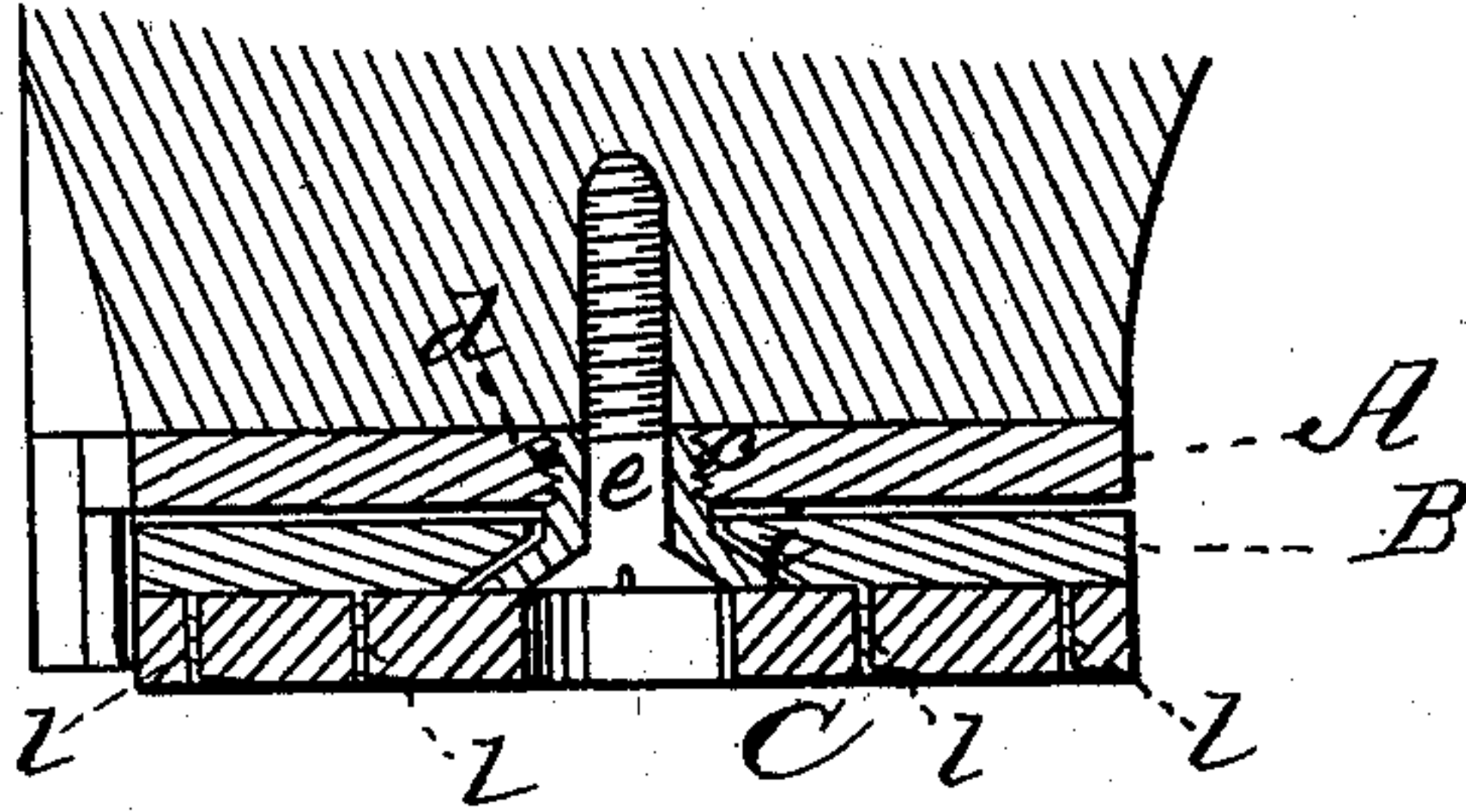


P. MILLER.  
Heels for Boots and Shoes.

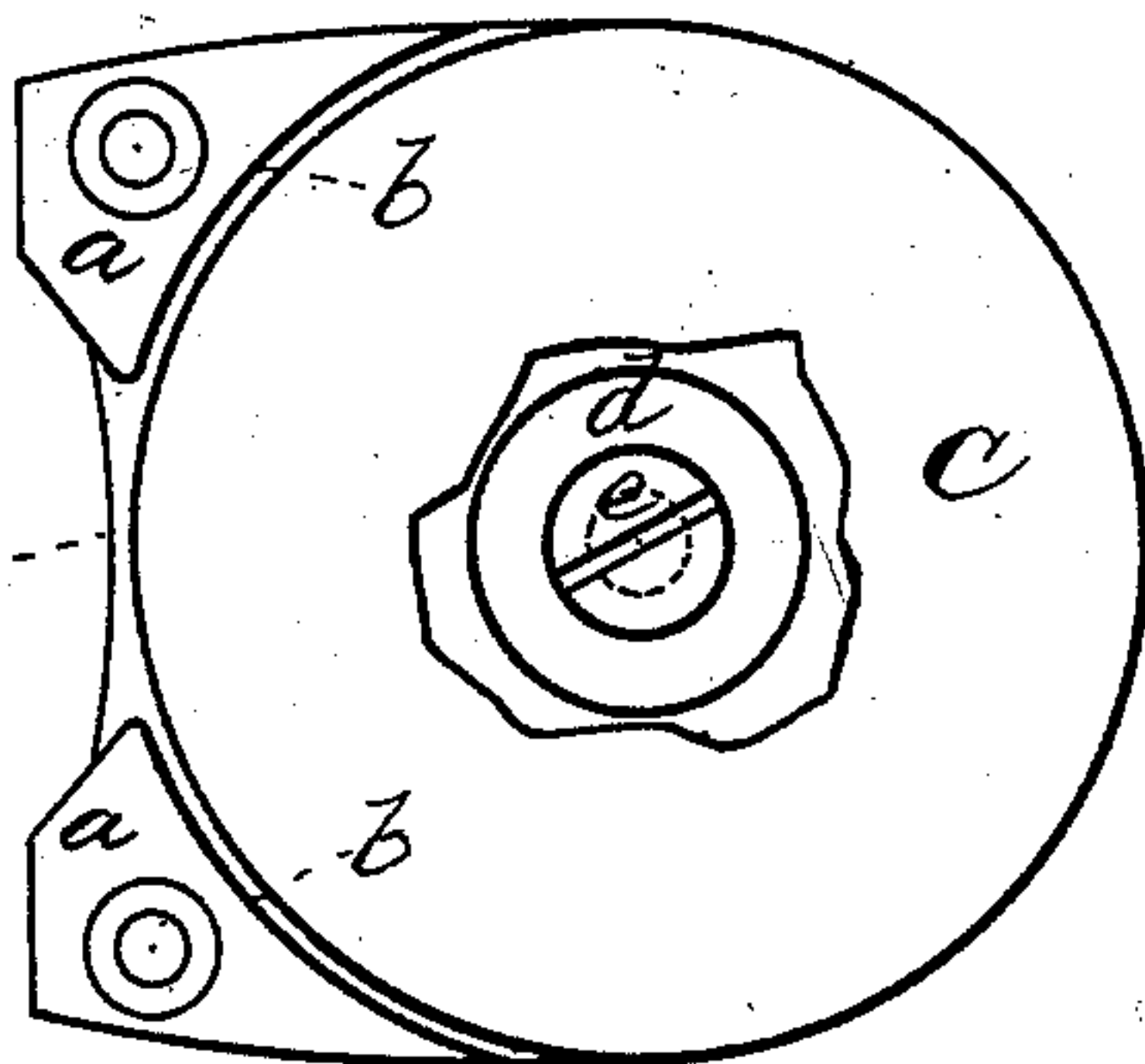
No. 209,500.

Patented Oct. 29, 1878.

*Fig. 1.*



*Fig. 2.*



WITNESSES

*Villette Anderson*  
*A. J. Massi.*

INVENTOR

*Peter Miller,*  
*by E. W. Anderson.*

ATTORNEY

# UNITED STATES PATENT OFFICE.

PETER MILLER, OF NEW YORK, N. Y., ASSIGNOR OF ONE-HALF HIS RIGHT  
TO ALFRED J. CAMMEYER, OF SAME PLACE.

## IMPROVEMENT IN HEELS FOR BOOTS AND SHOES.

Specification forming part of Letters Patent No. 209,500, dated October 29, 1878; application filed  
August 24, 1878.

*To all whom it may concern:*

Be it known that I, PETER MILLER, of New York, in the county of New York and State of New York, have invented a new and valuable Improvement in Revolving Heel-Plates; 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 annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a vertical central section of my improved heel-plate applied, and Fig. 2 is a bottom view of the same.

This invention has relation to improvements in revolving heel-plates for boots and shoes; and it consists in combining with a metallic base-plate having means of attachment to the heel a secondary disk revolving thereon, and having secured upon its face a leather pad, which disk is rotated by the movement of walking, causing new surfaces of the pad to be moved to the side of the heel, and thus preventing the heel from running down, as will be hereinafter more fully set forth.

In the annexed drawings, the letter A designates a metallic plate corresponding to the size of the heel and of the general shape of the outer lift. Upon this plate, near its straight edge, are formed raised offsets *a*, having each a countersunk aperture for the passage of screws, and having their inner walls made in the arc of a circle, as shown at *b*, Fig. 2. In the center of plate A is formed a screw-threaded aperture, *c*.

B represents the revolving metallic disk, having a central aperture that is laid upon plate A, and secured thereto so as to revolve freely by means of a metallic tubular screw,

*d*, the head of which is larger than the central aperture *i* of the disk. This screw is passed through the aperture *i* and screwed into the threaded aperture of the base-plate A. By this means the revolving disk is firmly attached to plate A, but is allowed to turn freely upon the screw *d*. As shown in Fig. 1, the upper end of the bore of this screw is countersunk for the purpose of receiving the head of a screw, *e*, which secures the middle portion of the plate to the heel.

The outer face of the disk B has a number of projecting prongs, *l*, which extend through an external leather pad, C, of the same size as the disk. This pad is forced onto the disk and the prongs are driven through it and clinched upon its outside. During the act of walking the disk B rotates upon the spindle-screw *d* automatically, carrying the pad C with it and presenting a new portion of its margin at the side of the heel, thus causing it to wear away evenly, and effectually preventing running down.

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

The heel-plate consisting of the base-plate A, having offsets *a* flush with the plane of the heel, and a central opening, *i*, provided with female thread, the revolving disk formed of the leather pad secured to a circular metal plate, the hollow screw *d*, and the screw *e*, passing through the said hollow screw, substantially as specified.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

PETER MILLER.

Witnesses:

GEO. C. POULTON,  
WALLIS CILLASI.