

S. H. REEVES.  
Spring Bed-Bottoms.

No. 138,529.

Patented May 6, 1873.

Fig. 1.

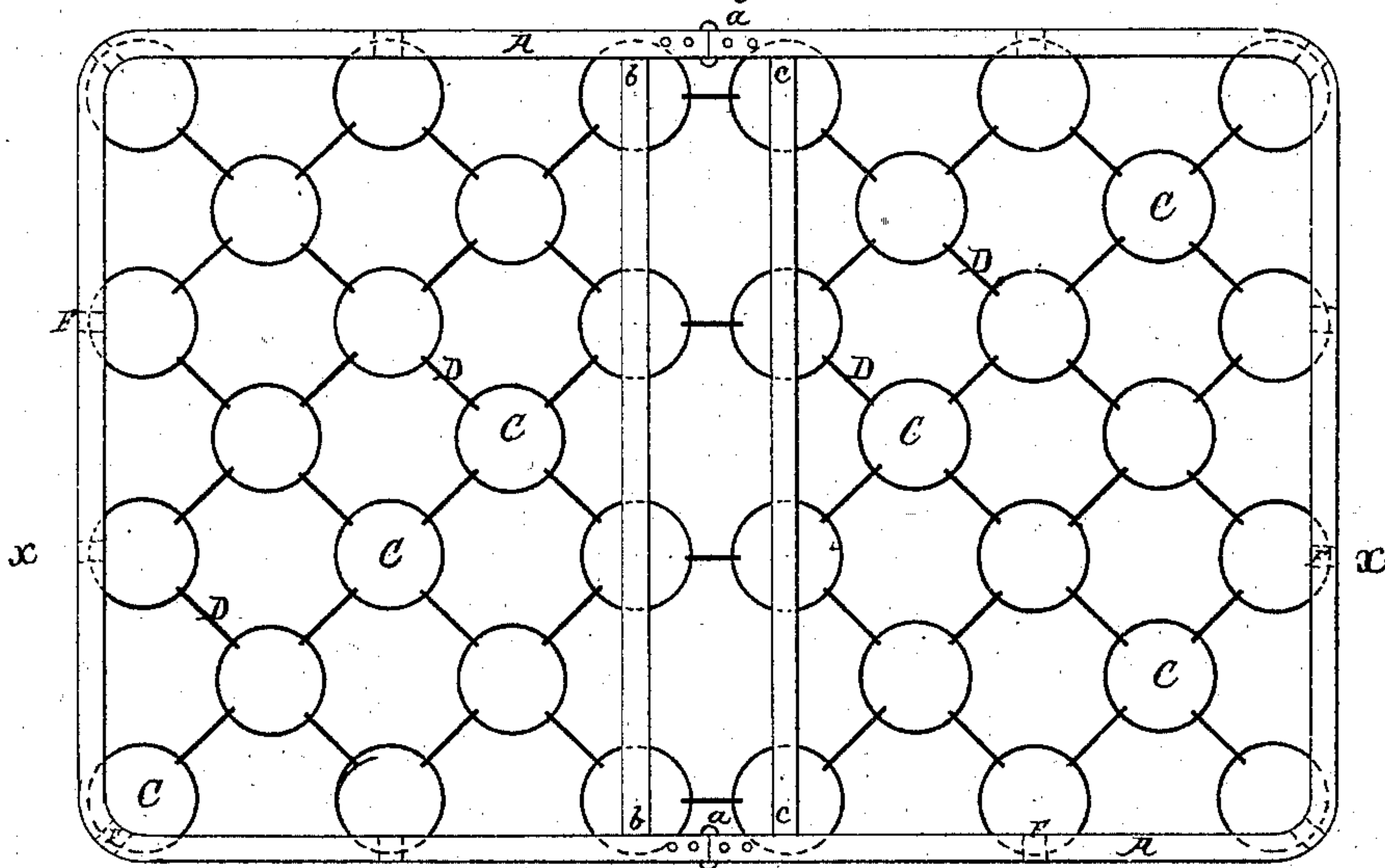


Fig. 4.

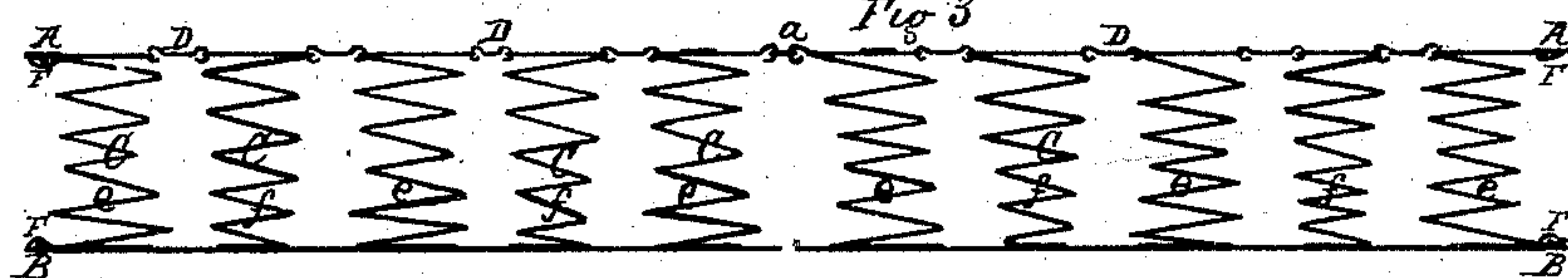
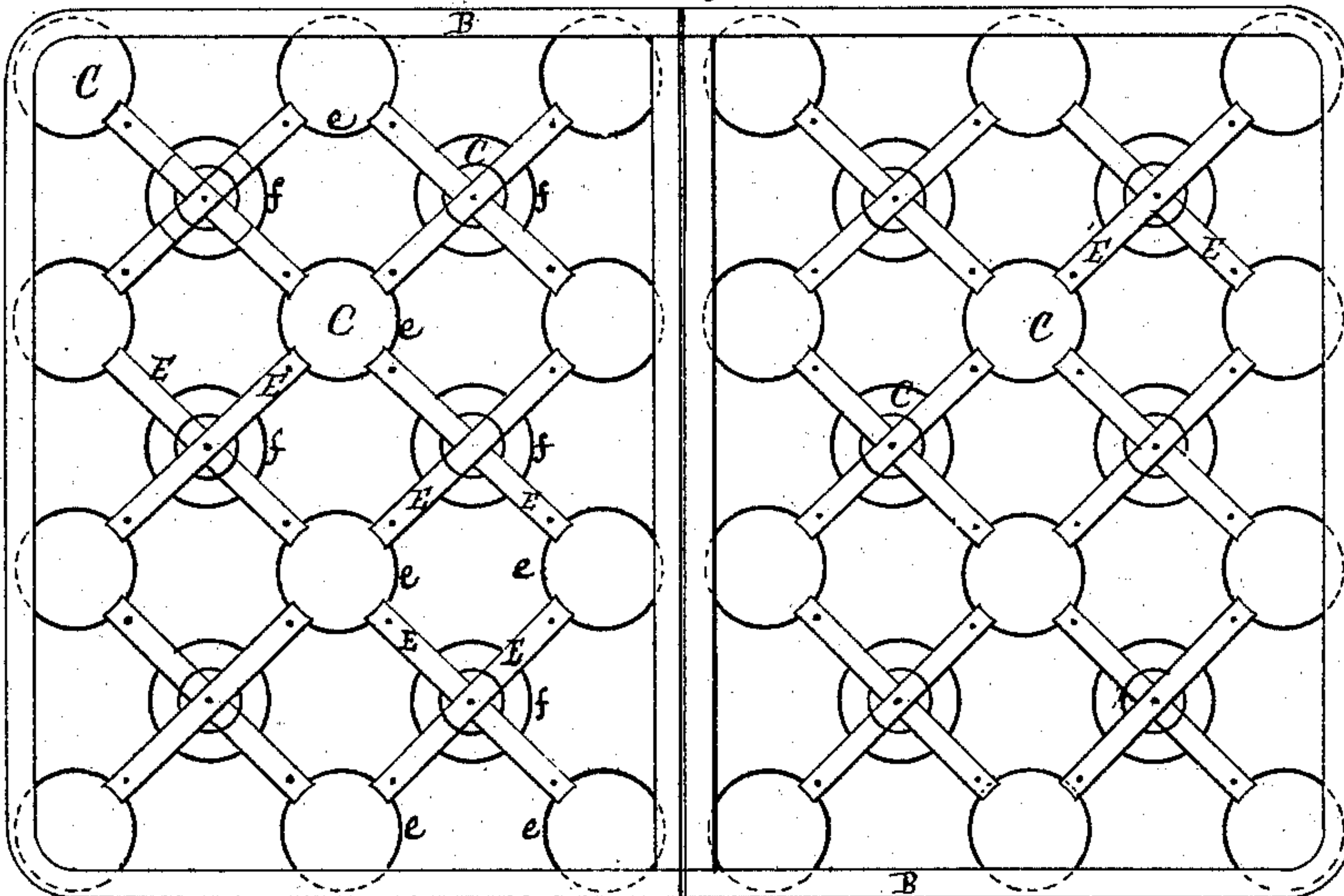


Fig. 3.

Fig. 5.

Fig. 2.



WITNESSES

INVENTOR

M. M. Zimpf  
J. B. Beecher

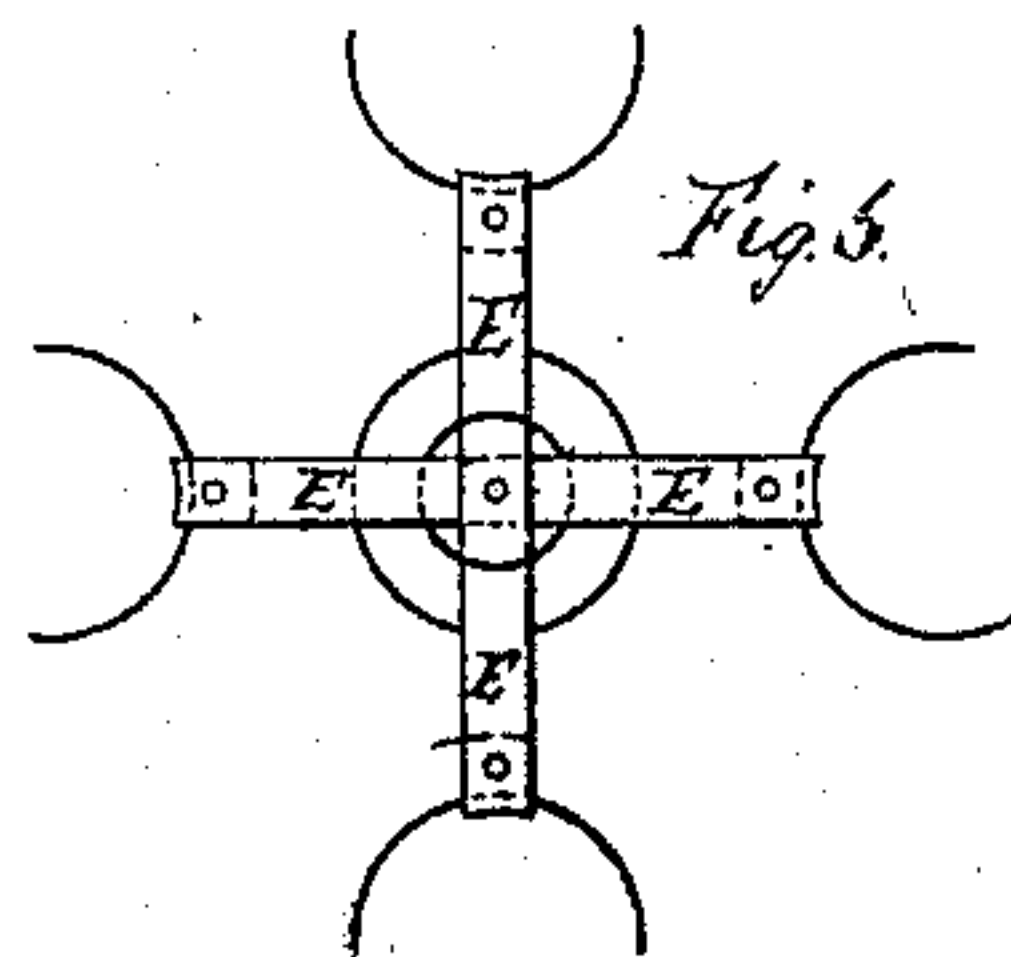


Fig. 6.

Samuel H. Reeves



# UNITED STATES PATENT OFFICE.

SAMUEL H. REEVES, OF NEW YORK, N. Y.

## IMPROVEMENT IN SPRING BED-BOTTOMS.

Specification forming part of Letters Patent No. 138,529, dated May 6, 1873; application filed February 20, 1873.

*To all whom it may concern:*

Be it known that I, SAMUEL H. REEVES, of the city of New York, in the county and State of New York, have invented a new and useful Improvement in Metallic Spring Bed-Bottoms or Mattresses; and I hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawing which forms part of this specification.

My invention consists in a metallic spring mattress or bed-bottom composed of an upper and a lower frame inclosing and surrounding a resting surface composed wholly of spiral springs, connected together at one end by a wire fastening which unites the upper coil of one spring with the upper coil of the spring next to it, and at the other end by metallic cross-bands, and the row of springs nearest the frames being secured to the same by clasps, or some other suitable fastening, all as will be hereinafter more fully explained.

In the accompanying drawing, Figure 1 is a plan view of the upper side or top of my bed bottom or mattress. Fig. 2 is a plan view of the under or bottom side of the same. Fig. 3 is a longitudinal vertical section taken on the plane of the line *x x*, Fig. 1. Fig. 4 is an enlarged side view of the fastening for the tops of the springs at the upper side of the bed-bottom. Fig. 5 is an enlarged detail view, showing more plainly the method of fastening the springs to the outside frame of the bed-bottom or mattress; and Fig. 6 is a detail view, showing the manner of connecting together the springs at the bottom or under side of the same.

A designates the upper, and B the lower, metallic frames, which are preferably made of hoop-iron. In the present instance the bed bottom or mattress is made in two parts or sections of substantially the same dimensions, to facilitate handling and transportation, the said sections being hinged together, so that the one can be readily folded over and upon the other—say, by hinges *a a* (see Fig. 1.)—connecting the two parts or sections of the upper frame. In this case strengthening-strips *b b* and *c c*, running from one side of the frame to the other, are found desirable.

I will here remark that the frames A B

may be continuous to constitute the entire lateral and longitudinal dimensions of the bed-bottom, in which case, of course, no hinges *a a* would be employed, nor need the cross-strips *b b c c* be employed.

The frames are provided with round corners where they are to be used with the styles of bedsteads now in common use. The corners are made round by the use of semicircular pieces, riveted at their respective ends to the side and end strips of the frame, respectively, as will be readily understood by reference to Figs. 1 and 3.

The upper frame A and the lower frame B are connected together, and the space inclosed by them is filled up with spiral springs C, all of which may be of the pattern termed "hour-glass" springs *e*; but I prefer to use some conical spiral springs *f* in connection with the hour-glass springs. At the top or upper side of the mattress the springs are connected together by a fastening, D, consisting of a simple piece of wire looped over the upper coil of two adjacent springs, and the ends bent down so as to prevent disengagement, as will be clearly understood by reference to Fig. 4. At the bottom or lower side of the mattress the springs are connected together by two bands, E E, of hoop-iron crossing each other and having their respective ends secured to the outer coils of adjacent hour-glass springs, as will be clearly understood by reference to Fig. 6. At the crossing of the bands E E the small end of a conical spiral spring is secured by passing its outside coil at this end under and over the said bands alternately, and hooking its end over the next or second coil. In fact, it is desirable to hook the ends of each outer coil over that next to it for strengthening the outer coils. The springs which lie between the frames A B are secured to said frames by clasps F riveted to the frames, so as to hold an outer coil of the spring between it and the frame, as will be clearly understood by reference to Fig. 5.

From the foregoing description it will be seen that I produce a purely metallic spring bed bottom or mattress, in which there is an inclosing outside metallic frame for supporting the mattress, and in which the resting-surface is composed of spiral springs fast-

ened together, whereby a durable, substantial, soft, and yielding bed bottom or mattress is produced.

What I claim as my invention, and desire to secure by Letters Patent, is—

The metallic spring bed-bottom or mattress, consisting of the upper surrounding-frame A, the lower surrounding-frame B, and the inclosed spiral or hour-glass springs C, the lat-

ter fastened together at one end by the loop-fastening D and at the other end by the cross-bands E E, and both ends being secured to the said surrounding-frames, substantially as herein specified.

SAMUEL H. REEVES.

Witnesses:

M. M. LIVINGSTON,  
T. B. BEECHER.