

M. D. Moore,

Hay Press,

No 52,495,

Patented Feb. 6, 1866.

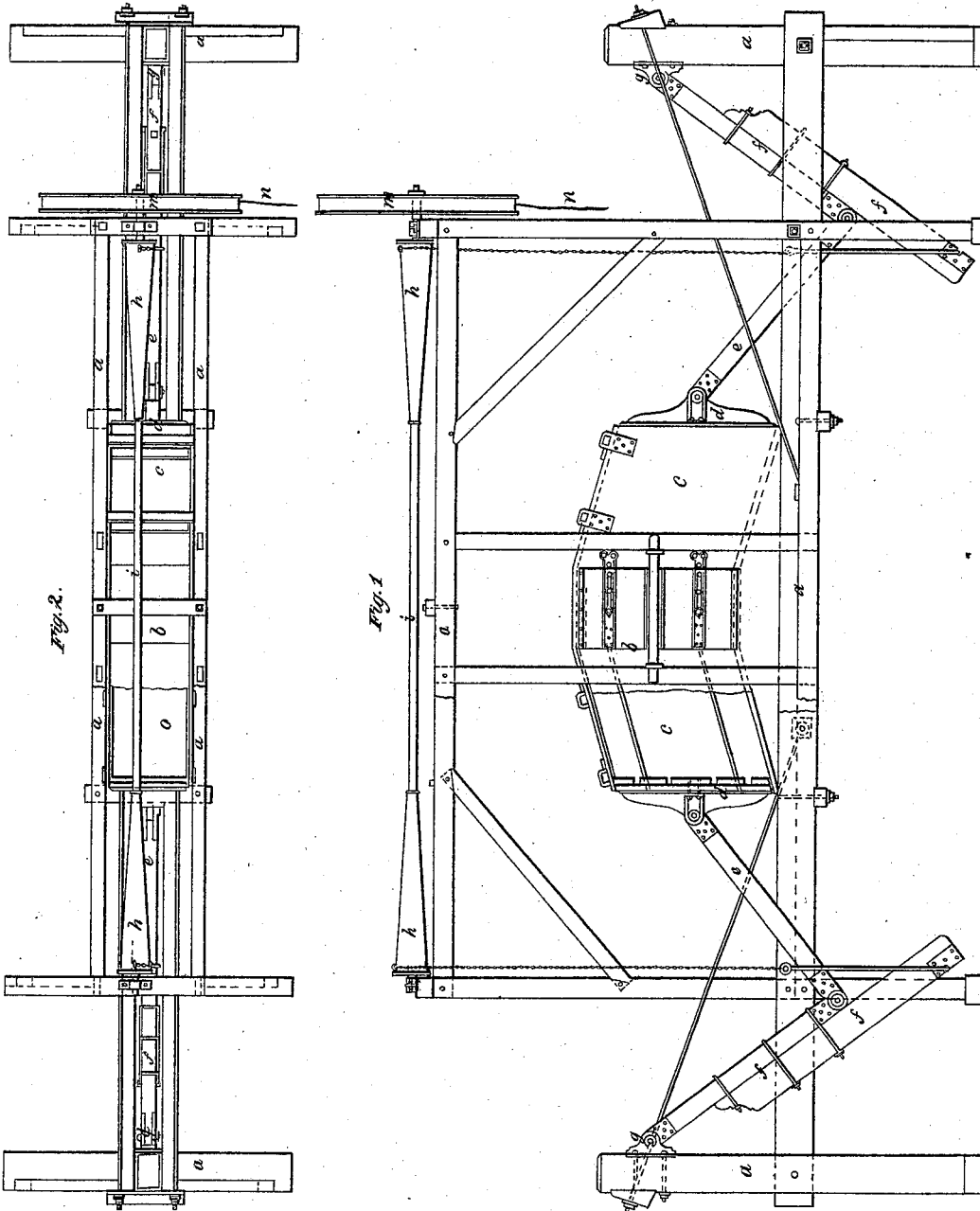


Fig. 2.

Fig. 1.

Witnesses.

*J. J. Grayson
Saml Bromberg*

Inventor

Maryus D. Moore.

UNITED STATES PATENT OFFICE.

MARQUIS D. MOORE, OF BROOKLYN, NEW YORK, ASSIGNOR TO HIMSELF
AND SAMUEL BROMBERG, OF SAME PLACE.

IMPROVED HAY AND COTTON PRESS.

Specification forming part of Letters Patent No. 52,495, dated February 6, 1866.

To all whom it may concern:

Be it known that I, MARQUIS D. MOORE, of Brooklyn, in the county of Kings and State of New York, have invented a new and useful Improvement in the Construction of Presses for Cotton, Hay, and other analogous substances; and I do hereby declare and ascertain my said invention as follows, referring to the accompanying drawings, in which—

Figure 1 is a side elevation; Fig. 2 a top plan.

The nature of my improvement consists in the manner of constructing a press with double follower or platen, together with the position of the parts (the foggie-levers and windlasses) for gaining power as the resistance increases, by which I produce a sufficiently heavy pressure with a comparatively small initial power, such as a horse, &c.

The construction is as follows: A suitable frame, *a*, is formed of timber and properly braced—a matter so well understood by persons that are acquainted with this description of machine that no particular description is required. Into this frame a horizontal box, *b*, is built, having a movable top cover and side doors for receiving and delivering the cotton, &c., to be pressed, and on either side are two extensions, *c c*, somewhat inclined in position, as clearly represented in the drawings, and open at their ends. Within these extensions *c* the platens *d* move toward and from the center box, *b*. They are forced forward by the direct application of toggle-levers constructed and applied as follows: A stout lever, *e*, is jointed at one end to the platen *d*, and at the other end to a second lever, *f*, at some distance from its end which projects beyond the said joint below the lever *e*, the opposite end of this lever *f* being jointed to a firmly-braced abutment on the frame at *g*, as will be noted. There are two sets of these toggle-levers, one for each platen.

To the end of lever *f* farthest from the abutment above named there is a cord or chain of proper materials and strength affixed, which extends up to a drum or windlass above at *h*. This windlass is made conical, the cord commencing

to wind on the largest diameter or base of the cone, and thence winding down to the smaller end. The two cone-windlasses are on a single horizontal shaft, *i*, which extends across from end to end of the upper frame-work over the box *b*, and is supported in boxes or bearings in said frame. In this way the turning of the shaft *i* winds up both cords on their respective windlasses simultaneously, and elevates the toggle-joint on each side, forcing forward the platens toward the center box until the pressing is completed. The bale is then bound and turned out of the press-box *b* in the usual way, and the cords being unwound from the windlasses the levers fall by their own gravity, drawing back with them the platens.

To hold what is gained by the winding up of the cords on the windlasses, I have a pawl-and-rag wheel (not shown in the drawings) on the shaft, and to turn the shaft I have a large drum or pulley, *m*, around which a cord, *n*, is wound, one end being affixed to the said drum or pulley *m*, and the other end attached to a horse, so that when the horse draws upon the cord *n* he will unwind the cord from pulley *m*, and wind the cord affixed to the toggle-lever onto the conical windlass *h*. In this way I have a constantly equal and gaining power on both of the platens comporting with the increasing resistance, so as to require a steady and equal force or strain upon the animal that works the machine. It is obvious that any other sufficient power may be substituted for horse-power.

Having thus fully described my improvements in the press for pressing cotton, &c., what I claim therein as new, and for which I desire to secure Letters Patent, is—

The toggle-levers constructed as herein described, and conical windlasses, in combination with two inclined extensions or end pieces, *c c*, as and for the purposes herein specified.

MARQUIS D. MOORE.

Witnesses:

J. J. GREENOUGH,
SAM. BROMBERG.