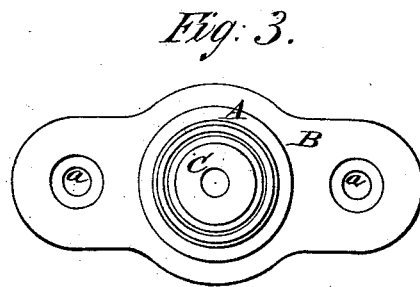
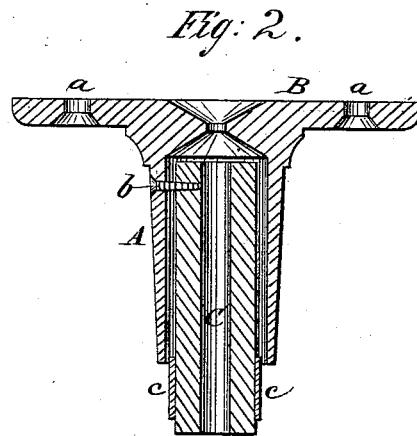
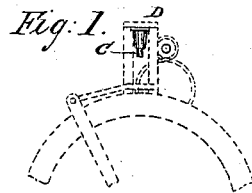


F. A. BOWEN.  
Stripper-Spring for Carding-Engines.

No. 217,575.

Patented July 15, 1879.



WITNESSES:

*Achilles Sehehl.*  
*C. Sedgwick.*

INVENTOR:

*F. A. Bowen*  
BY *Munn & Co.*  
ATTORNEYS.

# UNITED STATES PATENT OFFICE

FRANK A. BOWEN, OF PUTNAM, CONNECTICUT.

## IMPROVEMENT IN STRIPPER-SPRINGS FOR CARDING-ENGINES.

Specification forming part of Letters Patent No. **217,575**, dated July 15, 1879; application filed April 5, 1879.

*To all whom it may concern:*

Be it known that I, FRANK A. BOWEN, of Putnam, in the county of Windham and State of Connecticut, have invented a new and Improved Stripper-Spring for Carding-Engines, of which the following is a specification.

The invention consists in combining a socket, base, sleeve, and rubber spring, as hereinafter described.

In the accompanying drawings, Figure 1 shows the manner of applying the spring to the stripper. Fig. 2 is an enlarged view, in section, of the spring; and Fig. 3 is an end view of the spring in its socket.

Similar letters of reference indicate corresponding parts.

The stripper in carding-machines travels back and forth over the cards, and when it gets directly over one of the flats it stops, the flat is lifted and bears against springs attached to a cross-bar, while the arm passes under the flat, which drops down on the clothing on the arm. This now draws back and the flat is stripped, when the stripper moves on to another flat.

In carding-machines at present the flat, when it is raised, bears against two steel springs attached to the cross-bar; but these springs frequently break, causing loss of time, and sometimes tear the clothing of the cards.

My invention is intended to remedy these defects, and to furnish a steadier and altogether better spring for the purpose.

Referring to the drawings, A represents a metal socket rising from a plate, B, having countersunk screw-holes *a a*.

C is the cylindrical rubber spring, placed in

the socket A, and secured therein by a screw, *b*, passed through the barrel of the socket into the spring. The end of the spring projects out of the socket, and is fitted with a metal collar or sleeve, *c*, to furnish a rubbing-surface for the sharp edges of the end of the socket, and thus prevent the rubber from being cut.

The spring is applied by screwing its plate B to the cross-bar D of the stripper midway of its length, as clearly shown in Fig. 1, so that the flats will bear against it when lifted.

A spring of this kind is not liable to break, does not mar the varnished surface of the flat, and holds the flat steadier than the steel springs, as the rubber clings more closely to the flat and does not slip, thereby preventing in a great measure the rocking motion that the steel springs allow.

I am aware that it is not new to use a door-stop composed of a spring-actuated plunger sliding in a hollow stop attached to the wall, or to use a car-bumper consisting of a plunger forced outward by a spring.

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

The socket A and base B, in combination with sleeve *c* and cylindrical rubber spring C, secured in the socket by the set-screw *b*, as shown and described, for the purpose specified.

FRANK ARNOLD BOWEN.

Witnesses:

ALLEN W. BOWEN,  
FRED. E. YOUNG.