

(No Model.)

D. W. ELDREDGE.
HOLDER FOR WATCH MAINSPRINGS.

No. 452,566.

Patented May 19, 1891.

FIG. 1.

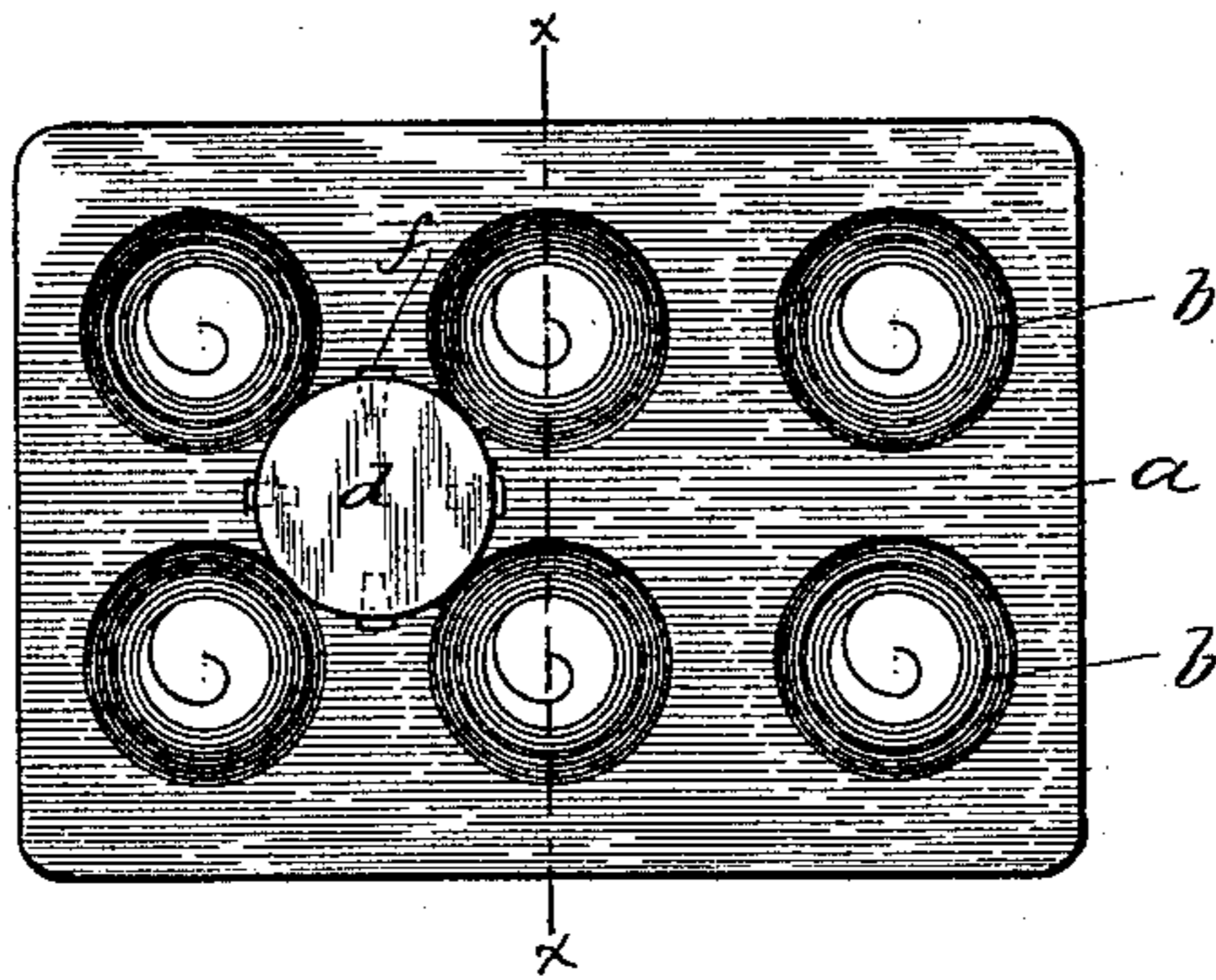


FIG. 2.

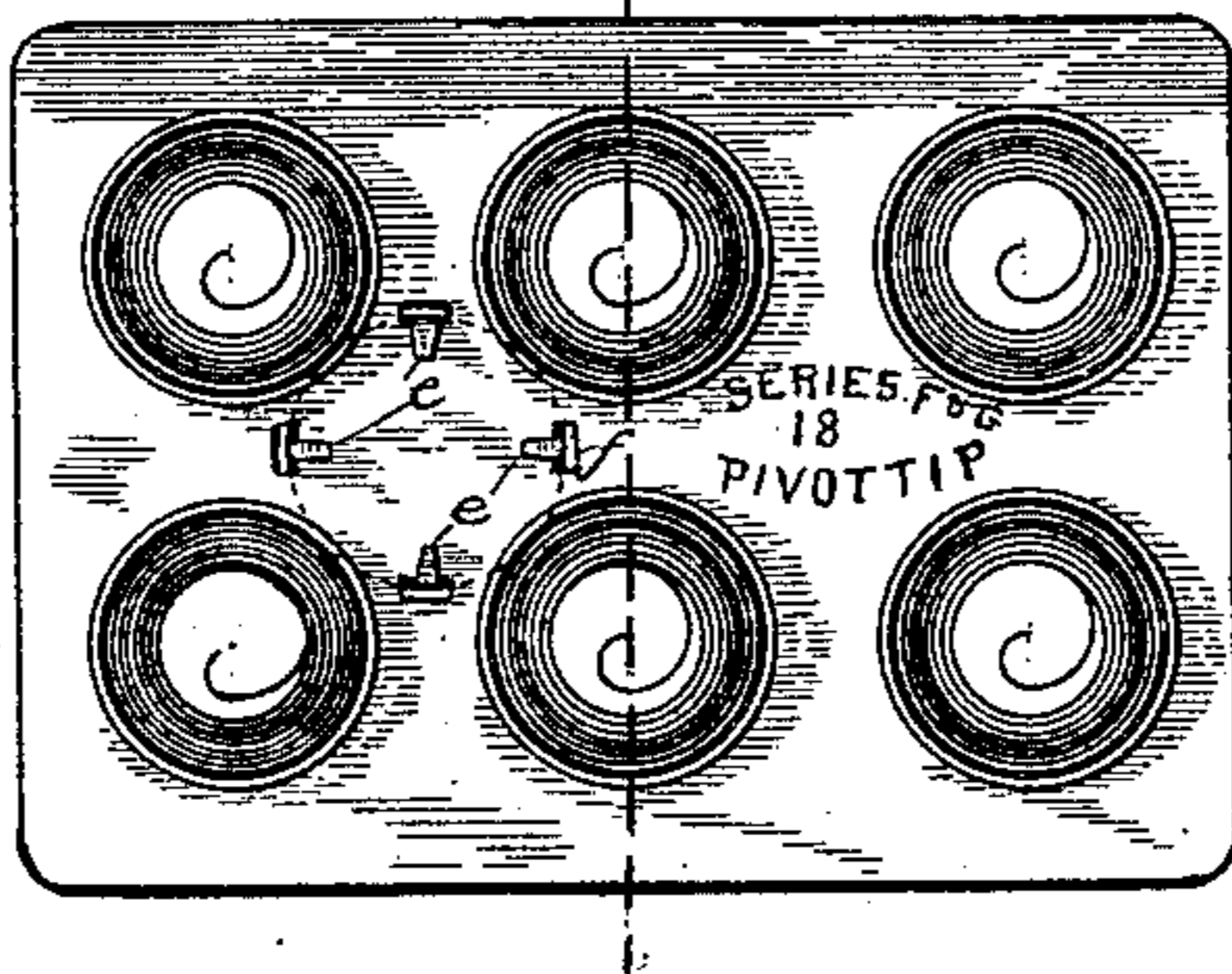


FIG. 5.

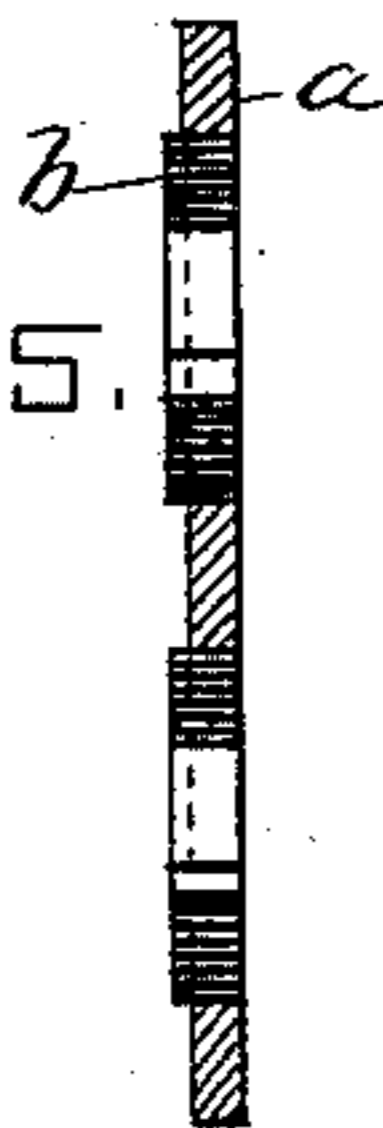


FIG. 3.

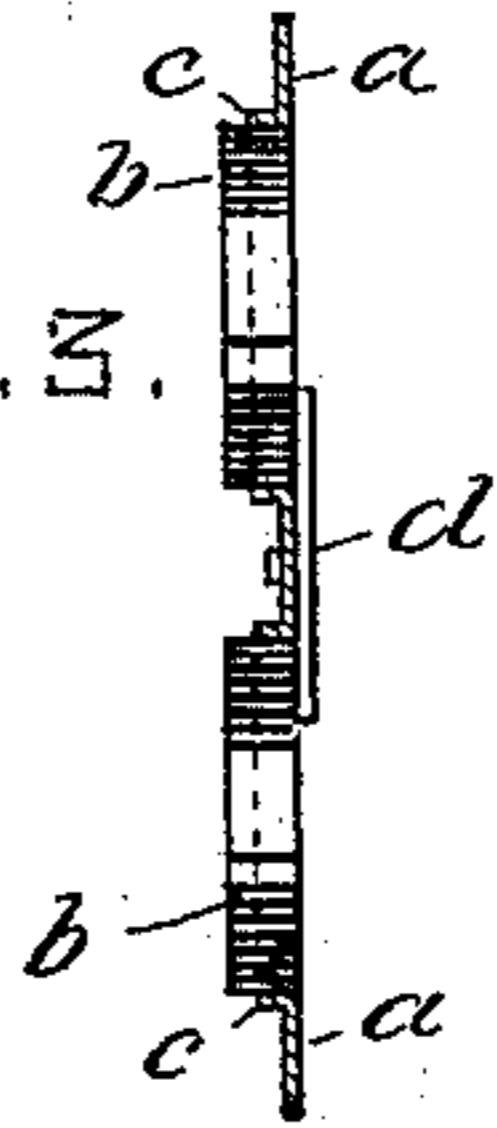


FIG. 4.



WITNESSES.

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UNITED STATES PATENT OFFICE.

DANIEL W. ELDREDGE, OF WALTHAM, MASSACHUSETTS, ASSIGNOR TO THE
AMERICAN WALTHAM WATCH COMPANY, OF SAME PLACE.

HOLDER FOR WATCH-MAINSPRINGS.

SPECIFICATION forming part of Letters Patent No. 452,566, dated May 19, 1891.

Application filed June 18, 1888. Serial No. 277,461. (No model.)

To all whom it may concern:

Be it known that I, DANIEL W. ELDREDGE, of Waltham, in the county of Middlesex and State of Massachusetts, have invented certain
5 new and useful Improvements in Holders for Watch-Mainsprings, of which the following is a specification.

In preparing watch-mainsprings for the market it is desirable to confine them as com-
10 pactly as possible, not only that they may occupy as little space as may be, but also that different springs may not become coiled around each other, causing trouble and annoyance in separating them. It has also been
15 found a very great convenience to have the springs so coiled as to be in condition for insertion into the barrels of watches without special winding for the purpose.

The object of my invention is to provide a
20 cheap and effective means for accomplishing the above results; and to such ends my invention consists in the improved construction hereinafter described and set forth.

My invention will be made clear by reference to the accompanying drawings, in which
25 Figure 1 represents a bottom view of a sheet or card containing a half-dozen springs. Fig. 2 shows the front side of the same sheet, on which is stamped the number and thickness
30 of the springs, &c. Fig. 3 is a sectional view on line *x x* of Fig. 1. Fig. 4 shows an accompanying disk, preferably made of metal, used to crowd the inclosed spring directly into the watch-barrel. Fig. 5 is a sectional
35 view of a form of holder differing slightly from that shown in Figs. 1, 2, and 3.

In the drawings, *a* designates a sheet or card of metal or other suitable material having a series of holes or apertures formed there-
40 in, which may be made by simply cutting a hole of proper form and dimensions in the sheet or card, in each of which holes or apertures is placed a spring *b*, coiled and arranged, preferably, as it is designed it shall be, in the
45 barrel of a watch. The card *a* may be of such thickness as of itself to afford sufficient lateral support or bearing for the spring, as is shown in Fig. 5, or if said card should be composed of thin sheet metal, as shown in
50 Figs. 1, 2, and 3, it may be provided at the

verge of the holes with a flange or rim *c*, which may be an integral part of the sheet or card, or a separate part secured to the card in any suitable or desired manner. The holes or apertures formed in the card are preferably
55 of such size as that the springs held therein may be ejected therefrom directly into the barrel of a watch, and to conveniently accomplish this end I provide a disk *d*, which is of such size as to adapt it to be placed upon a
60 spring in one of the recesses, so that by bearing on said disk or pushing thereagainst the spring in the recess or cell may be ejected or pushed out therefrom into the barrel of a
65 watch held on the opposite side of the card over such recess or cell.

In order that the disk *d* may be detachably connected with the card *a*, I provide the former with clips *e*, adapted to be passed through
70 slits or holes *f* in the card and be bent over, as represented in Fig. 2, to hold it upon the card. When the disk is wanted for use, it can readily be detached by bending the clips
75 upward or outward, so that they will pass back through the slits *f*, as will be readily understood without further description.

Any other suitable or convenient means may be employed for temporarily attaching the disk to the card. The size and strength
80 of the spring may be engraved, printed, or marked directly on either the front or back face of the card or sheet, as is indicated in Fig. 2. There need be no bottom provided for the cells or recesses, as the springs will
85 be securely held therein by friction between the sides of the cells or recesses and the springs.

By my improvement a very economic and efficient means is provided for packing watch-
90 mainsprings for the purpose of storage or shipment, and at the same time the springs are so arranged as that they may be ejected from the holder directly into the barrel of a watch.

While I have shown the card *a* as provided
95 with six recesses or cells it is obvious that it may be provided with a greater or less number, and other formal changes may be made without departing from the spirit of the invention.

Having thus described the nature of my invention, I would have it understood that what I claim is—

The herein-described card, having a series
5 of holes or perforations, a coiled watch-spring
seated in each hole or perforation and retained therein by its expanding tendency, whereby said springs are conveniently arranged in a compressed condition and may
10 be conveniently introduced into a watch-bar-

rel without necessity of handling them, substantially as set forth.

In testimony whereof I have signed my name to this specification, in the presence of two subscribing witnesses, this 6th day of 15 June, A. D. 1888.

DANIEL W. ELDREDGE.

Witnesses:

EDWARD A. MARSH,
NATHAN P. MULLOY.