

D. F. SLANE.

FEED ATTACHMENT FOR THRESHING MACHINES.

No. 104,895.

Patented June 28, 1870.

Fig. 1.

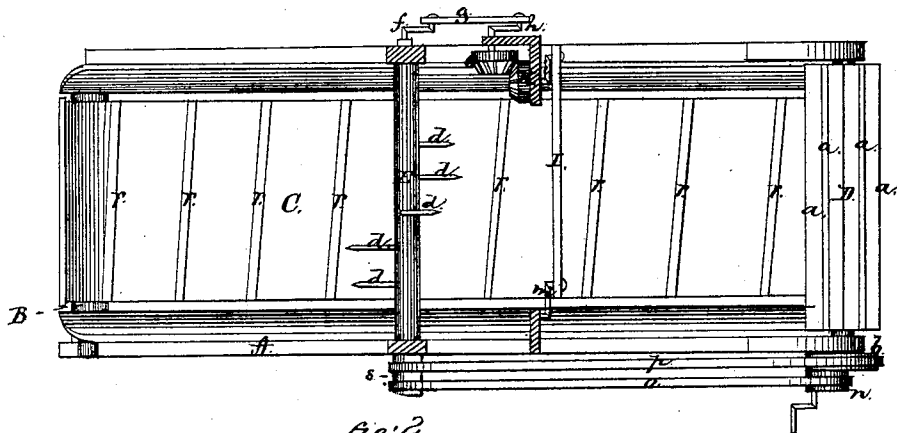
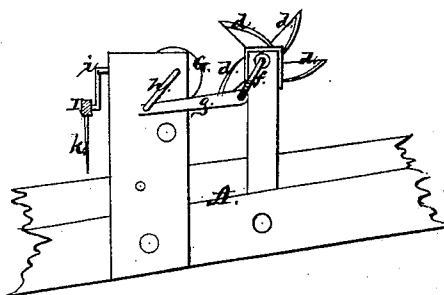


Fig. 2.



Witnesses

A. A. Graham

Co. L. Ewert

Inventor

D. F. Slane

Alexander Mason

Atty

UNITED STATES PATENT OFFICE.

DANIEL F. SLANE, OF CHILLICOTHE, OHIO.

IMPROVED FEED ATTACHMENT FOR THRASHING-MACHINES.

Specification forming part of Letters Patent No. 104,895, dated June 28, 1870.

To all whom it may concern:

Be it known that I, DANIEL F. SLANE, of Chillicothe, in the county of Ross and State of Ohio, have invented certain new and useful Improvements in Thrashing-Machines; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, making a part of this specification.

The nature of my invention consists in the construction and arrangement of a "feed attachment for thrashing-machines," as will be hereinafter fully set forth.

In order to enable others skilled in the art to which my invention appertains to make and use the same, I will now proceed to describe its construction and operation, referring to the annexed drawings, in which—

Figure 1 is a plan view of my machine, and Fig. 2 is a side view of a portion thereof.

A represents the frame-work of my machine, of suitable dimensions, having a pulley, B, at each end, over which pulleys is stretched a carrier-belt, C, running in an inclined position. At the lower or inner end of the frame A is a large cylinder, D, provided with buckets or flanges *a a*, running longitudinally along the cylinder, and also with a belt-pulley, *b*, at one end. At a suitable point in standards on the frame A is placed another smaller cylinder, E, provided with curved knives *d d*, attached at intervals on the body of the cylinder. It is also at one end provided with a double belt-pulley, *e*, and a crank, *f*, at the other end. The crank *f* has an arm, *g*, extending from it to another crank, *h*, attached to a small bevel-wheel, G. This crank *h* is a little longer than the crank *f* of the cylinder E, which gives the bar I an oscillating motion when the cylinder revolves. Into this wheel G gears a smaller bevel-wheel, H, provided with a crank, *i*, to which is attached an arm or bar, I, having on its under side a series of teeth, *k k*. This arm or bar I extends across the machine to another crank *m*. The motion of the wheels gives it what I call an "oscillating dip motion." It makes a downward stroke each way as it passes from side to side, and is intended to knock the sheaves to pieces or loosen them up after the bands are cut. The teeth are to be wide next to the head and tapering to a point. The

whole is to be run by power communicated by means of a belt from the cylinder of the thrasher to the pulley *n* on the end of the roller B at the lower end of the carrier-belt. From this pulley *n* there is also a belt, *o*, extending to the pulley *e*, attached to the knife-cylinder E, which belt is to be crossed, giving to said cylinder a rapid motion in an opposite direction to the one running the carrier-belt. From the other pulley, attached to the knife-cylinder E, to the pulley *b*, attached to the large cylinder D, is another belt, *p*, left straight, which gives the large cylinder motion in the same direction as the knife-cylinder. The knife-cylinder E and the large cylinder D may be provided with movable boxing, so that they may be raised or lowered to regulate the feed and cutting.

This machine is to be attached to machines already constructed by means of bolts, the side pieces of the frame-work or hooks attached to the ends of side pieces hooking into an eye or ring fastened to the frame of the thrashing-machine.

The carrier-belt C is provided with slats *r r*, running across the same, and on said slats may be provided small teeth, which should lean slightly toward the higher end of the carrier-belt, the teeth being about three or four inches apart.

When the machine is in operation the sheaves are thrown on the elevated end of the carrier-belt, when they are conveyed under the knives *d d*, which cut the bands. The oscillating knocker I K shakes them up loose. They are then conveyed to the large cylinder D, which has a much slower motion than the carrier-belt. Consequently it checks a portion of the straw, while a portion is caught by the cylinder of the thrasher, and by the time that is gone the motion of the large cylinder D brings the balance of the straw in contact with the cylinder of the thrasher. The large cylinder D, when provided with movable boxing, can be raised or lowered, so as to admit as much or as little of the straw as may be required.

Having thus fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. The combination and arrangement of the crank *f* on the knife-cylinder E, connecting-arm *g*, crank *h*, bevel-wheels G H, and cranks

i m, for giving the bar I an oscillating dip motion, substantially as herein set forth.

2. The arrangement, with the frame A, of the adjustable cylinders D D, provided with buckets *a a*, belt C, with slats *r r*, cylinder E, with cutters *d d*, and bar I, with teeth *k k*, all constructed and operating substantially as set forth.

In testimony that I claim the foregoing I have hereunto set my hand this 19th day of March, 1870.

D. F. SLANE.

Witnesses:

J. N. GRIFFIN,
W. M. GOSMAN.