April 30, 1957 R. D. CREEDON 2,790,222

RESILIENT SOCKET BUCKLE

Filed Dec. 14, 1954

FIG. 1.

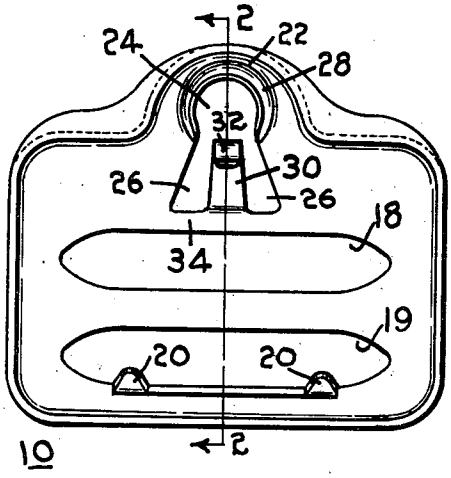


FIG. 2.

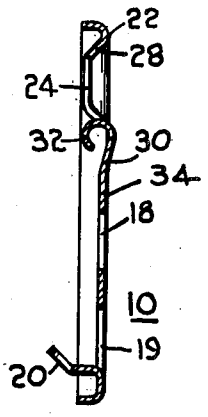


FIG. 3.

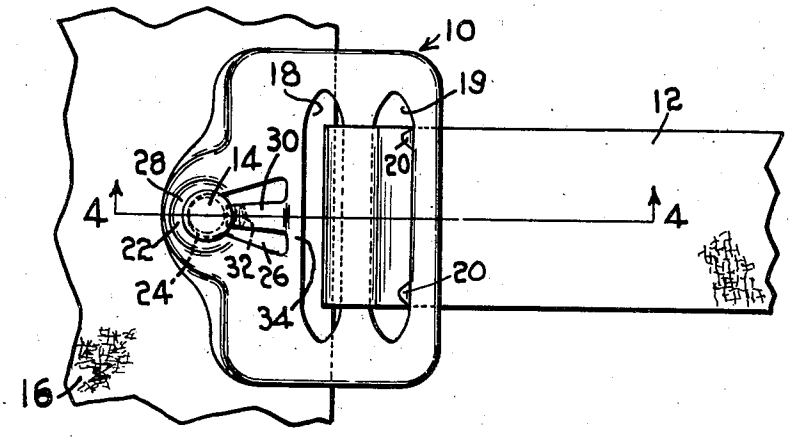
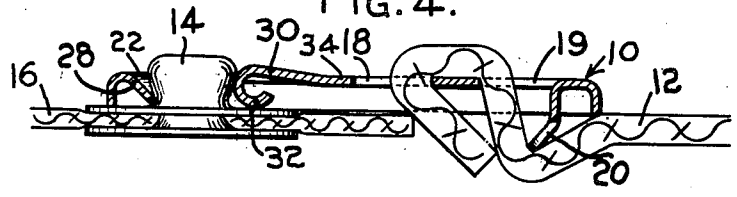


FIG. 4.



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RESILIENT SOCKET BUCKLE

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Application December 14, 1954, Serial No. 475,064

1 Claim. (Cl. 24—77)

This invention relates generally to buckles.

The object of the invention is to provide a buckle formed of a single piece of sheet metal which is adapted to receive a strap and snap into engagement with a shouldered stud.

A further object of the invention is to provide a buckle as described above in which resilient means for engaging the stud is not affected by tensile forces applied to the buckle.

Other objects of the invention will, in part, be obvious, and will, in part, appear hereinafter.

In the drawing:

Fig. 1 is a top plan view of a buckle embodying the features of the invention;

Fig. 2 is a view in section taken on line 2—2 of Fig. 1;

Fig. 3 is a top plan view of the buckle of Fig. 1 assembled with a strap and snapped into engagement with a stud; and

Fig. 4 is a view in section taken on line 4—4 of Fig. 3.

Referring to the drawing, there is illustrated a buckle **10** which is adapted to receive a strap **12** and to be snapped into engagement with a stud **14** mounted on a support **16**.

The buckle **10** is preferably formed of a single piece of sheet metal and is provided with slots **18** and **19** at one end, one of which may be provided with tangs **20** to assist in retaining the strap **12** assembled on the slots, and means at the other end for snapping engagement with the stud **14**.

The stud-engaging means comprise a portion **22** which projects outwardly from the adjacent portions of the buckle body, and an aperture formed in the body which has a semi-circular portion **24** disposed in the outwardly projecting portion **22** and an extended portion **26** extending back into the buckle body. The portion **22** is generally upwardly rounded in cross section to provide a downwardly inclined inner edge **28** of generally semi-circular configuration.

To provide means for snapping engagement with the stud, a spring finger so extends from the body into the extended portion **26** of the recess and terminates in a reverse curled end **32** disposed opposite the edge **28**. The finger **30** lies generally in the plane of the buckle body and is flexible in a direction perpendicular thereto to cooperate with the opposite edge **28** to releasably engage the stud **14**.

In the illustrated embodiment the slot **18** and the extended portion **26** of the aperture form a relatively narrow transverse member **34** from which the finger **30** extends. Flexing of the finger **30** causes torsional flexing of the member **34**, which thereby assists in imparting an adequate snap action to the buckle.

The strap **12** may be assembled with the buckle by threading it through the slots **18** in a suitable manner, and the buckle may then be snapped into engagement with the stud in the usual manner.

After such assembly tension applied to the strap is resisted solely by the engagement of the edge portion **28** with the stud without any possibility of damage to the spring finger **30**.

Since certain obvious modifications may be made in this device without departing from the scope of the invention, it is intended that all matter contained herein be interpreted in an illustrative and not in a limiting sense.

I claim:

A one-piece sheet metal buckle adapted to receive a strap and to snap into engagement with a shouldered stud, said buckle comprising a substantially flat body member having transversely extending strap receiving slot means adjacent one end thereof and stud engaging means spaced from said slot means adjacent the other end thereof, said stud engaging means having an aperture and resilient finger means integrally secured at one end in transverse relationship to a portion of said body member just spaced from and parallel to said slot means, said finger means extending forwardly therefrom and in substantially the same plane and in a direction away from the strap receiving slot means with the forward free end of said finger means extending into the aperture to engage the stud, stud portion of the body member to which the resilient finger means is attached being torsionally flexible in response to flexing of the finger means substantially perpendicular to the plane of the buckle body member.

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