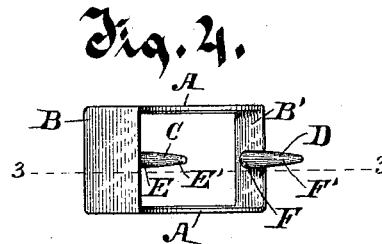
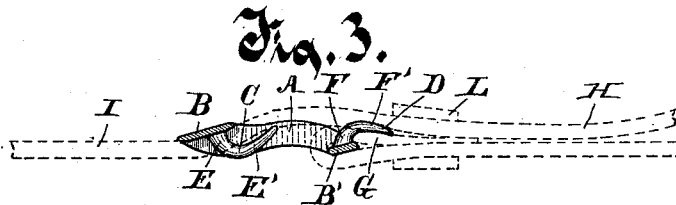
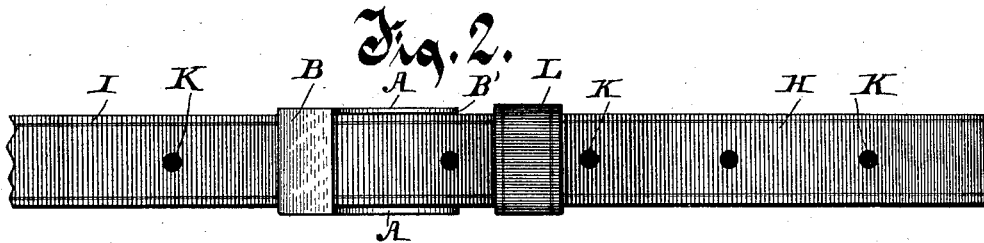
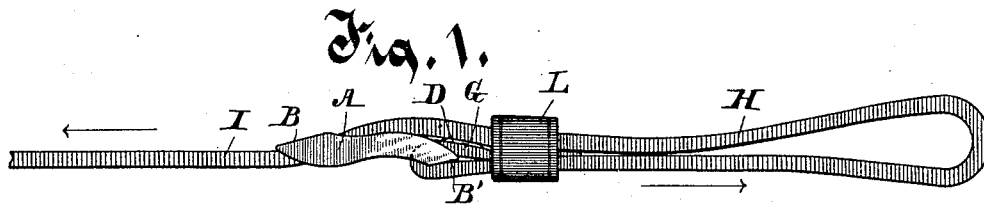


(No Model.)

F. B. ECHLIN.  
BUCKLE.

No. 422,510.

Patented Mar. 4, 1890.



Witnesses.  
O. H. Keeney,  
Anna Faust.

Inventor.  
Frank B. Echlin  
By Ewald Benedict  
Attorneys.

# UNITED STATES PATENT OFFICE.

FRANK B. ECHLIN, OF JANESVILLE, WISCONSIN.

## BUCKLE.

SPECIFICATION forming part of Letters Patent No. 422,510, dated March 4, 1890.

Application filed November 8, 1889. Serial No. 329,671. (No model.)

*To all whom it may concern:*

Be it known that I, FRANK B. ECHLIN, of Janesville, in the county of Rock and State of Wisconsin, have invented new and useful Improvements in Buckles; and I do hereby declare the following to be a full, clear, and exact description of said invention, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification.

My invention relates to a buckle especially adapted for use with a return-strap, like the back-strap or hip-strap in a harness.

Figure 1 is a side view of my buckle in connection with a return-strap, showing how it is used. Fig. 2 is a top view of the same buckle and strap shown in Fig. 1. Fig. 3 is a longitudinal section of the buckle on line 3 3 of Fig. 4, with which a part of the strap is shown in dotted lines. Fig. 4 is a top view of the buckle.

All the parts of the buckle are rigid together, and it may be cast in one piece integrally.

The buckle consists of the side bars A A, the end bars B B', and the tongues C and D. The tongue C projects rigidly downwardly or directly away from the under surface of the cross-bar B centrally a distance about equal to the thickness of the leather with which it is intended to be used, and is then turned rearwardly by a short curve about at right angles to the part nearest to the cross-bar, forming a short post E and guard E'. The tongue D projects upwardly rigidly from the cross-bar B' centrally a distance about equal to the thickness of the leather intended to be used with the buckle, and then curves rearwardly, forming a short post F and guard F'. The cross-bars B and B' are at a distance from each other, and the inner surfaces of the two bars are preferably in planes about twice as far from each other as the thickness of the leather with which the buckle is adapted to be used.

In use the buckle A is put onto the strap in the following manner: Assuming that the strap H is secured fixedly at the end I to

some part of the harness, the end G is passed through the buckle under the bar B, and the tongue C is thrust through an aperture K, so that the strap will be about the post E. The end G of the strap is then carried over the cross-bar B', and is brought around beneath that cross-bar and doubled over it, pushing the loop down on the tongue D, which passes through an aperture K therefor, so that it will be in the form shown in Figs. 1 and 3. When the buckle is thus attached to the strap, the guards E' and F' of the tongues C and D serve to hold the strap to the buckle, while the posts E and F hold the strap in position against strain thereon. A sliding loop L about the strap at the rear of the buckle slides down around the strap near to the buckle and holds the end G of the strap securely in place between the two lines of the strap.

This buckle is peculiarly well adapted for use on the hip-strap of a harness, as there is no projecting end of the tongue to catch the hairs of the tail of the horse when it is swung about. The inner surfaces of the end bars are not shown as being exactly in parallel planes, and in fact end bars that are oval or round in cross-section could be used; but a similar relative arrangement of the bars should be observed to secure the best construction for the buckle.

What I claim as new, and desire to secure by Letters Patent, is—

As an article of manufacture, a rigid integral metal buckle consisting of two side bars, two cross-bars, and two tongues, which tongues project one from the top of one of the cross-bars and the other from the bottom of the other cross-bar, the points of both tongues curving rearwardly in the same direction, substantially as described.

In testimony whereof I affix my signature in presence of two witnesses.

FRANK B. ECHLIN.

Witnesses:

J. W. BATES,  
T. S. NOLAN.