

No. 612,480.

G. H. CLARK.
LAST.

Patented Oct. 18, 1898.

(Application filed Apr. 2, 1897.)

(No Model.)

FIG. 1

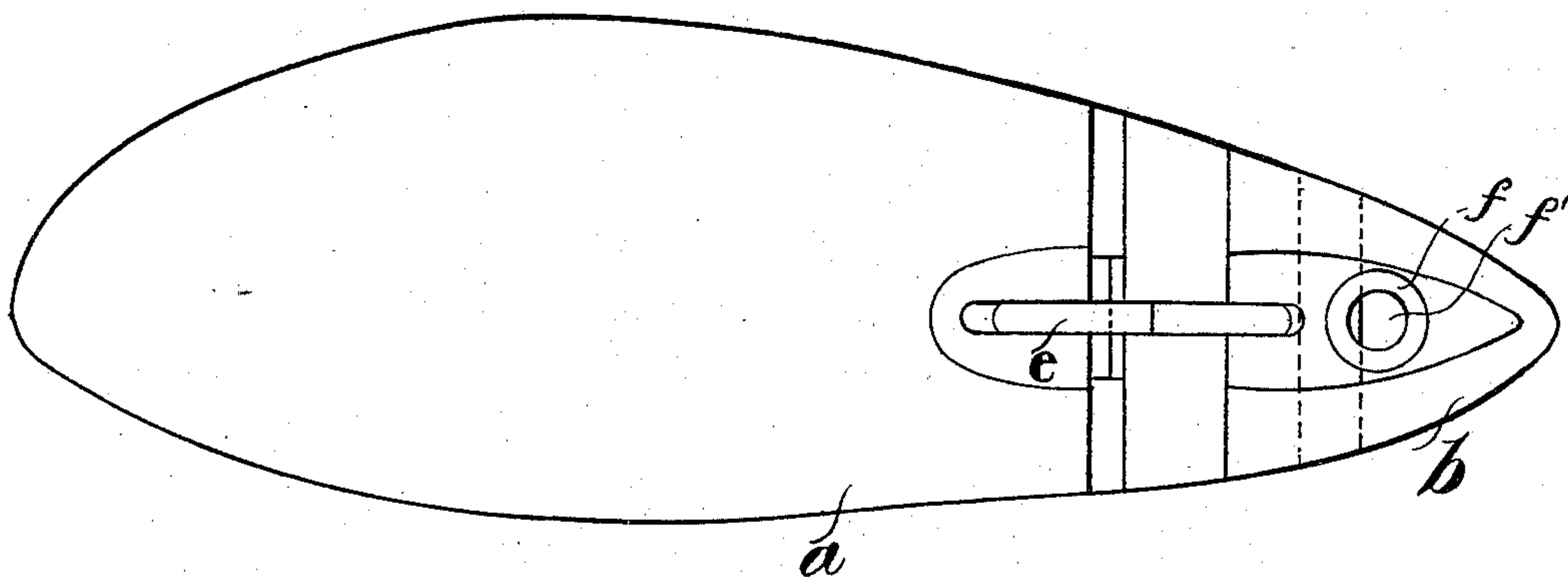
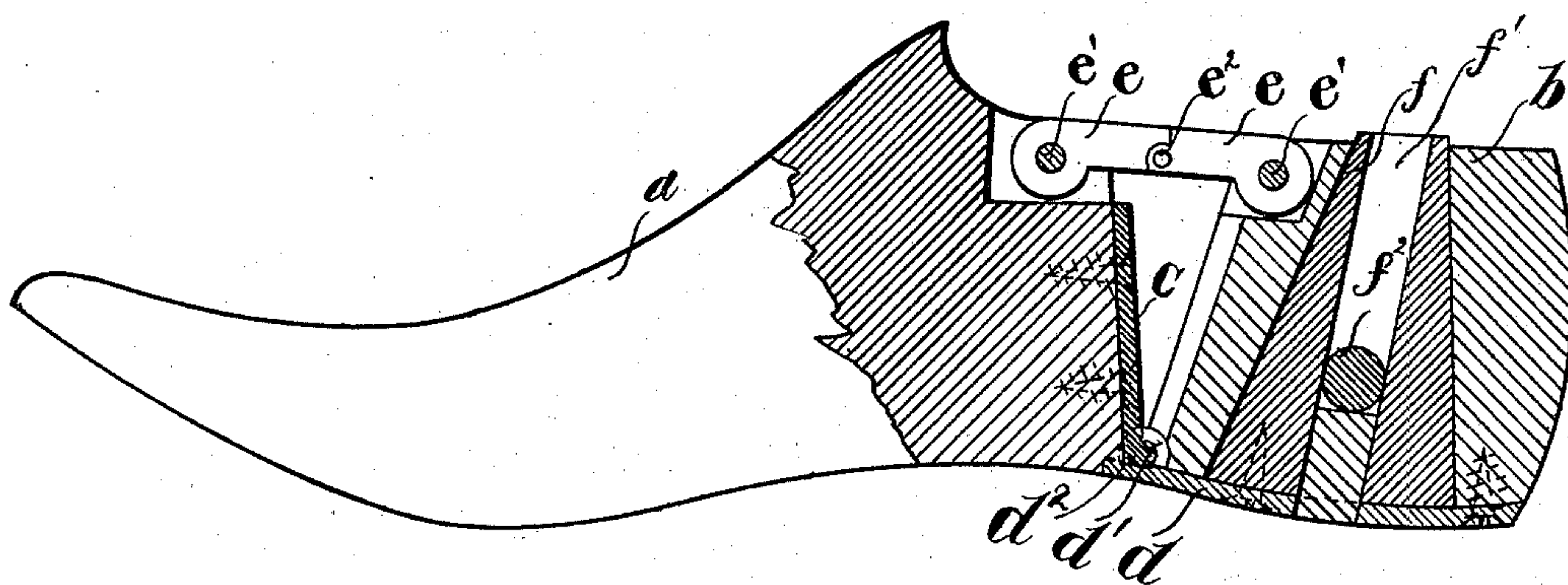


FIG. 2.



WITNESSES.
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GEORGE H. CLARK, OF BOSTON, MASSACHUSETTS, ASSIGNOR TO THE MORLEY FINISHING MACHINE COMPANY, OF SAME PLACE.

LAST.

SPECIFICATION forming part of Letters Patent No. 612,480, dated October 18, 1898.

Application filed April 2, 1897. Serial No. 630,370. (No model.)

To all whom it may concern:

Be it known that I, GEORGE H. CLARK, of Boston, county of Suffolk, State of Massachusetts, have invented an Improvement in Lasts, of which the following description, in connection with the accompanying drawings, is a specification, like letters on the drawings representing like parts.

This invention has for its object to improve and simplify the construction of hinged lasts—i. e., lasts composed of a fore part and a heel-piece connected together by a hinge; and the invention consists in several details of construction to be hereinafter pointed out and claimed.

Figure 1 shows in plan view a hinged last embodying this invention, and Fig. 2 a side elevation and partial vertical section of the hinged last shown in Fig. 1.

The last consists, essentially, of a fore part *a* and a heel-piece *b*, separated at or near the shank, and one of said parts is cut off obliquely, so that a V-shaped gap is formed between said parts *a* and *b*. The hinge by which said parts *a* and *b* are hinged together is secured to said parts, so that the pivot of said hinge will be at the bottom or near the sole surface of the last, and when so located the movement required for closing said parts together can be materially increased. As herein shown, one leaf *c* of said hinge is secured to the vertical abutting wall at the rear end of the fore part *a*, and a recess *c'* of corresponding shape and size is formed in the abutting wall at the front end of the heel-piece, so that when said parts are closed together the leaf *c* will enter said recess *c'*. A plate *d* is secured to the bottom of the heel-piece, which, as herein shown, may be made of suitable shape and material to serve as a heel-plate, and said plate *d* has formed or erected upon it a pair of ears *d'*, which receive the pintles or pivots of the leaf *c* of the hinge. The heel-plate *d* thus serves as the other leaf for the hinge, and it will be observed that the pivot of said hinge is at or near the sole surface of the last. I do not desire to limit my invention to thus forming the other leaf of the hinge as a heel-plate, as it is obvious that it may be made of any suit-

able shape and secured in a different location—as, for instance, to the abutting face of the heel-piece.

The plate *d*, which is herein shown as made to serve as the heel-plate, is caused to project over the junction or meeting points of the parts *a b* of the last, such overlapping portion being of a material length and represented at *d*², and such extension rests upon the fore part, entering a suitable recess formed therein to receive it.

A locking device is provided for locking the parts *a b* separated, as shown in Fig. 1, which consists of a pair of short arms *e e*, pivoted at *e'*, one to each part of the last, said arms being pivotally connected together at *e*² and there forming a toggle-joint, and when said arms are moved into alignment, as shown, they will lock the parts *a b* separated; but when said arms are turned on their pivots said parts will be brought together. The pivots *e' e'*, upon which said short arms are mounted, will preferably pass transversely through the parts *a b* from side to side, thereby strengthening said parts. While this particular form or construction of locking device will subserve the purpose for which it is intended, it also affords a means by which a last-hook may be enabled to engage the last, close the parts thereof together, and withdraw it from the shoe, thereby constituting an engaging device for the last-hook. Yet so far as other features of my invention are concerned such particular form or construction is immaterial.

The heel-piece or portion *b* is herein shown as formed with a tapering hole through it from top to bottom, and a correspondingly-shaped plug *f* is contained in the tapering bore thus formed, said plug resting upon the heel-plate, and said plug is made with a vertical hole *f'* through it from end to end, and the heel-plate is likewise made with a hole coincident with the hole *f'*. A transverse pin *f*² passes through said heel-piece and plug from side to side at a point substantially midway its length. Into the hole at the bottom of the heel-plate a wooden plug may be driven, which enters a hole at the lower end of the plug *f*, said wooden plug serving as a seat

for a tack. Yet so far as the features heretofore described are concerned said heel-piece may be constructed in any well-known way.

I claim—

5 1. The last comprising the fore part *a* and heel-piece *b* hinged together, and a device connecting said parts *a* and *b* together above the hinge, which is constructed and arranged to serve as an engaging device for a last-hook
10 by means of which said parts *a* and *b* may be drawn together and withdrawn from the shoe, substantially as described.

2. The last comprising the fore part *a* and heel-piece *b*, hinged together, and a locking
15 device interposed between and connected to both of said parts *a*, *b*, for holding said parts separated, said locking device being hinged between its ends to also serve as an engaging
20 device for a last-hook by means of which said parts *a*, *b*, may be released and the last withdrawn from the shoe, substantially as described.

3. The last comprising the fore part *a* and heel-piece *b* hinged together and provided
25 with a V-shaped opening between them, and an engaging device for a last-hook connected to both of said parts *a* and *b*, at or near the top, which crosses said opening, and which serves as a means of drawing said parts *a*
30 and *b* together, substantially as described.

4. The fore part *a* and heel-piece *b*, divided substantially as shown, and a hinge connecting them together at the bottom consisting
35 of a leaf *c* on the abutting face of the fore part having at its lower end the pintles for the hinge, and a heel-plate *d* on the bottom of the heel-piece having ears which receive

said pintles of the hinge, substantially as described.

5. The parts *a*, *b*, of the last, a hinge connecting them together, one leaf of which is on the bottom of the heel-piece and has a forward extension *d*², which crosses the junction
40 of said parts, substantially as described.

6. The fore part *a* and heel-piece *b*, hinged
45 together, and having a heel-plate on the bottom of the heel-piece which overlaps the fore part, substantially as described.

7. In a last, the heel having a tapering hole through it, a correspondingly-shaped plug
50 therein, a heel-plate upon which said plug rests, and means for securing said plug in position, substantially as described.

8. In a last, a heel having a hole through it, a plug therein having a hole through it, a
55 heel-plate upon which said plug rests having a hole through it coincident with the hole through said plug, and a plug driven into said hole at the bottom of the heel, substantially as described. 60

9. A transversely-divided last comprising essentially a fore part and a heel-piece connected together and movable one with relation to the other, and a plate on the sole face
65 of one of said parts which crosses the junction of the two parts and overlaps the other part, substantially as described.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

GEORGE H. CLARK.

Witnesses:

B. J. NOYES,

ARTHUR F. RANDALL.