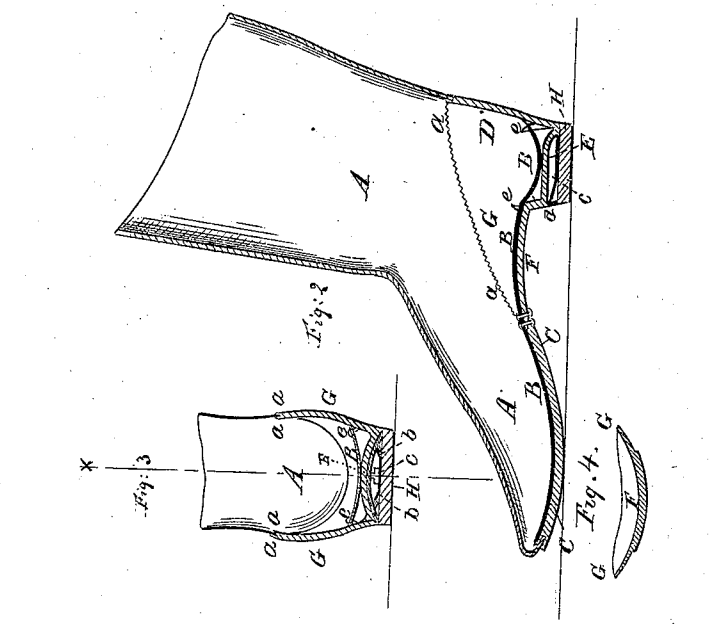
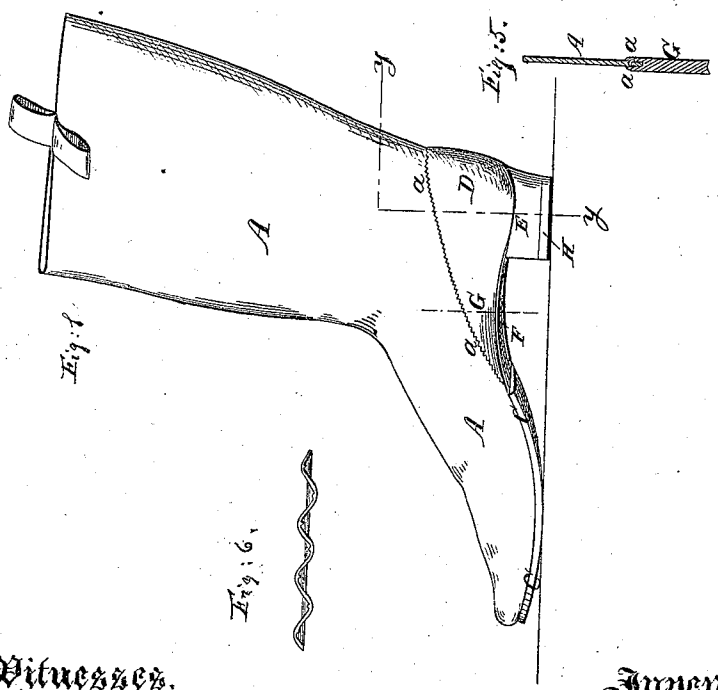
G. W. Talhurst,

Boot Heel.

No. 62,907. Patented Mar. 12, 1867.





Witnesses.
W. A. Jackson
J. Alderson

Inventor
G. W. Talhurst
Per Munn & Co
attorneys

N. PETERS, PHOTO-LITHOGRAPHER, WASHINGTON, D. C.

United States Patent Office.

GEORGE W. TOLHURST, OF NEW YORK, N. Y.

Letters Patent No. 62,907, *dated March* 12, 1867.

IMPROVEMENT IN BOOTS AND SHOES.

The Schedule referred to in these Letters Patent and making part of the same.

TO ALL WHOM IT MAY CONCERN:

Be it known that I, GEORGE W. TOLHURST, of the city, county, and State of New York, have invented a new and useful improvement in Boots and Shoes; and I do hereby declare that the following is a full, clear, and exact description thereof, which will enable others skilled in the art to make and use the same, reference being had to the accompanying drawings, forming part of this specification.

This invention relates to an improved manner of strengthening the most exposed portions of boots and shoes and of simplifying the construction of the same.

The invention consists in the arrangement of a combined heel, shank, and counter, which are moulded in one piece of malleable iron or other suitable metal, and in the manner of securing the upper of the boot or shoe, and also the insole, to the said metallic portion of the said boot or shoe. This fastening is so arranged that the insole as well as the upper of the boot or shoe are secured to the metallic rear part without the use of sewing or of rivets or screws, thereby making the said boot or shoe almost completely water-proof, besides adding to its strength and preventing its getting out of shape. Furthermore, the invention consists in arranging the wearing or lower portion of the heel so that it can be removed and renewed, the said wearing portion being made of leather for the purpose of retaining the elasticity of the common boot or shoe with my improved metallic strengthening portions.

The invention further consists in prolonging the metallic counter along the sides of the boot or shoe to any required distance, for the purpose not only of making the said boot or shoe stronger and more water-proof, but also to facilitate the construction of the same, as it is well known that the shaping of that portion of the leather, which, in front of the heel, is attached to the shank, is the most difficult to make.

I am well aware that boot and shoe heels have been made of cast iron, also that the counter has been strengthened by a metallic outside protection, and that metallic strips have been arranged on the sides of boots or shoes, and that removable lower portions of heels have been arranged on such cast-iron as well as other heels, but never yet has a metallic counter been so made that the leather counter thereby becomes superfluous, and may be substituted by a simple cotton or fur inside lining; neither has ever such a metallic counter been secured to the upper without the use of screws, rivets, or sewing; nor has a counter ever been made in one piece with a metallic heel, shank, and side piece.

In the annexed drawing my invention is completely illustrated—

Figure 1 representing a side elevation of my improved boot.

Figure 2, a vertical longitudinal central section of the same, which is taken on the line *x x*, fig. 3.

Figure 3 is a vertical cross-section of the heel and sides of the counter taken on the line *y y*, fig. 1.

Figure 4 is a vertical cross-section through the shank and side strip.

Figure 5 is a detail sectional view of an exaggerated scale showing the manner of securing the counter and side strips to the upper of the boot.

Figure 6 is a detail view to be hereinafter referred to.

Similar letters of reference indicate like parts.

A represents the upper of a common boot and shoe. B is the insole of the same. C is the main sole. The metallic rear portion is made in one piece of malleable iron or of any other suitable metal. It consists of the counter D, heel E, shank F, and side strips G G. The latter can be extended, as far as required, and may, if desired, surround the complete lower portion of the boot. The counter D and side strips G are at their top edge provided with two serrated flanges, *a a*, between which a groove is formed, as seen more completely in fig. 5. The leather is inserted into this groove, the teeth of the flanges *a a* are then by any suitable instrument bent toward the groove so that they are pressed into the leather, as seen in fig. 5. The teeth on these edges may be so arranged that opposite to each tooth on the other flange a depression or joining of two teeth is provided, so that when bent over two teeth may not meet; but this is not even necessary, as the teeth can, as shown in fig. 5, be made so short that they cannot meet. Plain instead of serrated flanges will answer the same purpose, as they can be pressed enough together so that they clamp the leather sufficiently tight between them. Or one flange may be made plain and the other serrated, as desired. The upper edge of the counter and side strips may be simply serrated, not forming any flanges or groove. The teeth are then bent alternately, one in and