

954,495.

H. Garton.
Joseph E. Cavanaugh

Human C. Baron Inventor
By his Attorney Wm. D. Odum

UNITED STATES PATENT OFFICE.

HERMAN C. BARON, OF NEW YORK, N. Y.

HAT-PRESSING MACHINE.

954,495.

Specification of Letters Patent.

Patented Apr. 12, 1910.

Application filed November 19, 1909. Serial No. 528,900.

To all whom it may concern:

Be it known that I, HERMAN C. BARON, a citizen of the United States of America, residing at New York, in the county of New York and State of New York, have invented certain new and useful Improvements in Hat-Pressing Machines, of which the following is a specification.

The present invention pertains to hat pressing machines and particularly to means for operating the upper die and holding the latter down on the lower die during the pressing period.

The object of my invention is to construct the device so that a uniform and efficient pressing action can be exerted upon the stock.

My invention is illustrated in the accompanying drawing, in which similar reference letters denote corresponding parts and in which—

Figure 1 is a vertical section and Fig. 2 a front elevation of the machine.

In the drawing *a* denotes the frame, and *b* the base supporting the lower stationary die, which receives the stock (not shown). *d* denotes the upper movable die, which is carried by a cross piece *e* secured to guide rods *f* which move vertically in guide pieces *g*, *g'* projecting laterally from the frame *a*. The stock which, as stated above, is held on the die *c*, is pressed into the desired shape upon the depression of the upper movable die *d*. Thus far, the machine is old.

The novel feature of my invention consists in the means for operating the upper die, so that the same is first lowered onto the lower die and stock and is automatically locked against upward movement and is then further depressed to exercise its pressing action on the stock. For this purpose the lower ends of the guide rods *f* are connected to one another by a cross piece *j*, and fulcrumed in the frame *a* at *m* is a pedal or foot lever *l*. A rod *n* hinged at *n'* to the cross piece *j* and at *n''* to the pedal *l*, connects the latter to the cross piece *j*, so that at the depression of the pedal, the cross piece *j* and consequently the guides *f*, the cross piece *e* and the upper die *d* will be drawn downward toward the lower die *c*.

Extending vertically from the base *b* in the path of the foot lever *l* is a stationary rod *h* which at an intermediate point is provided with a rounded off nose or projection

i below which the foot lever *l* will snap when lowered down to a certain point so that the upper die will be prevented from rising from the lower die. Upon a spindle *o* rotatively mounted in the frame *a* are mounted at each end spring actuated bars *p* by means of eccentrics *q* or the like, so that at the rotation of the spindle *o* the bars *p* will be given a downward movement. The manipulation of the spindle *o* is accomplished by a lever arm *r* keyed to the outer end of the spindle *o*. Each of the bars *p* is provided with an inwardly directed cross pin or projection *t*. Projecting in the path of the pin *t* is a projection *s'* extending from a sleeve or ring *s* secured at each end of the spindle *o*.

The upper ends of the bars *p* are formed with hooks or noses *u* which upon the depression of the foot lever and of the cross piece *j* will automatically engage the latter and upon the turning of the lever arm *r* downward will act upon the cross piece *j* in drawing it downward and causing the lowered upper die to exercise its pressing action on the stock spread over the lower die *c*.

The foot lever *l* is connected by a spring *v* to the base *b* or frame *a* so that immediately upon the disengagement of the foot lever from the projection *i* the foot lever will be caused to automatically return into its upward position.

The operation of the device is as follows: The foot lever *l* is depressed until it snaps below the projection *i* (see full lines Fig. 1), whereby the upper die *d* is lowered down onto the stock and the lower stationary die *c*. By this movement of the foot lever the cross piece *j* is also lowered and automatically engaged by the hook shaped portions *u* of the lateral bars *p*. By turning the lever arm *r* forward and downward into the position indicated in dotted lines in Fig. 1, the eccentrics *q* of the bars *p* cause a downward movement of the latter, which thereby draw the cross piece *e* and upper die *d* farther down, pressing the stock into the desired shape. Upon completion of the work, the lever arm *r* is swung backward into its upright position, whereby the projections *s'* of the sleeves or rings *s* are brought to act against the cross pins or projections *t* of the bars *p* pressing the latter against the tension of their springs away from the cross piece *j* and thereby releasing the latter. At this instant the foot lever *l* can be disengaged from

the projection *i*, and by its spring *v* it will instantaneously jump back into its raised position (see upper dotted lines in Fig. 1).

Owing to the arrangement of the lateral
5 hook-shaped bars, the pressing action will be more effective and uniform than with machines of hitherto known construction.

Of course, the apparatus may be modified by those skilled in the art in various ways
10 without deviating from the principle of my invention and I therefore do not wish to limit myself to the particular construction shown and described.

What I claim and desire to secure by Letters Patent is:

1. In a hat pressing machine, the combination with the frame, the movable upper die and its vertical guide rods, of a cross piece connecting the lower ends of said rods,
20 a spring actuated pedal connected to said cross piece, spring actuated hook-shaped bars and eccentrics rotatively mounted in said frame and carrying said bars, the latter being adapted upon the depression of the upper
25 per die to engage the said cross piece and draw the same farther down and means for operating the eccentrics.

2. In a hat pressing machine, the combination with the frame, the movable upper
30 die and its vertical guide rods, of a cross

piece connecting the lower ends of said rods, a spring actuated pedal fulcrumed in said frame, and connected to said cross piece, a snap on said frame to prevent the return of the pedal into raised position, a spindle
35 rotatively mounted in said frame, eccentrics keyed on said spindle, spring actuated hook-shaped bars carried by said eccentrics, a lever connected with said spindle for operating the said eccentrics and means for releasing
40 the cross piece from the hooked bars.

3. In a hat pressing machine, the combination with the frame, the movable upper die and its vertical guide rods, of a cross
45 piece connecting the lower ends of said rods, a spindle rotatively mounted in said frame, eccentrics keyed on said spindle, spring actuated hook-shaped bars carried by said eccentrics and adapted to engage said cross
50 piece, projections on said eccentrics and means on the spindle to act against said projections upon the turning of the spindle and to release the hook-shaped bars from the said cross piece.

In testimony whereof I affix my signature
55 in presence of two witnesses.

HERMAN C. BARON.

Witnesses:

MAX D. ORDMANN,

JOHN T. CARMODY,