

(No Model.)

O. S. FOSTER.
CHAIR SEAT.

No. 529,485.

Patented Nov. 20, 1894.

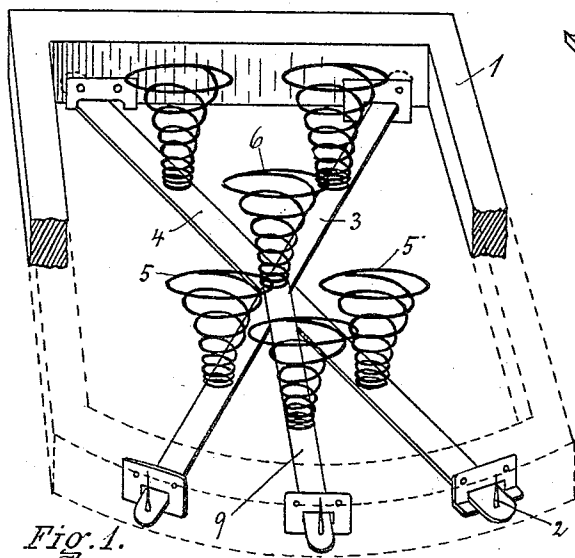


Fig. 1.

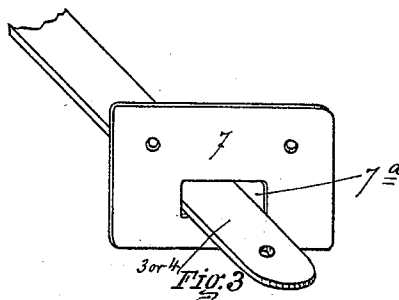


Fig. 3.

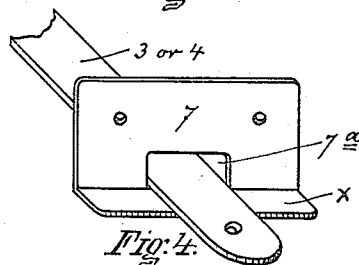


Fig. 4.

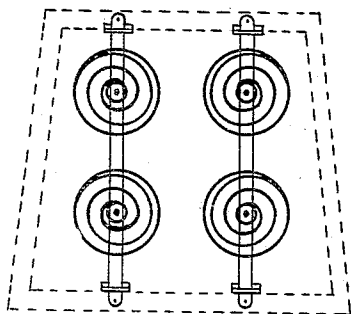


Fig. 2.

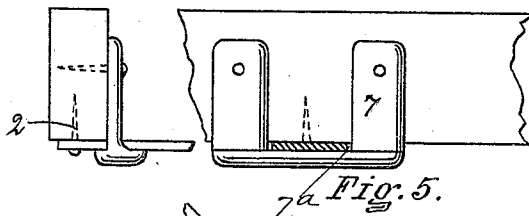


Fig. 5.

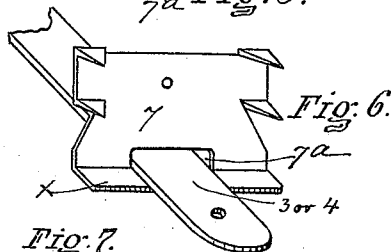


Fig. 6.

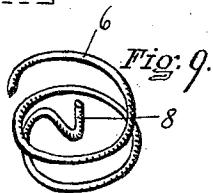


Fig. 9.

Fig. 8.

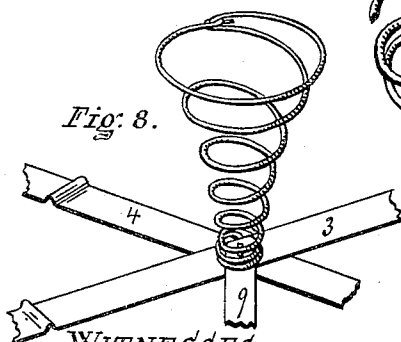


Fig. 10.



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OSCAR S. FOSTER, OF UTICA, NEW YORK.

CHAIR-SEAT.

SPECIFICATION forming part of Letters Patent No. 529,485, dated November 20, 1894.

Application filed November 19, 1892. Serial No. 452,478. (No model.)

To all whom it may concern:

Be it known that I, OSCAR S. FOSTER, of Utica, in the county of Oneida and State of New York, have invented certain new and useful Improvements in Chair-Seats, &c.; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, and to the figures of reference marked thereon, which form part of this specification.

My invention relates to an improvement in chair seats and detail of construction relating thereto.

In the drawings which accompany and form a part of this specification and in which similar letters and figures of reference refer to corresponding parts in the several views, Figure 1 shows in perspective a portion of a chair seat frame and a set of upholstery springs secured therein on suitable supporting slats or straps. Fig. 2 shows the outline of a chair seat and a set of springs differently arranged. Fig. 3 shows in detail the end of one of the spring supporting straps in connection with a stirrup or hanger. Fig. 4 shows a modified form of the same. Fig. 5 shows in side and end view another form of stirrup or hanger. Figs. 6 and 7 show still other modified forms of stirrup or hanger. Fig. 8 shows a pintle spring secured on the spring holding strips and securing the strips together at their intersection. Figs. 9 and 10 show details of the spring; Fig. 9 being somewhat distorted to more fully show the construction.

On the under side of the seat frame 1 is secured by small nails or screws 2 the ends of the yielding metal spring holding strips 3 and 4, on which are mounted the conical spiral springs 5 and 6. A half strip 9 is secured to the seat frame at the front and to the other spring strips at the point of intersection therewith. There is provided for securing the strips, fasteners or hangers 7, which are provided with eyes or slots 7^a, through which the strips pass, and holes for the reception of nails by which the fasteners are secured to the inner sides of the seat frame. The portions *a* of the stirrups 7 below the eyes may be bent to lie flatly on the

under sides of the strips as shown in Figs. 4 and 6. The form of fastening or stirrup shown in Fig. 5 is of malleable iron with arms adapted to engage the seat frame, and lips extending each way on the under side of the strip. According to the form shown in Fig. 6 the fastener is provided with integral spikes or brads; and in Fig. 7 a staple with angular points is used.

The springs, and especially the center springs, are secured on the strips by being provided with upwardly extending pintle ends 8 which project into the center of the circle of the end convolutions of the springs. In each strip at the point of intersection, are provided openings which receive the pintle ends and the strips pass between the contiguous end convolutions of the springs and are gripped by the convolutions. The springs are placed on the strips by passing the strips between the convolutions above the end of the pintle projections, and as the springs are rotated and screwed on the projections are entered in the holes in the strips. The strips are gripped together by the springs and the projections 8 passing through holes in each of the strips, secure them from lateral displacement, and the springs are likewise secured on the strips and held in vertical position. The half strip 9 gives more firmness to the front side of the seat where the greater wear and strain comes, and an extra spring or springs may be mounted on this half strip, especially where a larger number of springs than those shown is used in the construction. This arrangement also disposes the springs to better advantage in the front side of the seat which is usually made wider, as shown. It is evident that these spring holding devices are equally applicable to lounges, spring-beds, cots and similar devices.

The spring holding strips being secured by the fasteners at the point where they leave the frame bars, and projecting onto the under side of the bars and the pressure on the strips being from the upper side the elasticity of the strips is utilized and the vibrations of the strips do not loosen the strap fastenings.

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

The combination of a seat frame, intersect-

ing spring-holding strips rigidly secured at
each end on the under side of the frame;
rigid plate hangers engaging the strips at
the points where they leave the frame-bars
5 and secured on the inner faces of the frame-
bars, springs having contiguous gripping
convolutions at their ends, and central up-
wardly extending projecting ends adapted to
engage in registering holes in the intersect-
10 ing strips, and a half strip secured at one end

to the frame and at the other end to the other
strips at the intersection by the gripping con-
volutions of the central spring and its central
end, substantially as set forth.

In witness whereof I have affixed my signa- 15
ture in presence of two witnesses.

OSCAR S. FOSTER.

Witnesses:

GEORGE C. CARTER,

M. A. KELLER.