

JOHN C. FOSTER.

Improvement in Machines for Cutting Round Belts.

No. 115,949.

Patented June 13, 1871.

Fig. 5.



Fig. 3.

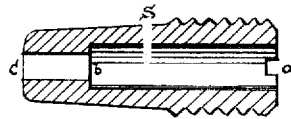


Fig. 4.



Fig. 1.

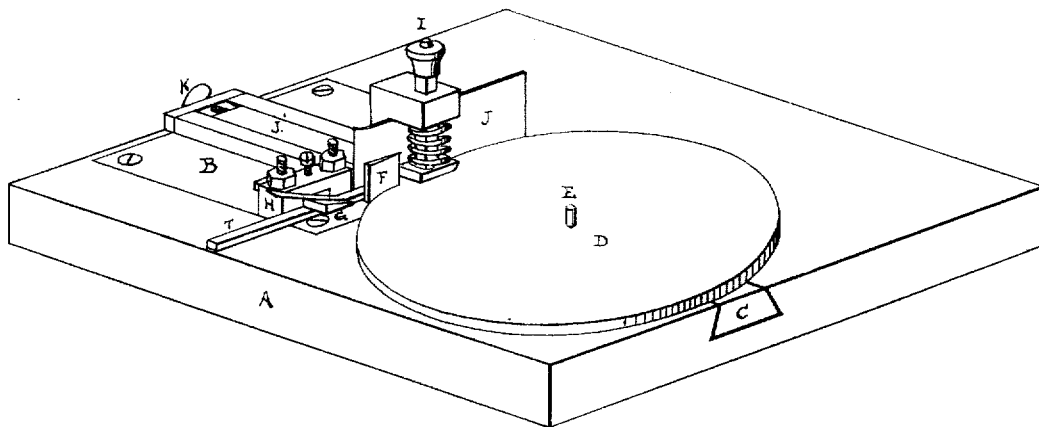
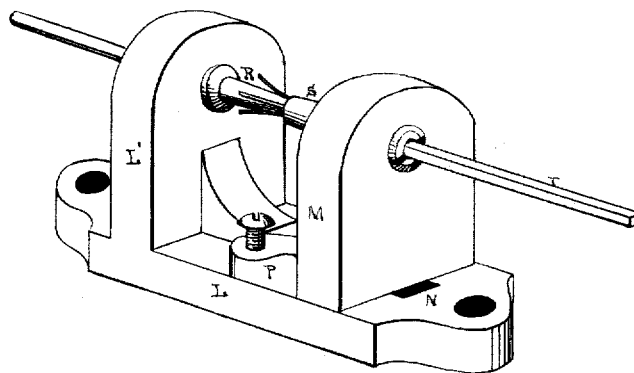


Fig. 2.



Witnesses.

*H. W. Howard*  
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# UNITED STATES PATENT OFFICE.

JOHN C. FOSTER, OF NEW LONDON, CONNECTICUT.

## IMPROVEMENT IN MACHINES FOR CUTTING ROUND BELTS.

Specification forming part of Letters Patent No. 115,949, dated June 13, 1871.

I, JOHN C. FOSTER, of New London, in the county of New London and State of Connecticut, have invented a new and useful Improvement in Devices for Manufacturing Continuous Solid Round Leather Belting, of which the following is a specification:

### *Nature and Object of the Invention.*

The first part of my invention relates to the arrangement of knives with other devices in such a manner that the leather is stripped and split at the same time; the object being to reduce the leather to uniform size and with rapidity before it is passed to the cutter. The second part of my invention relates to the arrangement of a device for cutting the belt into a round form.

### *Description of the Accompanying Drawing.*

Figure 1 is a perspective view of the first part of the machine, called the stripper and splitter. Fig. 2 is a perspective view of that part of the machine for cutting the belt into round form. Fig. 3 is a sectional view of the square die-tube. Figs. 4 and 5 are end views of the same.

### *General Description.*

Fig. 1—A designates the table, made of wood, upon which the stripping and splitting machine is necessarily attached. B designates the machine, made of iron, as attached. C designates the feeding-slide under the circle D, permitting of a sliding movement to and from the machine, as required, and is placed in the top of the table in dovetailed manner to hold it in its position. D designates the circular form of the leather, as shown upon the table. E designates the iron pin, attached vertically near the end of feeding-slide C, around which D rotates. F designates the knife, set vertically, by which the leather is stripped. G designates the knife, set horizontally in the adjustable frame H, and is made fast by a set-screw in the center of the top of said frame. H designates said frame, and is adjusted by turning up two nuts on the top of the frame and placing underneath a die of given thickness to produce a desirable distance between the knife and bed-plate of the machine. I designates the spiral spring-presser, for the purpose of holding the edge of the

leather down firmly as it passes to the knife F, and is attached to the adjustable guide and gage, as shown in the drawing. J and J' designate the adjustable guide and gage, adjusted by thumb-screw K. The gage J' is a slide motion, to produce any desired width of leather, by means of thumb-screw K. It is set in the bed-plate of the machine in dovetail manner. The guide J is a piece of sheet-steel vertically fastened to the head of said gage, resting closely upon the bed-plate of the machine, the shoulder of the gage projecting just far enough forward to allow the spiral-spring presser to work in a vertical manner. It should be stated here that the circle D is cut from leather known among tanners as "butts." Said circles are from five to five and a half feet in diameter. When circled it is punched in the center, and placed upon the iron pin E. There is also a lip cut upon one side of the circle, reduced to a point, so that it may pass under the spiral spring-presser I, between vertical knife F and vertical guide J; thence under horizontal knife G; then drawn, by manual or machine power, until the entire circle is consumed.

Fig. 2—L designates the frame of the machine, of which L is the base, and L' the vertical column. This frame is made of brass metal. M designates an opposite vertical column, movable forward in the slot N as the cutting-tube shortens by use, and is fastened by a nut on the under side of the base of the frame. Upon the sides of vertical column M are two braces set opposite, one of which, P, is seen in the drawing, acting as feet to hold more firmly the vertical column M; also there are two screws, one in each foot, to assist in tightening, if necessary. R designates the cutting-tube in the upper part of the vertical column L'. This tube is made of steel, and screws into said column. S designates the square unyielding die-tube, of which Fig. 3 is a sectional view, and from a to b is round, and from b to c is square. Fig. 4 represents the end a. Fig. 5 represents the end c. The sizes of the die-tube and cutting-tube are as near equal as possible. The die-tube also acts as a guide, and is set in upper part of vertical column M, the square die-tube S and cutting-tube R each and alike resting in vertical columns L and M, precisely horizontal. It should

be stated here that the cutting-tube R and die-tube S are adjustable, so that various sizes can be used, when necessary. T designates the leather as prepared by Fig. 1, called a stripping and splitting machine. It is square when it passes in, and is round when it passes out, as shown in the drawing. The end must be reduced, so as to pass through the die-tube S and the cutting-tube R, and be drawn on opposite sides. The product is used for belting light machinery.

*Claims.*

I claim as my invention—

1. The combination of the feeding-slide C

and pin E, the vertical and horizontal knives F and G with the adjustable frame H, the spiral-spring presser I, and adjustable guide and gage J and J', as shown and described.

2. The combination of the cutting-tube R and square unyielding die-tube S, as shown in Fig. 2, the whole being constructed and arranged as described, for the special purpose hereinbefore set forth.

JOHN C. FOSTER.

Witnesses:

JEROME AMOS,  
F. W. HOWARD.