Oct. 5, 1926. 1,601,933

F. E. WARNER

FLEXIBLE SHANK TACK BUTTON

Filed June 24, 1926

Fig. 1.

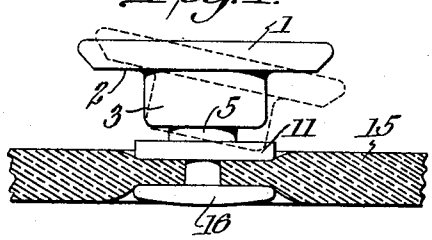


Fig. 2.



Fig. 3.



Fig. 4.



Fig. 5.

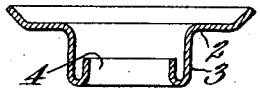


Fig. 6.

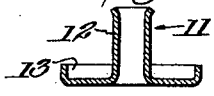
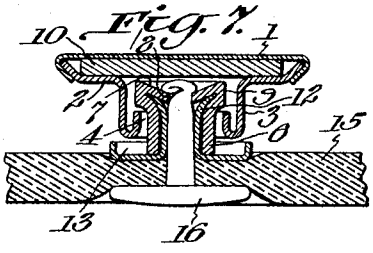


Fig. 7.



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UNITED STATES PATENT OFFICE.

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FLEXIBLE-SHANK TACK BUTTON.

Application filed June 24, 1926. Serial No. 118,331.

The object of this invention is to provide a metallic button, having its head swivelled to its shank in such way as to permit the flexing of the button in use, and insure a very firm union of the parts and at a reduced manufacturing cost.

The invention consists of a button having a back provided with a hub the outer end of which is inturned to form a seat for the tack-receiving part or anvil, which last is engaged by an internally applied eyelet-like base, as I will proceed now to explain and finally claim.

In the accompanying drawings illustrating the invention, in the several figures of which like parts are similarly designated, Figure 1 is an elevation of a flexible button set upon a piece of fabric. Fig. 2 is a vertical cross section of the front. Fig. 3 is a vertical cross section of the filler. Fig. 4 is a vertical cross section of the anvil. Fig. 5 is a vertical cross section of the back. Fig. 6 is a vertical cross section of the base. Fig. 7 is a vertical cross section of the assembled parts set by a tack upon a piece of fabric.

The front 1 is a flanged shell, adapted to be closed upon the back 2, as shown in Figs. 1 and 7. The hub 3 has its outer end inturned, as at 4, to form a seat for the anvil 5. The anvil may be of steel, and has a substantially cylindrical barrel 6 open at its outer end and a depressed top 7 provided with the central opening 8 and the laterally extended head 9, which last contacts with the seat 4 to prevent the escape of the anvil from the back. 10 is the filler, preferably a disk of steel, located between the front and back and over the anvil. 11 is the eyelet-like base, having the tubular barrel 12 rising from an upwardly flanged foot 13.

As will be seen, the head 9 of this anvil affords a flaring space 14 between the barrel 6 and top 7, and by virtue of the conical formation of the inner side of the top, the leading end of the barrel 12 of the base is spread outwardly into said flaring space and clinched therein and thus serves to connect the anvil and base in a firm and rigid union as shown in Fig. 7.

The anvil may be drawn to shape or otherwise formed.

The parts are assembled as shown in Fig. 7, the filler 10 being arranged between the front 1 and the back 2 and the front closed in over the back so as to confine the filler in place; but before the front and filler are applied the anvil is inserted in the back so that its barrel 6 projects outwardly through the hub of the back and its laterally extended head 9 rests upon the seat 4 loosely but so as to be retained within the back. Then the base 11 has its barrel 12 extended up within the barrel of the anvil and its leading end spread out into the space 14 of the anvil and clinched so as to become a fixed part of the button. By the clinching of the base and anvil the two are drawn into intimate fixed relation, as indicated in Fig. 7.

To attach the button to the fabric, as represented at 15, the button is arranged upon one side of the fabric, with its base resting upon the outer face of the fabric, and then a tack 16 is driven into the button from the opposite side of the fabric and its point extends through the opening 8 in the anvil and contacting with the filler 10 is upset and clinched within the depression in the top of the anvil and engages the top so as to securely fix the button to the fabric. Thus the united front and back with the interposed filler are swivelled to the anvil and are capable of a tilting motion thereon, as indicated by the dotted lines in Fig. 1; or, in other words, the button is of the flexible type, which is a desirable feature for some uses of this type of tack fastened buttons.

The hub, anvil and base constitute the shank of the button. The front, filler and back constitute the button head.

Among the advantages of this button, it is noted that its construction is characterized by simplicity, whereby low manufacturing cost is obtained with a maximum flexibility and strength.

It is to be noted, also, that the anvil is of steel or hard metal, while the base is of brass or soft metal, and that the base connection with the anvil is inside of the anvil, so that wear is minimized between these parts in the flexing action of the button, because the moving contact of the button head is with the anvil rather than with the base.

Variations in the details of construction are permissible within the principle of the invention and the claims following.

What I claim is:—

1. In a flexible shank tack button, a button head having an internal anvil movable within the button head and having a depressed top provided with a central opening and a laterally extended head, and a base extending within the anvil and clinched in said head, whereby the parts are flexibly connected.

2. In a flexible shank tack button, a button head having a back provided with a hub having an inturned outer end, an anvil arranged in said back and provided with a top having a laterally extended head, and a base projecting inside said anvil and clinched within its head, whereby the button head is flexibly mounted, with the rim of the anvil seating against the inturned end of the hub to prevent endwise escape.

3. In a flexible shank tack button, a button head having a back provided with a hub having an inturned outer end, an anvil arranged in said back and having a barrel open at its outer end and extending through said hub, said anvil provided with a depressed top having a laterally extended head adapted to contact with the inturned outer end of the hub, said head having an interior flaring space, and a base provided with a barrel extending into the anvil and clinched within said space and a foot from which the base barrel rises and next to which the barrel of the anvil rests.

4. A flexible shank tack button, comprising a button head composed of a front, a back having a hub provided with an inturned outer end, a filler interposed between the front and back, an anvil having a depressed top provided with a central opening and a laterally extending head, said head adapted to cooperate with the inturned end of the hub, and a base extended up within the anvil and clinched in its head, said head and base adapted to receive the shank of a tack, with the point of the tack projecting through the opening in the anvil and clinched against the filler and within the depressed top.

In testimony whereof I have hereunto set my hand this 22d day of June A. D. 1926.

FRANK E. WARNER.