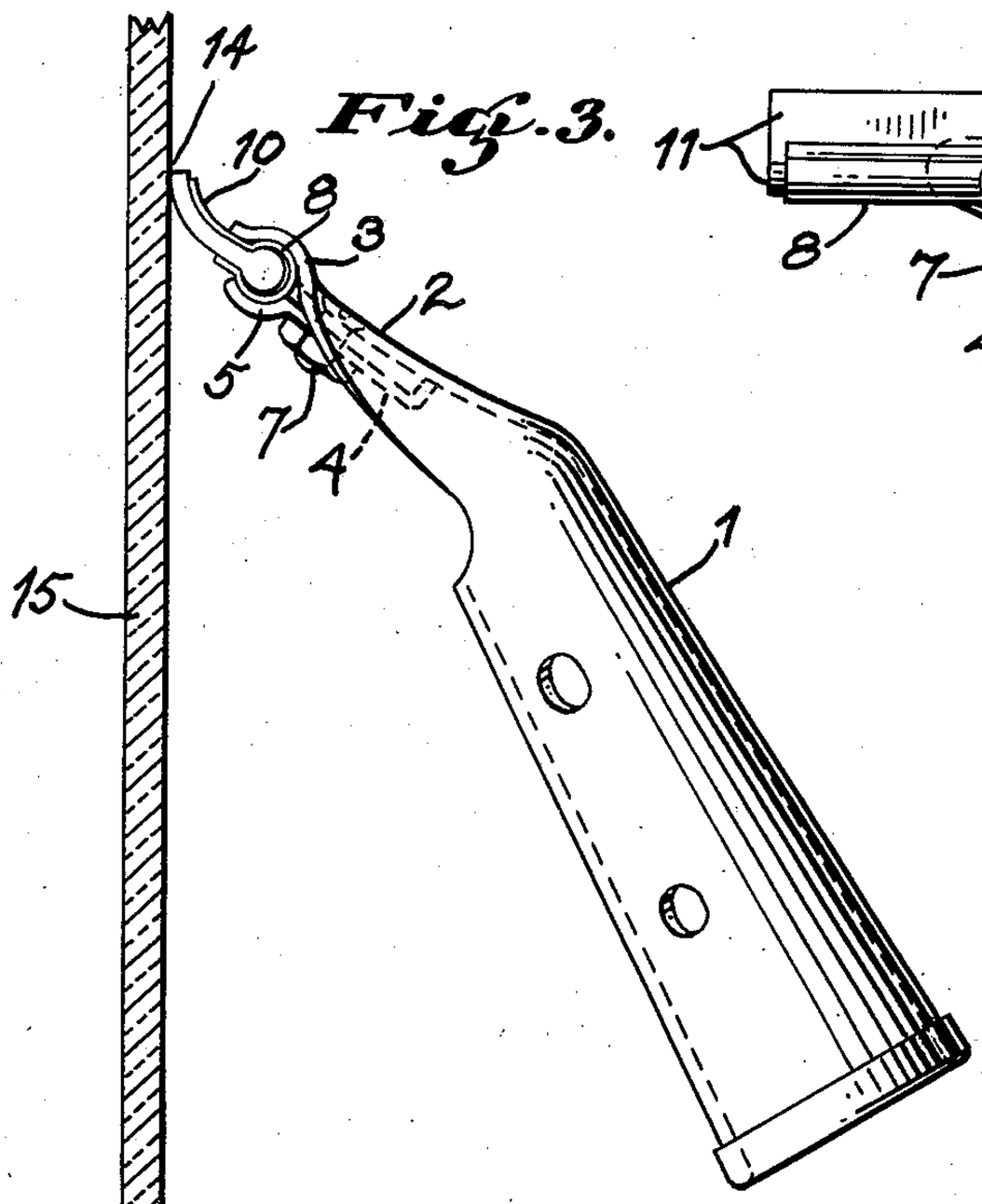
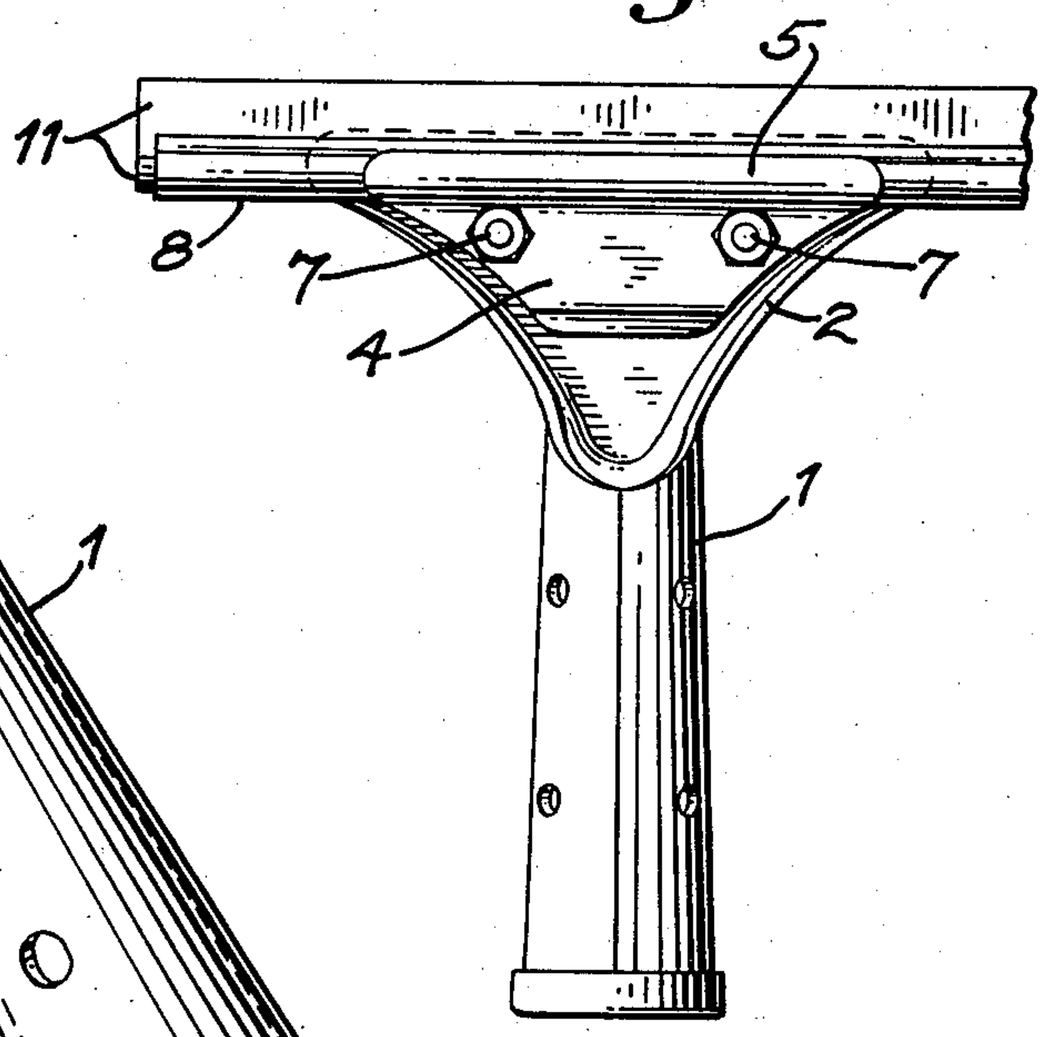


Fig. 3.



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SQUEEGEE

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2 Claims. (Cl. 15—245)

My invention relates to window washing implements, and more particularly to a squeegee of improved construction.

The use of the instrument known as the squeegee for window washing purposes, where the window is first treated with a liquid and the liquid then removed by means of the squeegee having a rubber edge, is an art which requires that the person desiring to enter commercial practice must spend a considerable time in learning. The main reason for this is that the prior art squeegees must be applied to the window pane at a definite angle and with a definite pressure in order that the water-removing rubber edge be completely effective to remove the liquid and dirt.

The main object of the present invention is to provide a squeegee that is operative to remove liquids and dirt efficiently, within a wide range of angles and a wide range of pressures.

It is also an object of my invention to provide a squeegee which is adjustable, and one in which the rubber contact member may be easily and quickly replaced.

Other objects of my invention will be apparent or will be specifically pointed out in the description forming a part of this specification, but I do not limit myself to the embodiment of the invention herein described, as various forms may be adopted within the scope of the claims.

Referring to the drawing:

Figure 1 is a top plan view of a preferred embodiment of my invention.

Figure 2 is a bottom plan view of the device shown in Figure 1.

Figure 3 is a side view of the same device as applied to a window pane, shown in section.

Fig. 4 is a sectional view of the device taken on the line 4—4.

My invention may be better understood by a direct reference to the drawing.

A handle member 1, of any convenient shape, is provided with a flared and flattened top 2, the end of which is provided with a cross channel 3. A clamp member 4 is provided to fit the under side of the flared top 2, and is provided with a second channel 5 opposite and cooperating with the first channel 3 to hold a squeegee backing member 6. Clamping is accomplished by means of two bolt and nut assemblies.

Squeegee backing member 6 is formed from sheet metal bent around a form, such as a rod, for example, to form a circular channel 8, the size of this channel being proportioned so that it may be rigidly clamped between top 2 and clamp member 4.

The sides of the circular channel 8 are spaced and extend outwardly, each having a different configuration. Lower face 9 extends straight out from the channel 8 and terminates after a short distance, the edge being parallel to the extent of the channel. Upper face 10 extends straight out for a distance equal to the extent of face 9 but does not there terminate, but curves outwardly in an arc and also terminates with a straight edge parallel to channel 8. Faces 9 and 10 are spaced to provide a wiper channel extending outwardly from channel 8.

A wiping member 11 is provided, of unitary structure, and preferably moulded from soft rubber. Squeegee member 11 is provided on one edge with a retaining bead 12 of such a size as to form a snug sliding fit in channel 8, the remainder of the wiper having parallel sides and terminating in a working edge 14. The parallel sided portion of the squeegee member is of sufficient width to project slightly beyond the terminus of curved face 10, and I prefer to proportion the curve of face 10 so that when pressure is applied to the working edge 14 of the squeegee, the natural curve of the wiper will be such that the rubber lays against the curved face 10. The rubber of the squeegee member cannot progress outwardly any further even though pressure be increased. This position is shown clearly in Figure 3.

It will thus be seen that irrespective of the pressure on the squeegee against the glass 15, the curvature of the rubber, with respect to the handle, will not change as it is held in position by face 10. Also, the working edge 14 is in contact with the glass over a wide range of angles between the plane of the squeegee and the plane of the glass. This ensures that over this wide range of angles and over a wide range of pressures, the working edge 14 will always be in a proper position on the glass for most effective removal of liquids and dirt.

Inasmuch as the clamp allows the squeegee member to be set asymmetrically with respect to the handle, many corners and obstructed window portions may be reached by the operator, which could not be cleaned with a symmetrical disposition of the squeegee blade.

I have thus provided a squeegee which can be used by an inexperienced person, but which in his hands will perform its work as well as, or better than, the prior art squeegees in the hands of a skilled person.

I claim:

1. A squeegee comprising a resilient wiper blade, a member adapted to hold said blade, said

member having a body portion which contains blade anchoring means and having a non-resilient portion extending from said body portion and terminating in a convex wiping edge supporting portion, the wiper blade being of elongated cross-section and attached at the anchoring portion and extending in the same general direction as the backing portion, and having a side wall facing said backing portion, the end portion of said wall being normally spaced from said supporting portion and so arranged that upon application of wiping force to the squeegee the outer portion of said wall will move into engagement with said convex portion and be limited in its movement thereby.

2. A squeegee of the type defined in claim 1, wherein that portion of the backing member which extends from the body portion comprises a smoothly curved, convex surface, adapted to engage the wiper blade along its entire side wall and to have the curve of its face corresponding to the curve of the wiper blade when the latter is under a sufficient wiping pressure to bring the end portion of the wall into engagement with the supporting portion.

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