

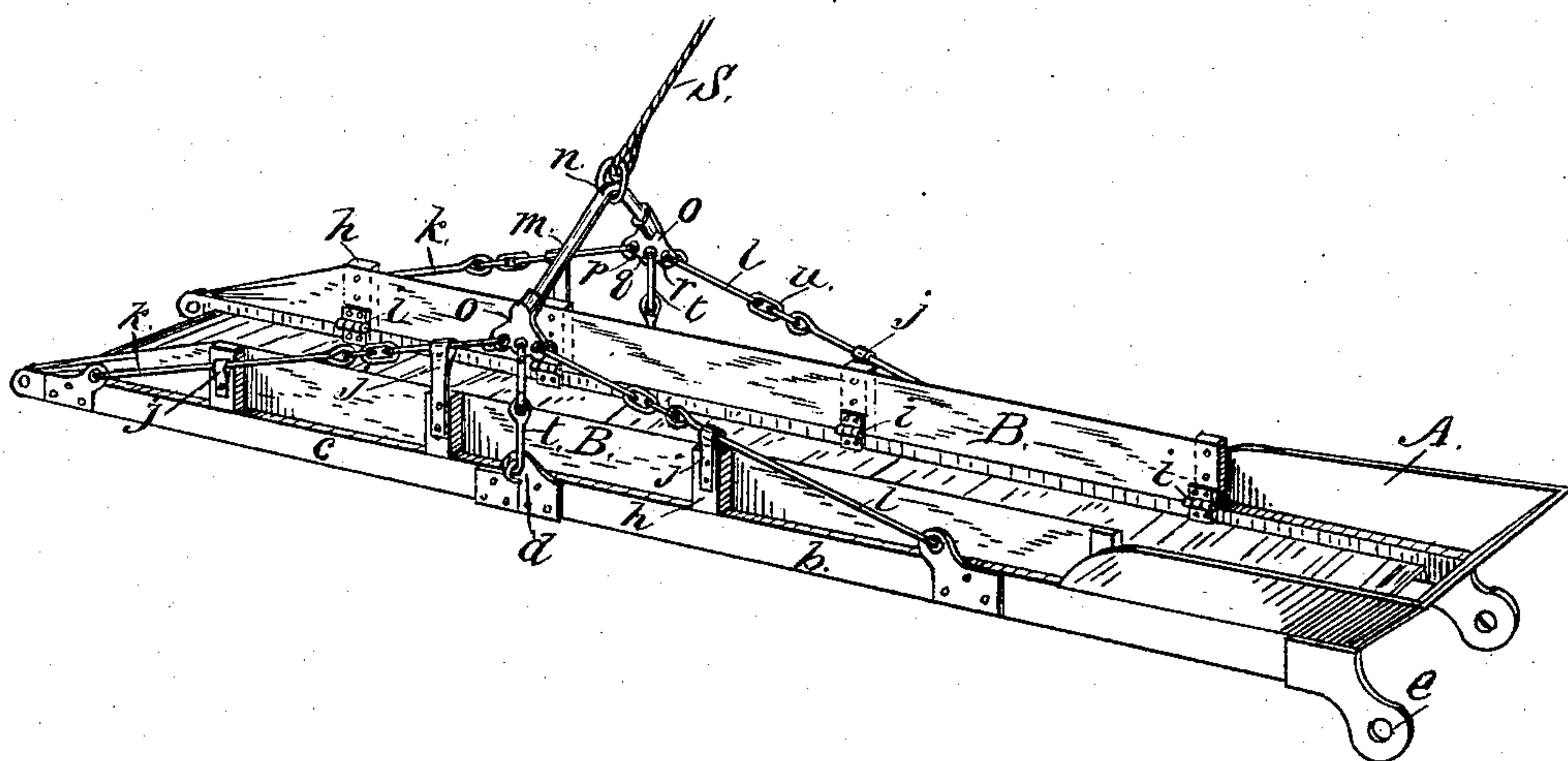
(No Model.)

J. J. MOORE & J. A. BALL.

FOLDING CONVEYER TROUGH FOR STRAW STACKERS.

No. 324,477.

Patented Aug. 18, 1885.



WITNESSES:

A. M. Hood.
J. Sanders

INVENTORS:

Jonathan J. Moore.
James A. Ball,
By H. P. Hood.
Atty.

UNITED STATES PATENT OFFICE.

JONATHAN J. MOORE AND JAMES A. BALL, OF THORNTOWN, INDIANA,
ASSIGNORS OF ONE-HALF TO J. C. TAYLOR, OF SAME PLACE.

FOLDING CONVEYER-TROUGH FOR STRAW-STACKERS.

SPECIFICATION forming part of Letters Patent No. 324,477, dated August 18, 1885.

Application filed October 27, 1884. (No model.)

To all whom it may concern:

Be it known that we, JONATHAN J. MOORE and JAMES A. BALL, citizens of the United States, residing at Thorntown, in the county of Boone and State of Indiana, have invented a new and useful Improvement in Folding Conveyer-Troughs for Straw-Stackers, of which the following is a specification.

Our invention relates to improvements in a folding conveyer-trough for which Letters Patent No. 274,632 were issued to us March 27, 1883.

The object of our present improvement is to raise and support the folding sides of the trough by means of the sling by which the trough is suspended.

The accompanying drawing illustrates our invention.

The figure represents a perspective view of our conveyer-trough, showing the sides erected and the sling in position for supporting the trough.

A represents a conveyer-trough of usual form for supporting an endless-belt conveyer for elevating straw from a thrasher. Said trough consists of two light platforms, *b* and *c*, hinged together at *d*, and *c* is adapted to fold over onto *b*.

b is designed to be pivoted at *e* to a thrasher or to an independent frame, as in a straw-stacker. The other end of *b* and *c* are sustained by a sling, to which brace-rods *k l* are connected.

For the purpose of retaining the straw, vertical side pieces, B B, of canvas, are erected on platforms *b* and *c*. Said canvas sides are secured to the platforms by means of several uprights, *h h*, nailed to the canvas and secured to the platforms by hinges *i i*. Said hinges are secured to the lower ends of the uprights and to the platforms, as shown, in such a manner that they will allow the uprights to fold inward on the platform, but will not pass the perpendicular outward.

In our previous patent the canvas sides are shown supported in an upright position by means of a pair of uprights hinged in a peculiar manner to the outer end of platform *c*,

and the raising and securing of those uprights must be separately attended to.

In our improved construction the outer ends of the canvas sides are tacked or otherwise fastened to the platform, and the several uprights which sustain the canvas are connected by short looped straps *j j* with the sling-rods *k* and *l*, so that when the trough is suspended by means of said sling-rods the uprights and canvas sides attached thereto are raised and held in an upright position.

We have found that in practice a straight stretcher-bar—as our former bar *p*, for holding apart the sling-rods when suspended by the rope S—is liable to be in the way of straw passing up the trough, and to thereby clog the conveyer. For the purpose of avoiding this difficulty, we connect the said rods by means of a stretcher formed of a bent rod or pipe, *m*. Said rod is bent so as to form an angle, *n*, midway of its length, and is sufficiently strong to maintain its shape when supporting the trough. To each end of said bar is fastened an eye-plate, *o*, having the eyes *p*, *q*, and *r*. Eyes *p* and *r* receive the ends of the rods *k* and *l*, and *q* receives the end of a short rod, *t*, the other end of which is flexibly connected with the hinge *d*. The lower ends of rods *k* and *l* are also linked into eyes fastened to the platform.

The sustaining-rope S is fastened to the stretcher at the angle *n*.

For the purpose of allowing rods *k* and *l* to shorten and fold inward, several chain-links, *u*, are inserted in each rod.

In operation, when the trough is lowered till supported from below, and rope S thereby slackened, the rods *k* and *l* fall inward, being prevented from falling outward on either side by their connection with the hinged uprights *h*, which cannot turn outward, but are free to fall inward, as before explained. As said rods fall inward the canvas sides B B are thereby folded inward and lie flat on the trough-bottom.

The whole operation of raising and lowering the sides of the trough is thus effected by the raising and lowering of the chute.

We claim as our invention—

In a straw-elevator, the combination of the elevator-trough having vertical sides adapted to fold inward upon said trough, and a
5 sling flexibly connected to said sides adapted to support said trough and to fold inward thereon, whereby said folding sides are raised

and lowered by the raising and lowering of said sling, substantially as specified.

JONATHAN J. MOORE.
JAMES A. BALL.

Witnesses:

W. H. SIMS,
A. F. BALL.