

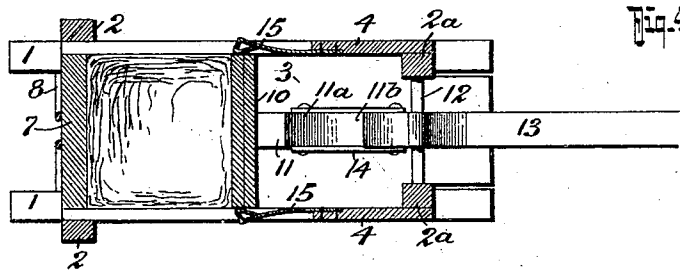
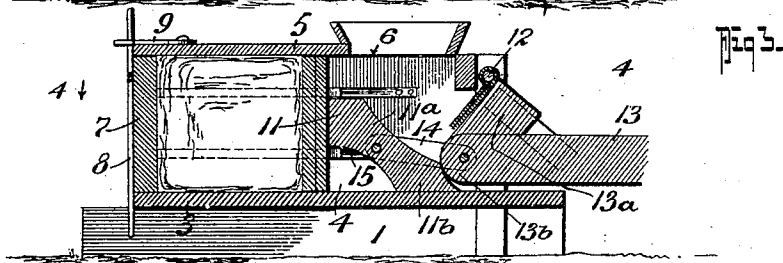
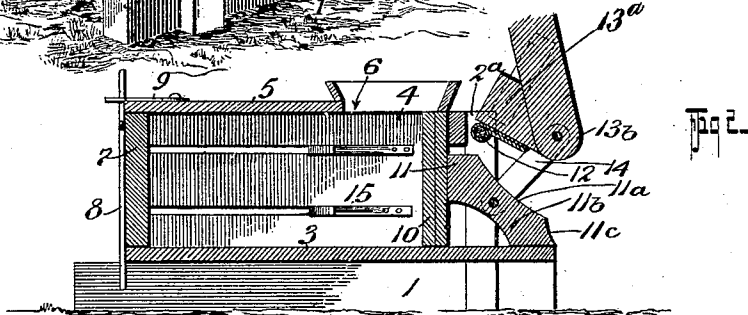
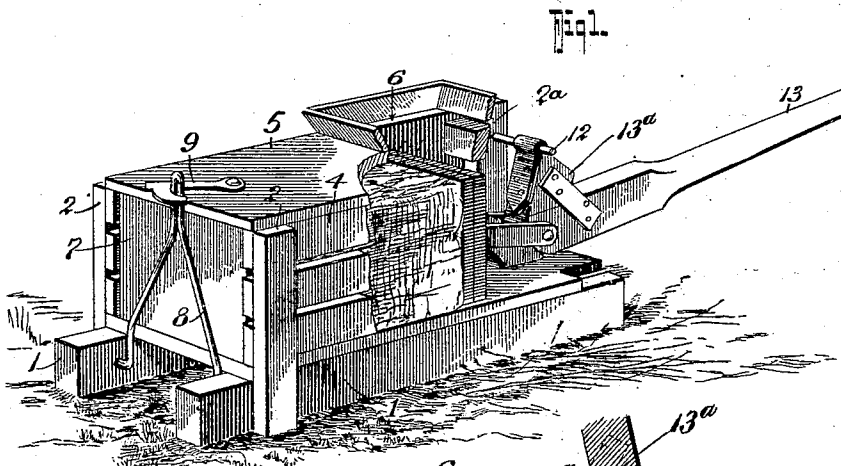
No. 870,023.

PATENTED NOV. 5, 1907.

R. W. EASTERLING.

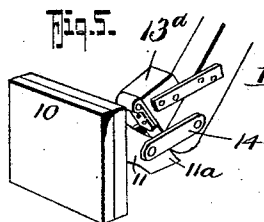
HAY PRESS.

APPLICATION FILED JULY 15, 1907.



WITNESSES:

John T. Schrott
Charles Mac Cormick



INVENTOR

Robert William Easterling

BY

Fred G. Dietrich
ATTORNEYS.

UNITED STATES PATENT OFFICE.

ROBERT WILLIAM EASTERLING, OF YOAKUM, TEXAS, ASSIGNOR OF ONE-THIRD TO T. J. KING
AND ONE-THIRD TO S. V. WOOD, OF BRADY, McCULLOCH COUNTY, TEXAS.

HAY-PRESS.

No. 870,023.

Specification of Letters Patent.

Patented Nov. 5, 1907.

Application filed July 15, 1907. Serial No. 383,802.

To all whom it may concern:

Be it known that I, ROBERT WILLIAM EASTERLING, residing at Yoakum, in the county of Lavaca and State of Texas, have invented a new and Improved Hay-Press, of which the following is a specification.

This invention relates to manually operated baling presses, and it primarily has for its object to provide a simple, inexpensive and compact means for mechanically assisting the operator in compressing the material into a bale.

Furthermore, my invention seeks to provide a simplified manner of connecting the power lever with the plunger whereby the action of compression is rendered uniform and expeditious.

With other objects in view which will hereinafter be explained, my invention consists in certain details of construction and peculiar combination of parts, all of which will be hereinafter fully described, pointed out in the claims and illustrated in the accompanying drawings, in which:—

Figure 1, is a perspective view of my press, part of the press box being broken away to the better illustrate the plunger and lever connection. Fig. 2, is a longitudinal section of the press, the lever and follower devices being at their inner position to permit of filling the press box. Fig. 3, is a similar view, the lever and follower being shown at the limit of their compression position. Fig. 4, is a horizontal section of the press, taken substantially on the line 4—4 on Fig. 3. Fig. 5, is a perspective view of the plunger or follower head, the actuating lever and the link and pivotal connections for the lever and follower head.

In the practical arrangement of my invention, the same consists of a press box formed of the bottom timbers 1—1, the front and rear uprights 2—2^a, the closed bottom 3, the slotted sides 4—4 and the top member 5 which extends from the rear uprights forwardly about half the distance between the front and rear uprights whereby to leave a filling opening 6 for the easy insertion of the material.

7 designates the removable end or closure member which fits within the baling chamber and during the operation of compressing the hay, is held from being pushed out of the said baling chamber by a swinging lock bail 8 hinged at the lower end to the outer ends of the bottom timbers and having its upper end shaped to engage a latch 9 pivotally mounted on the upper side of the press box, as clearly shown in Fig. 1.

When the lock bail is swung up to the position shown in Fig. 1 and locked by the detent 9, the closure member 7 is firmly held from passing out of the baling chamber and thereby becomes a fixed abutment against which the hay is compressed. After the bale is formed, the said member 7 will be automatically

55 moved out of the baling chamber by the spring of the bale against it and thereby admit of readily removing the bale from the baling chamber.

10 designates the plunger which snugly fits the baling chamber and has a fixedly held rearwardly projecting member 11 having a downwardly tapering upper edge 11^a for a purpose presently explained. 60

The member 11 is also provided with a foot portion 11^b that extends down in the plane of the lower edge of the plunger for engaging the press box floor, to form a guide for holding the plunger in the proper vertical position during the operation of compressing the material. 65

12 designates a cross shaft mounted in the upper ends of the rear vertical cleats 2^a—2^a and on this shaft is pivotally suspended the hand lever 13, in practice, seven to ten feet long. This lever includes a head portion 13^a that is suspended from the shaft 12 and disposed at an acute angle to the lever arm proper, whose front end forms a heel portion 13^b for engaging with the heel 11^a of the member 11 during the operation of forcing the lever down and the plunger forward. 70

The lever 13 is connected to the member 11 by a pair of straddle links 14—14 so connected with the members 11 and 13 that under the beginning or initial down thrust of the lever 13 the lever power is transmitted through the links 14 to the plunger or follower head, which operation is maintained until the heel portions of the members 11 and 13 engage, which occurs at that point where the greatest compression action of the lever is desirable, at which time the connection of the follower and lever is direct since the heel portions of the members 11 and 13 now engage as clearly shown in Fig. 3. By referring to the said Fig. 3 it will be noticed the thrust of the lever is such as to bring the follower head just beyond the inner edge of the top of the press box, and just far enough to move the follower over the hold backs or spring detents 15—15, mounted in one or more of the side slots of the press box and made fast to the press box sides, and whose function is to hold back the compressed bulk as the follower recedes and during the operation of tying the bale in the usual manner. 80

By beveling the upper edge of the rear extension on the plunger as stated, permits of a close connection of the said extension and the heel end of the lever. 85

From the foregoing, taken in connection with the accompanying drawings, the complete construction, the manner in which my press is operated and its advantages will be readily apparent. It will be noticed that when the plunger is moved back to the position shown in Fig. 2 ample space is provided for feeding the material into the press box in advance of the plunger. After the plunger has been forced to effect 90

100

105

the desired compression, the bale may be tied and the bale is forced out of the press box by working the lever and feeding in more hay to form the next bale.

Having thus described my invention, what I claim
5 and desire to secure by Letters Patent, is:—

1. In a baling press, the combination with a reciprocating plunger having a rearwardly extending member provided with a foot portion for engaging the floor of the press box, a lever pivotally hung in the rear end of the
10 press box having a heel portion adapted at times to engage the foot portion of the plunger extension and straddle links that connect the lever and said plunger extension, substantially as shown and for the purposes described.
2. The combination with the press box, having a removable closure member in the discharge end, and a feed opening in top at the other end; of a plunger movable in the press box having a rearwardly extended member having a downwardly inclined upper edge, and a heel portion that rides on the bottom of the press box, a lever pendently
15 hung on the front end of the press box, link members that connect the said lever and the plunger extension, said lever having a heel portion, adapted to positively engage

the heel portion of the plunger extension at times, for the purposes specified.

3. The hereinbefore described improvements in hay
25 presses, comprising the following elements in combination, a press box having slotted sides, a closure member removably mounted in the discharge end, a pivoted lock ball adapted to be held over the discharge end of the press
30 box, a detent on the press box for holding the ball locked, said press box having a feed inlet at one end, spring hold backs mounted on the sides of the press box, adapted to be pushed back by the plunger, a plunger mounted in the press box having a rearwardly extended member, having
35 an inclined upper edge and having a heel portion that rides on the bottom of the press box, a cross shaft mounted on the front end of the press box, a lever pendently hung on said shaft, having a heel portion adapted at times to positively engage the heel member on the plunger extension
40 and link connections that join said lever and the plunger extension, all being arranged substantially as set forth.

ROBERT WILLIAM EASTERLING.

Witnesses:

F. MERGENTHAL,
E. A. ALBRECHT.