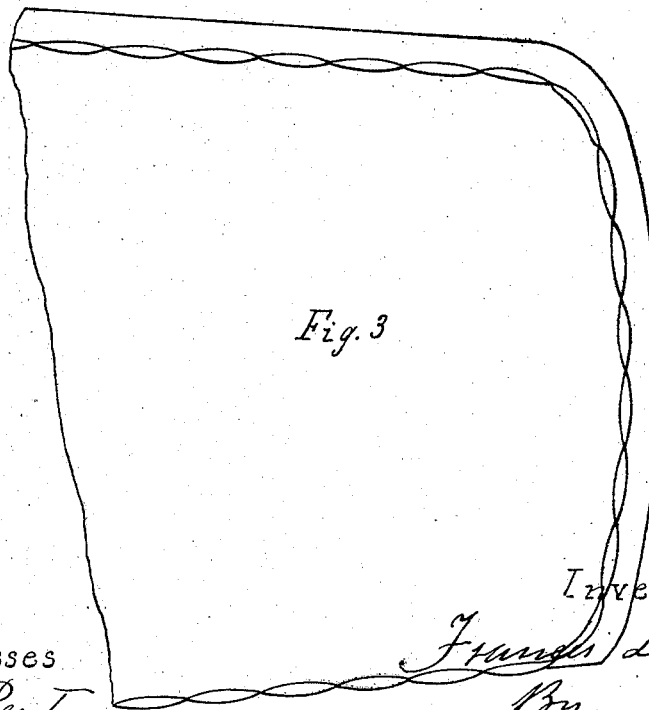
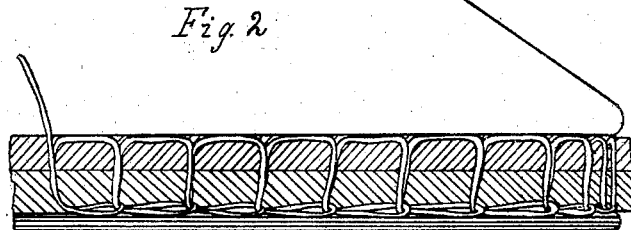
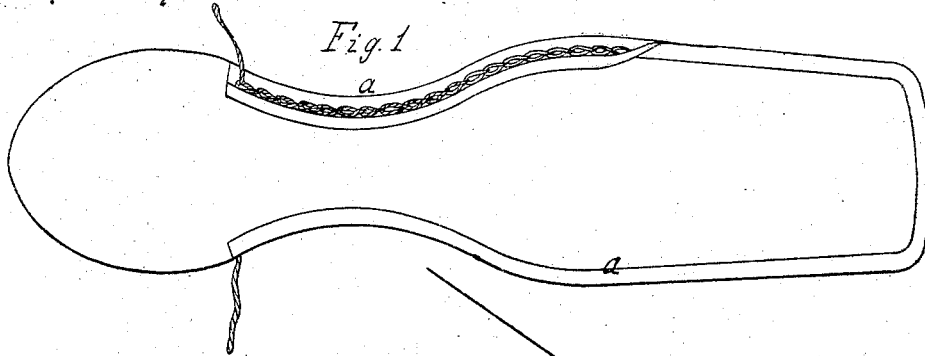


*F. D. Ballou.*

*Boots & Shoes.*

*N<sup>o</sup> 48614.*

*Patented Jul. 4. 1865*



Witnesses  
*Jno. B. Peyton*  
*W. N. Walton*

Inventor  
*Francis D. Ballou*  
By *Baldwin Stearns*  
*atty*

# UNITED STATES PATENT OFFICE.

FRANCIS D. BALLOU, OF ABINGTON, ASSIGNOR TO ALFRED B. ELY, OF  
BOSTON, MASSACHUSETTS.

## IMPROVEMENT IN BOOTS AND SHOES.

Specification forming part of Letters Patent No. **48,614**, dated July 4, 1865.

*To all whom it may concern:*

Be it known that I, FRANCIS D. BALLOU, of Abington, in the county of Plymouth and State of Massachusetts, have invented a new and useful Article of Boot and Shoe Manufacture; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the accompanying drawings, forming a part of this specification, in which—

Figure 1 is a view of the sole of a channeled shoe with a portion of the stitches exposed. Fig. 2 is an enlarged vertical section through the sole at the line of stitching, and Fig. 3 is a view of an enlarged toe of the shoe to which my invention is applied.

It is the object of my invention to manufacture boots and shoes by sewing the soles through and through by machinery, which shall place all the stitching on the outside of the uppers.

Letters Patent have been granted to me for improvements in machinery for making boots and shoes, and I do not therefore propose to claim any machinery in this application, for my present invention consists in a new article of manufacture constituting a boot or shoe in which the sole is sewed onto a welt or tap (attached to the upper) by mechanism which places all the stitching outside of the upper.

When the boot or shoe is so far completed as to have its welt or top, or the equivalent of either, properly secured to the upper and lasted, the outer sole is cut and placed upon it. Then the boot or shoe is brought to the sewing-machine, and is so placed as to receive the con-

catenation of stitches all around the sole on the outside of the upper, but so close to the upper as to present a neat finish. When necessary, the outer sole may be channeled, as shown in Fig. 1 at A; but it is obvious that the channeling may be dispensed with.

I propose to use wax-thread and the single chain-stitch shown in Figs. 1 and 2, but do not limit myself to either.

It is obvious that with machinery having a suitable feeding mechanism I can place the stitches with perfect regularity in the seam, as in Fig. 3, and that by proper guards between the sole and upper the piercing-instrument that precedes the thread may be prevented from doing the least injury to the upper by puncturing or even marking it; and it is obvious that I can place the stitch so that its face shall appear on either side of the sole by simply reversing the shoe.

By my invention it is further obvious that boots or shoes of the most expensive styles of hand-work may be made with marked economy and in a perfect manner—for example, such as are called by the trade "Scotch bottoms."

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

The new article of manufacture, constituting a boot or shoe made substantially in the manner described.

FRANCIS D. BALLOU.

Witnesses:

A. G. TREADWELL,  
WM. N. SNOW.