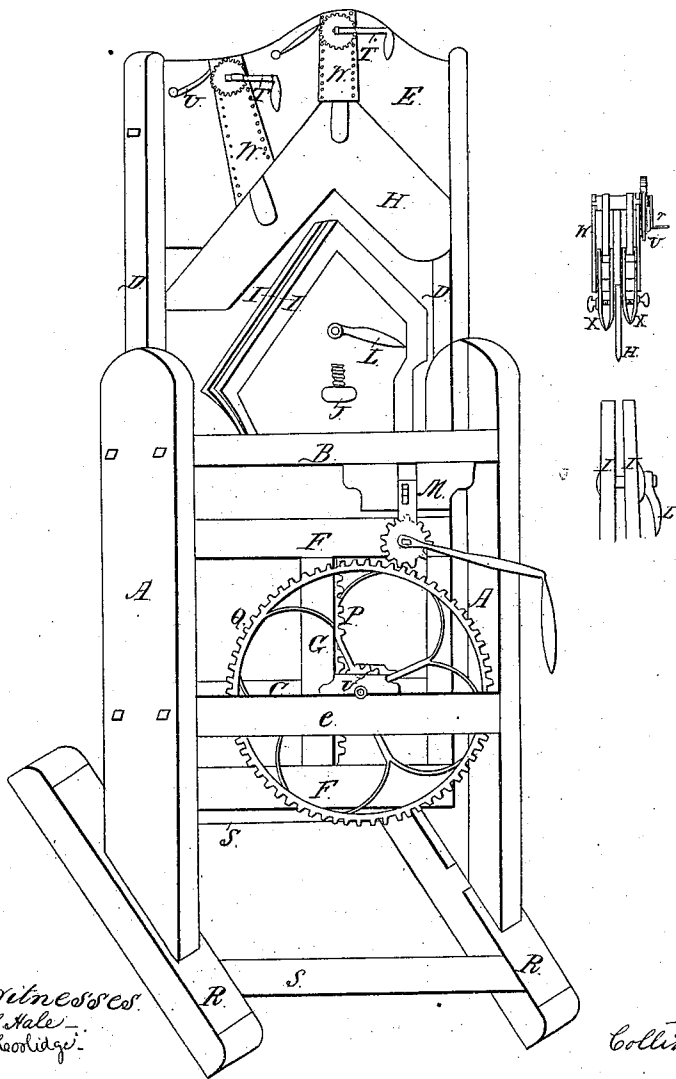


*C. H. Jaquith,*  
*Crimping Leather,*  
*N<sup>o</sup> 642. Patented Mar. 21, 1838.*



*Witnesses*  
*S. Hale*  
*H. Goodidge*

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# UNITED STATES PATENT OFFICE.

COLLINS H. JAQUITH, OF KEENE, NEW HAMPSHIRE.

MACHINE FOR CRIMPING LEATHER FOR BOOTS, &c.

Specification of Letters Patent No. 642, dated March 21, 1838.

*To all whom it may concern:*

Be it known that I, COLLINS H. JAQUITH, of Keene, in the county of Cheshire and State of New Hampshire, have invented a new and Improved Machine for Crimping Boots, of which I declare the following to be a full and exact description.

The principal parts of this machine that are made of wood are two frames called the outside frame and the sliding frame. The outside frame stands on two feet, being timbers three inches square, and about two and a half feet long, connected by two cross timbers or ties frame into the other timbers near the ends, the foot timbers being one foot ten inches apart from inside to inside. Into the middle of these timbers, two upright posts, which may be made of plank, are framed about three and a half feet high, two inches thick and eleven inches wide at the bottom; which width continues upward but six inches and is then narrowed an inch on each side. These posts are two feet apart from inside to inside. One foot above the foot timbers, two girts, three by two inches are framed into the posts, the front girt being flush or even with the front sides of the posts. And the interval between the girts being three and a half inches. Seventeen and a half inches above these girts, another of the same width as the posts at that place, and about three inches thick is framed into the posts by two tenons at each end, the frame being made strong and firm by the joint screws at all the principal joints. Through the middle of this girt at each end close to the posts are holes for the side pieces of the sliding frame hereafter mentioned to move in. This sliding frame moves up and down within the other. The side pieces are four feet eight inches long or high, two inches wide and one and a half thick. They are connected at the bottom by a cross timber, two by three inches, and one foot four inches above, by another cross timber of the same size. These two cross timbers are connected by an upright post, two and a half by two inches, on the right hand side of which is a cast iron rack, and which side is twelve and a half inches from the inside of the right hand outside post. And the side pieces are connected at top by a two inch plank fourteen or fifteen inches wide at the left side, and ten inches at the right side, and of the shape represented in the drawing annexed marked (E). This connection is by mortises and joint screws. Four pincers two

on a side adapted and used to take hold of the corners and sides of the leather and stretch it, are attached to, or connected with, this plank in this way. Two square grooves about an inch wide and three fourths of an inch deep are cut on each side, opposite each other, starting from the angle and running to the top. These grooves are covered with thin plates of iron fastened on the outside of the plank with screws. At about half an inch from the top an iron arbor nearly an inch in diameter passes through these plates and through the wood between the grooves at the center of the grooves. In front this arbor has upon it a bur wheel two and a half inches in diameter and a small crank, and at the left hand is fixed a dog for the bur wheel. The pincers pass up and down these grooves. They are made of two pieces of iron kept a short distance apart by a piece of metal between them near the upper end; there is a rivet through the upper end of the pieces of iron, and a thumb screw at the lower end. One end of a strip of leather is fastened around the rivets and the other to the arbor by passing through a mortise in it. By turning the crank the strips of leather are wound around the arbor and the pincers are raised, and by turning the crank the other way they are let down. About three and a half inches from these grooves at the left hand are two more, with pincers &c., similar to the others in all respects except that the grooves decline from a perpendicular toward the left, and are wider at the lower than at the upper end. Into a groove half an inch deep made into the under side of the aforesaid plank is inserted a plate made of metal, but zinc is preferable, called a form, three sixteenths of an inch thick, and of the shape represented in the drawing (H), the ends of the form being also inserted into the side timbers of the sliding frame and the lower edge being finished round. The width of the form varies. On the left it is from four and a half to six inches; at the top about eight inches, on the right form five and a half to six and a half inches. The sliding frame just fills the interval between the upright posts above mentioned, is placed between the lower girts and close to the back one, and the side pieces move in the aforesaid holes through the upper girt, and square gains are cut in the feet to permit the side pieces to descend to the floor. To keep it steady cleats may be nailed to the upright posts. To the outside of the left

side piece of the sliding frame is attached  
 an iron plate an eighth of an inch thick  
 (the wood being cut away to that depth)  
 and extending upward from the bottom  
 5 three feet and five or six thin iron cross  
 plates an inch wide and about two inches  
 long, are at proper distances bedded into  
 the outside frame, for the first mentioned  
 plate to run against to obviate friction. Or  
 10 instead of these small plates, a single iron  
 plate of the same size as the other, may be  
 bedded into the post.

The jaws shown in the drawings (I) are  
 of cast iron. Their width at the bottom is  
 15 about twelve and a half inches; their height  
 from the bottom to the point is about one  
 foot six inches; the length of the left hand  
 slope (the jaws being placed together) is  
 about seventeen and a half inches, and of  
 20 the right hand slope about ten inches. A  
 perpendicular line being dropped from the  
 point one foot, the distance thence hori-  
 zontally to the left edge is about nine inches.  
 The slope on the other side is not quite so  
 25 steep. At the point the edges which  
 should be smooth are an inch and an eighth  
 thick and diminish gradually in thickness  
 to the bottom of the slopes, the thickness at  
 the bottom of the longest slope being half  
 30 an inch. The jaws may be cast with a rim  
 along the slopes on the outside from an inch  
 to half an inch wide, widest at top, and with  
 a perpendicular strip three inches wide and  
 an inch and a half thick extending from the  
 35 point downward to the ledge hereafter  
 mentioned, and the remainder three eighths  
 and an inch and a half thick extending from  
 the bottom a ledge projecting outward three  
 fourths of an inch and square at the bottom  
 40 crosses the jaws horizontally. Two grooves  
 or mortises are sunk into the top of the up-  
 per girt, in which the bottoms of the jaws  
 are inserted up to the ledge. These grooves  
 are a little wider than the jaws are thick,  
 45 and are separated by a partition half an  
 inch thick, which must be exactly under the  
 edge of the form. The inside of the jaws  
 are polished as far down as the leather  
 comes in contact with them, and to facilitate  
 50 the polishing so much of them is a little  
 raised when cast. The two jaws must be  
 cast in different molds. As the smooth sides  
 are placed together, one jaw is the reverse  
 or counterpart of the other.

55 Through the thick perpendicular strip in  
 the jaws about eight and a quarter inches  
 below the point passes a bolt on the back  
 end of which is a head and on the front end  
 is a hand nut, the use of which is to open  
 30 and shut the jaws, and to set them at any  
 desired distance from each other. Through  
 the thick part of the back or front jaw, near  
 the bottom passes a thumb screw, by which

the distance apart of the bottom of the jaws  
 may be regulated. 65

The angle formed by the lower edge of  
 the form, and the upper edge of the jaws,  
 should not be the same. When the form is  
 brought down, so that its edge but just en-  
 ters between the points of the jaws, the  
 70 lower end of the form on the left is about  
 two and a quarter inches from the edge of  
 the jaw, the two edges on this side diverg-  
 ing in straight lines. On the other side  
 the edge of the form has a slight curve as  
 75 represented in the drawings annexed.  
 About ten inches from the inside of the up-  
 right post first above mentioned on the right  
 hand a transverse groove is made in both  
 lower girts, to receive the arbor or axle of a  
 80 cast iron wheel shown in the drawing (Q).  
 Small blocks of wood are fastened by screws  
 over this axle to keep it in place. This  
 wheel is twenty inches in diameter and is  
 placed between the two girts, and in front  
 85 of the sliding frame (G). Back of this  
 wheel connected with it and turning on the  
 same axle is a pinion the cogs of which  
 mesh with those of a cast iron rack (P) at-  
 tached to the upright post in the sliding  
 90 frame.

To the underside of the upper girt (B) is  
 firmly fastened by screws, a wooden block  
 (M) seven inches long, and three and a half  
 wide, by three and a half thick. Through  
 95 the middle of this, about seven inches from  
 the inside of the right hand post, a square  
 bolt passes, from each end of which hangs  
 an iron plate about six inches long, an inch  
 and a half wide, and half an inch thick. 100

Through the lower ends of these plates  
 passes an axle or arbor upon which is fas-  
 tened a cast iron pinion about three inches  
 in diameter, the cogs of which mesh with  
 those of the large wheel below. On the  
 105 front end of the axle is placed an eleven  
 inch crank, by turning which the sliding  
 frame is raised or lowered according to the  
 way it is turned. The sliding frame being  
 raised, the jaws being set at a proper dis-  
 110 tance from each other by means of the  
 thumb screw and hand nut, and the leather  
 being properly placed on the jaws the form,  
 by turning the crank is brought down, press-  
 ing the leather between the jaws, as far as  
 115 may be necessary to complete the crimping.

I claim as my invention—

The use of the thumb screw, at the bottom  
 to regulate the jaws for the introduction of  
 thick or thin leather and the mode of using  
 120 the pincers by means of the strap running  
 over the arbor all as above described.

COLLINS H. JAQUITH.

Witnesses:

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 G. A. FOSTER.