## L. C. VOORHEES.

BUCKLE.

No. 386,944.

Patented July 31, 1888.

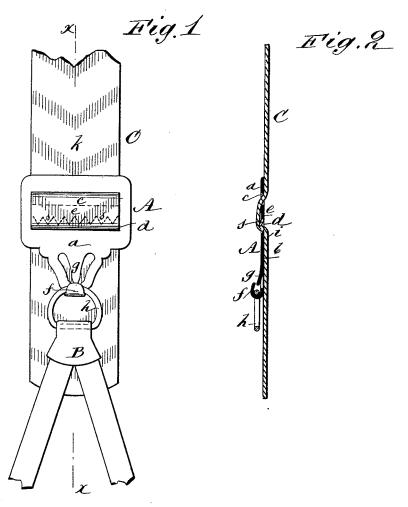
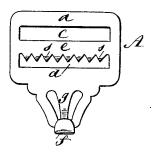


Fig. 3



WITNESSES:

C. Seveux

6. britaurok.

INVENTOR: L.C. Voorhees.

BY Munn to

ATTORNEYS.

## UNITED STATES PATENT OFFICE.

LUTHER C. VOORHEES, OF NEW YORK, N. Y.

## BUCKLE.

SPECIFICATION forming part of Letters Patent No. 386,944, dated July 31, 1888.

Application filed December 12, 1887. Serial No. 257,627. (No model.)

To all whom it may concern:

Be it known that I, LUTHER C. VOORHEES, of the city, county, and State of New York, have invented a new and useful Improvement in Suspender and other Buckles, of which the following is a full, clear, and exact description.

This invention is mainly designed for use on suspenders, and relates to that class of buckles or toothed slides which are sometimes made of a single piece of sheet metal and have two parallel slots in them, one above the other, and a row of teeth along the marginal portions of one of the slots for the passage of the web or strap to which the buckle is designed to be applied in a waved manner or reverse directions through said slots and engagement of the same with the teeth along the margin of the one of the slots.

20 My invention consists in a plate or sheetmetal buckle of this description, constructed for operation, as hereinafter set forth, and having a lower hook and closing spring or tongue integral with the frame or body of the 25 buckle, substantially as hereinafter described, and pointed out in the claim

and pointed out in the claim.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which similar letters of reference indicate 30 corresponding parts in all the figures.

Figure 1 represents a front view of a suspender-strap, in part, with a buckle embodying my invention applied, and showing in part the ring-engaging ends of the suspenders attached. Fig. 2 is a longitudinal section of the same in a plane at right angles to Fig. 1 upon the line x x therein, and Fig. 3 a front view of the buckle detached.

A is the buckle, which is made of a piece of sheet metal cut and stamped to form, a being the front surface or face of the buckle and b its rear or inner surface. It is made with an upper cross or longitudinal slot, c, and lower parallel cross or longitudinal slot, d, separated from each other by a parallel bar or piece, e, connecting the sides of the body of the buckle and integral therewith. The lower edge or margin of this cross-bar is serrated or formed with teeth s, slightly inclining in a forward direction to engage with the web or strap of the suspenders; but its upper margin is tooth-

Below the lower slot, d, the metal body of the buckle is extended and bent to form a front

less or of disengaging construction.

hook, f, and closing spring or tongue g to the 55 hook, both integral with the slotted and toothed portion of the buckle and serving to provide for the engagement and retention of the ring or stirrup h of the suspender-ends B of the buckle.

C is the main web portion of the suspenders, to which the buckle is applied by first entering the lower end of said web from the back of the buckle through the upper slot, c, and then projecting, in a backward or reverse and 65 inner direction, said end of the web through the lower slot, d, and drawing it downward on the inside of the buckle a suitable distance, according to the position the buckle is designed to occupy in the length of the web, 70 which position may be varied at pleasure by suitably manipulating the web through the buckle.

The buckle having been adjusted, it is only necessary to apply tension to the web to cause 75 the serrated portion or teeth s of the buckle to engage with the web C on its inner or rearsurface, i, thus throughout the varied adjustments of the buckle preserving the front surface or face, k, of the web C, which may be of 80 a fine or silk finish, from being marred or punctured by the teeth s, yet giving a perfectly secure hold of the buckle on said web without having resort to any separately operating or attached appendage.

In some cases—as, for instance, where the hook at the bottom of the buckle has to sustain a very heavy pull upon it—said hook may be made of stout wire and be soldered or otherwise secured to the body or frame of the 90 buckle.

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

A sheet-metal suspender or other like 95 buckle, A, having upper and lower slots, c d, a bar or portion, e, separating said slots, integral with the frame or body of the buckle and of plain or disengaging construction on its upper margin, but serrated on its lower margin, 100 forming teeth s, and a lower hook, f, and closing spring or tongue g, both also integral with the frame or body of the buckle, substantially as specified.

LUTHER C. VOORHEES.

Witnesses:

A. GREGORY, C. SEDGWICK.