July 9, 1935. A. RANAURO 2,007,728

SAFETY TOE CAP

Original Filed Nov. 22, 1932

Fig. 1.

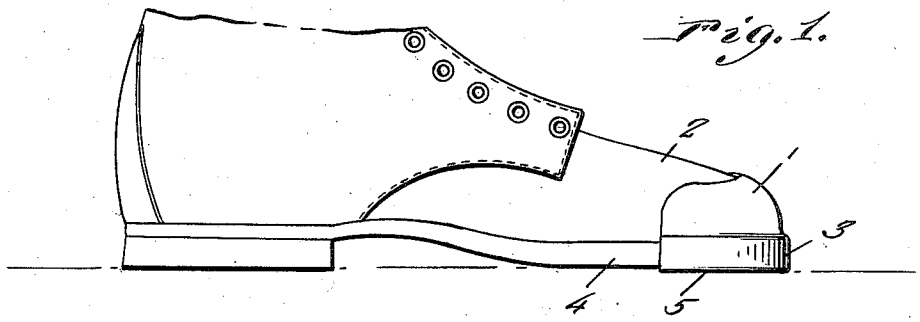


Fig. 2.

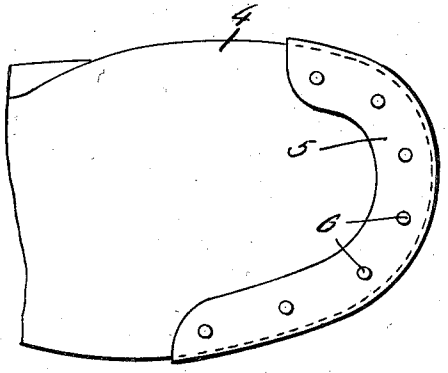
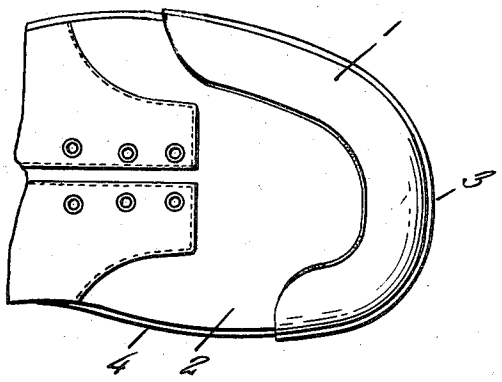


Fig. 3.



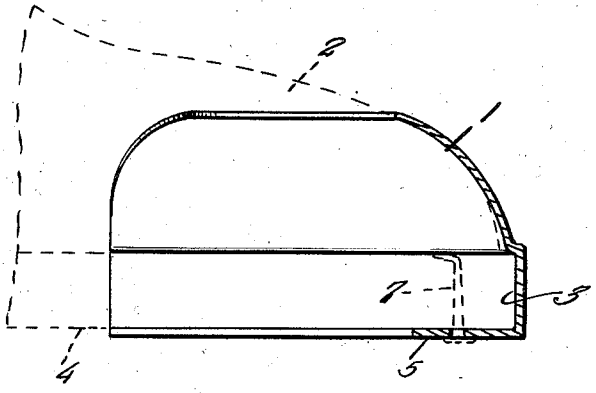


Fig. 4.

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SAFETY TOE CAP

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Application November 22, 1932, Serial No. 643,901
Renewed January 18, 1935

1 Claim. (Cl. 36—72)

The present invention relates to new and useful improvements in protectors particularly for miners' shoes and boots and has for its primary object to provide, in a manner as hereinafter set forth, a device of this character which is adapted to be expeditiously mounted on the forward portion of a shoe or boot in a manner to thoroughly protect the toe portion and the forward end portion of the sole, thus materially prolonging the life of the shoe or boot.

Other objects of the invention are to provide a protector of the aforementioned character which will be simple in construction, strong, durable, highly efficient and reliable in use, compact, light in weight, attractive in appearance and which may be manufactured at low cost.

All of the foregoing and still further objects and advantages of the invention will become apparent from a study of the following specification, taken in connection with the accompanying drawing wherein like characters of reference designate corresponding parts throughout the several views, and wherein:—

Figure 1 is a view in side elevation of a portion of a shoe, showing a protector in accordance with the present invention mounted thereon.

Figure 2 is a view in bottom plan thereof.

Figure 3 is a top plan view.

Figure 4 is a view in vertical longitudinal section through the protector.

Referring now to the drawing in detail, it will be seen that the embodiment of the protector constituting the present invention which has been illustrated is stamped or formed from a single piece of suitable resilient metal and comprises an arcuate upper portion 1 which is formed to conform to the toe portion 2 of the shoe upper. The lower portion of the protector is formed to provide a channel 3 which accommodates the forward end portion of the sole 4 of the shoe.

At its bottom, the protector terminates in an inturned flange 5 extending beneath the sole of the shoe. The flange 5 is provided with spaced openings 6 for the passage of securing elements 7 through the medium of which the protector is firmly secured in position on the shoe.

The outer side of the protector is of greater length than the inner side thereof for providing maximum protection, as illustrated to advantage in Figures 2 and 3 of the drawing. The formation of the protector is such that the same will fit snugly on a shoe, said protector possessing sufficient resiliency to compensate for slight variations in the shoes of substantially the same size and assuring a proper fit. Of course, various sizes of protectors will be provided for different sizes of shoes.

It is believed that the many advantages of a shoe protector constructed in accordance with the present invention will be readily understood, and although the preferred embodiment of the invention is as illustrated and described, it is to be understood that changes in the details of construction and in the combination and arrangement of parts may be resorted to which will fall within the scope of the invention as claimed.

What is claimed is:—

A shoe and toe protector formed from a single piece of metal and including a substantially U-shaped bottom flange having perforations therein for receiving fastening means for attaching the flange to the lower face of the shoe sole, said flange having its inner limb of less length than its outer limb, an upstanding vertically arranged part connected with the outer edge of the flange for engaging portions of the edge of the sole, said vertical part having its ends flush with the ends of the flange, the upper edge of said vertical part extending slightly inwardly to engage part of the upper edge portion of the upper face of the sole, and a covering part curving upwardly and inwardly from said inwardly extending part, the upper edge of said covering part being of substantially U-shape with its inner limb shorter than the outer limb and the lower portion of the ends of said covering part being substantially straight and flush with the ends of the flange and vertical part, with the upper corners curving from said straight ends and merging into the ends of the upper edge of the covering part, said upper edge being plain and free of projections, whereby the protector will protect the toe part of a shoe and also protect the toes of the wearer and the plain U-shaped upper edge of the covering part will permit the wearer to bend his foot at the toes.

ARMANDO RANAURO.