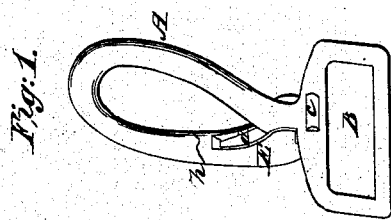
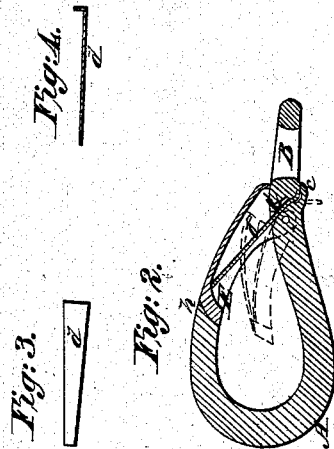


E. A. Cooper,

Snap Hook.

N^o 48482.

Patented June 27, 1865.



Witnesses:

James A. Allen
C. Rogers

Inventor:

E. A. Cooper.

UNITED STATES PATENT OFFICE.

EDWARD A. COOPER, OF BUFFALO, NEW YORK, ASSIGNOR TO HIMSELF
AND J. M. JOHNSTON, OF SAME PLACE.

IMPROVED SNAP-HOOK.

Specification forming part of Letters Patent No. 48,482, dated June 27, 1865.

To all whom it may concern:

Be it known that I, EDWARD A. COOPER, of the city of Buffalo, county of Erie, and State of New York, have invented new and useful Improvements in Harness-Snaps; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, in which—

Figure 1 is a perspective view of my improved snap. Fig. 2 is a longitudinal section of the same. Fig. 3 is the spring. Fig. 4 is the spring with a lip.

The nature and object of my invention is to provide a snap for harness which is safe and simple in its construction and cheap in its manufacture.

My invention relates more particularly to the peculiar and novel manner by which I secure the spring which holds the thumb-lever in its place.

To enable others skilled in the art to make and use my invention, I will proceed to describe its construction and operation.

A, Fig. 1, represents, in perspective, my improved harness-snap.

B represents the loop by which the snap is attached to the harness.

C is the slot or mortise, which is made tapering, and through which the spring *d* is introduced and firmly held in its position by means of a lug, *c'*, (shown in red lines, Fig. 2,) which, after the spring is introduced and brought to its proper place, said lug is bent down over the end of the spring.

E is a thumb-lever, made with a groove of sufficient capacity to receive the spring *d*.

h is the joint where the end of the thumb-lever meets the end of the main part of the snap-hook.

In constructing my improved snap-hook I usually make the mortise tapering, so that the spring *d* will fit closely and not draw through, and when the lug *c* is turned or bent down the spring is held firmly in its place.

In constructing my snap-hook I do not confine myself to the particular form as above described for the spring, as shown in Fig. 3, as it may be made with a lip turned upon the under side of the spring, as seen in Fig. 4, to fit a corresponding socket or mortise in the body of the loop, and the lug used in the same manner as with the spring in form of Fig. 3. When the snap is complete in all its parts the thumb-lever may be bent down, as seen in red lines in Fig. 2, and when released will, by the force of the spring, resume its former position.

I do not claim, broadly, the use of a spring in harness-snaps, as I am aware they have been heretofore used.

Having thus described my invention, what I do claim as new, and desire to secure by Letters Patent, is—

The tapering spring *d*, fitting and working in a corresponding groove in the thumb-piece E, and passing through and secured by the mortise C and lug *c'*, substantially as described.

E. A. COOPER.

Witnesses:

C. ROGERS,
JAMES A. ALLEN.