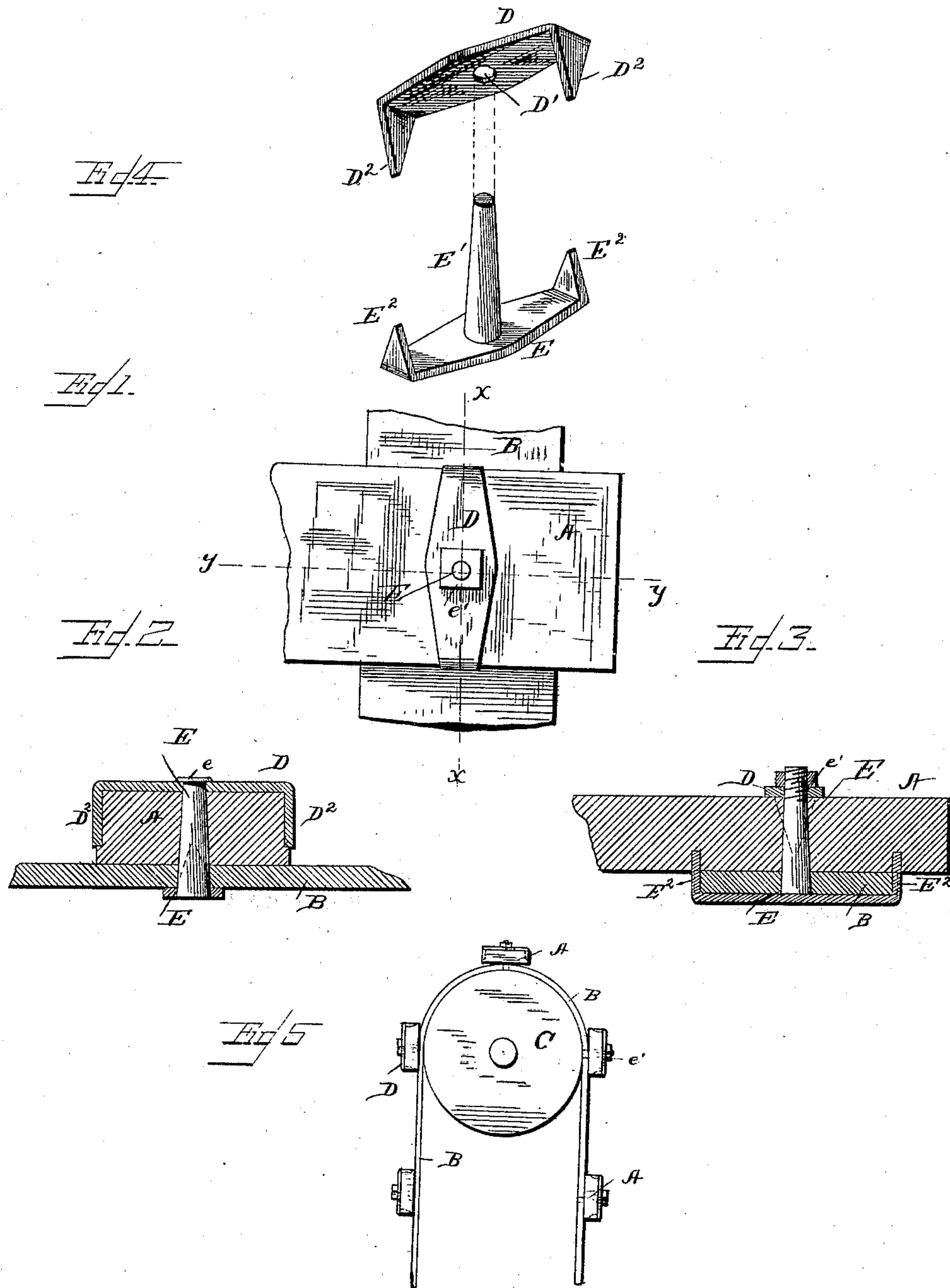


(No Model.)

S. J. SELLS.  
SLAT FASTENER FOR BELTS.

No. 313,777.

Patented Mar. 10, 1885.



WITNESSES  
F. L. Curand  
John T. Suter, Jr.

INVENTOR  
Sumner J. Sells  
By Frank A. Fouts Attorney



# UNITED STATES PATENT OFFICE.

SUMNER J. SELLS, OF BLOOMINGTON, ILLINOIS.

## SLAT-FASTENER FOR BELTS.

SPECIFICATION forming part of Letters Patent No. 313,777, dated March 10, 1885.

Application filed October 14, 1884. (No model.)

*To all whom it may concern:*

Be it known that I, SUMNER J. SELLS, a citizen of the United States, residing at Bloomington, in the county of McLean and State of Illinois, have invented certain new and useful Improvements in Slat-Fasteners for Belts, or Means for Uniting a Slat and Belt, of which the following is a specification, reference being had to the accompanying drawings.

My invention relates to means for securing a slat to a belt, and it is particularly adapted for uniting belting and slats used on thrashing-machines, elevators, and straw and hay stackers, all of which will be more fully hereinafter described, and pointed out in the claims.

In the accompanying drawings, Figure 1 represents a top plan view of the united parts of a slat and belt. In this view the slat is shown on top with the belt on the under side thereof and at right angles thereto. Fig. 2 is a central section on the line *x x* of Fig. 1. Fig. 3 is a section taken on the line *y y* of Fig. 1. Fig. 4 represents a perspective view of the belt and slat clamps, the belt-clamp being provided with a stud or pin adapted to pass through the belt, slat, and slat-clamp. Fig. 5 represents an end view of the slats, belt, and a pulley. This figure illustrates the various positions of the slats while the belt to which they are attached is passing around a pulley. It will be observed that the belt conforms to the periphery of the pulley and permits the slat to pass around said pulley without being strained, all of which will be more fully hereinafter specified.

The letter A represents a slat, B the belt, and C a pulley. D is a clamp-plate for the slat, provided with a central opening, D', and end clamp-spurs, D<sup>2</sup> D<sup>2</sup>. In Figs. 3 and 5 these spurs are shown in dotted lines. E is a clamp-plate for the belt, provided with a central tapering stud, E', and end clamp-spurs, E<sup>2</sup> E<sup>2</sup>. These spurs are slightly longer than the thickness of the belt, whereby the points may be inserted into the slat and thereby prevent any lateral or longitudinal movement of the slat on the belt. Said spurs are partially embedded in the sides of the belt, to more firmly unite the parts. (See Fig. 3.) The belt is provided with an opening for the reception

of the tapering stud E' on the plate E. Said stud also passes through an opening in the slat, and thence through the opening D' in the plate D. In Fig. 2 the stud is shown riveted at *e* to the plate D, while in Fig. 3 the stud is provided with a thread and nut, *e'*, for holding the plates and interposed belt and slat in position. In Fig. 2 one of the belt-spurs E<sup>2</sup> is shown in the dotted lines. In Fig. 3 one of the slat-spurs D<sup>2</sup> is shown in dotted lines.

The advantages of the fastening means herein shown and described consist in the fact that it is only necessary to make one hole in the belt and one in the slat for each set of clamps; also, that, while said means firmly unite the slat to the belt, the sides of the slat are free to rise from the face of the belt while passing around a pulley. Where the whole contact-surface of a slat is rigidly united to the belt by rivets or other means, the belt cannot conform and adapt itself to the face of a pulley, and a strain is placed upon the slat and a tendency produced to draw the rivets and weaken or break the slats. I obviate these defects by securing the slat in its center, leaving the edges free to rise or rock while passing around a pulley, and conforming to the flat surface again when the belt is in a straight line.

By placing the plate E entirely across the belt and turning down the clamp ends of said plate over the sides the belt is protected at that point. The protection and strength thus imparted to said point more than compensate for the weakness produced by the opening made in the belt for the reception of the stud. The same may be said of the slat-plate and clamps, which serve to strengthen the slat at the point it is weakened by the opening for the stud. Said plate and clamp also prevent the slat from splitting, and hold the same firmly in the place when united with the stud in the manner hereinbefore specified.

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

1. The combination of a slat and belt, each provided with an opening, a plate secured to the under side of the belt and having a stud fixed thereto, and a plate provided with an opening resting on the face of the slat, the

end of the stud being secured to the slat-plate, substantially as described, and for the purposes set forth.

2. The combination of a slat and belt, each provided with an opening, a plate transversely secured to the under side of the belt and provided with clamp-spurs and stud, as specified, a plate provided with an opening resting on the face of the slat, the end of the stud being secured to the slat-plate in the manner and for the purposes specified.

3. The combination of a slat and belt, each provided with an opening, a plate on the un-

der side of the belt having a stud fixed thereto, and a plate provided with an opening and end clamp-spurs, said plate being secured to the face and sides of the slat in the manner and for the purposes specified. 15

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

SUMNER J. SELLS

Witnesses:

JOHN A. FULWILER,  
A. RITCHETT.