

(No Model.)

M. ROSENZWEIG.

SOFA BED.

No. 451,172.

Patented Apr. 28, 1891.

Fig. 1.

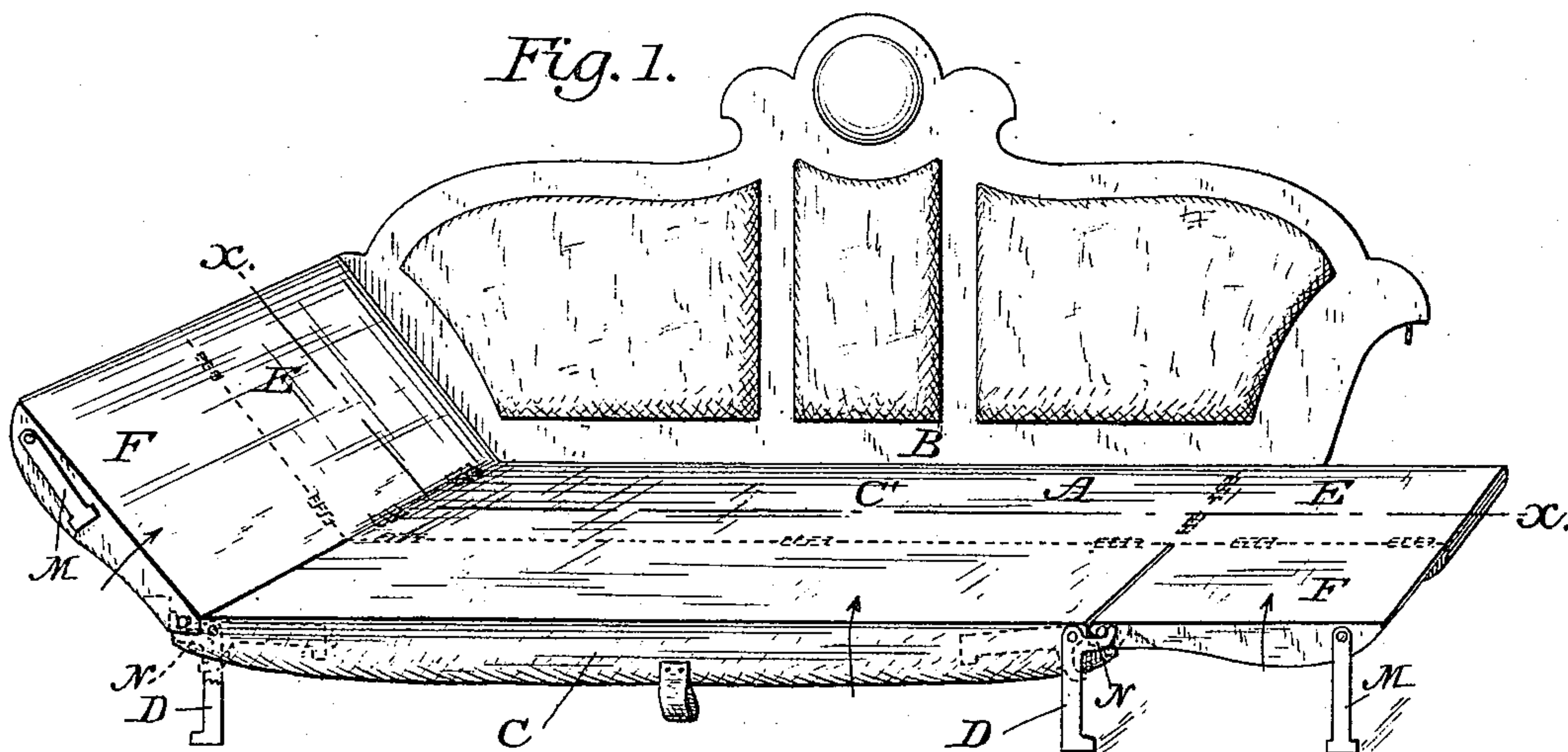


Fig. 2.

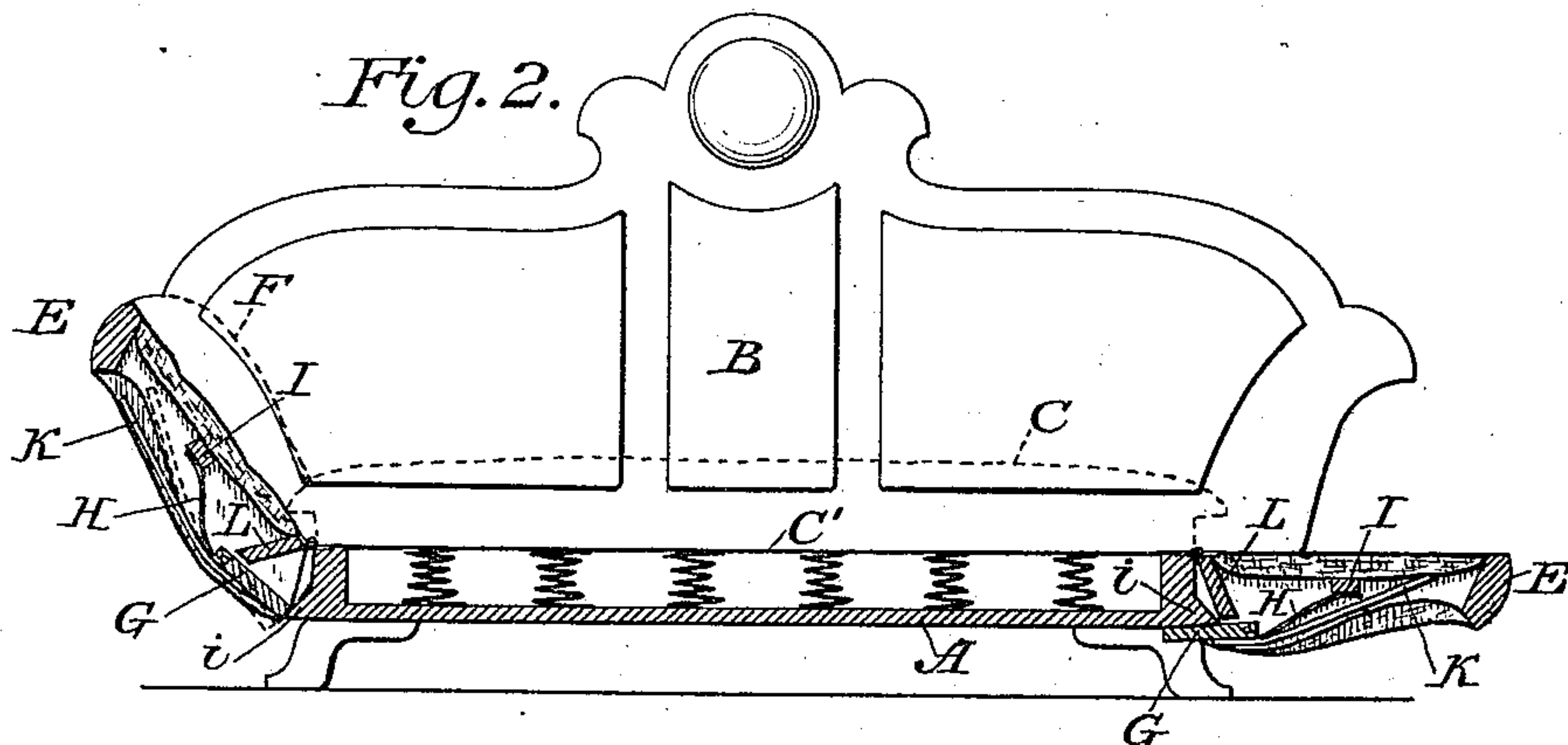
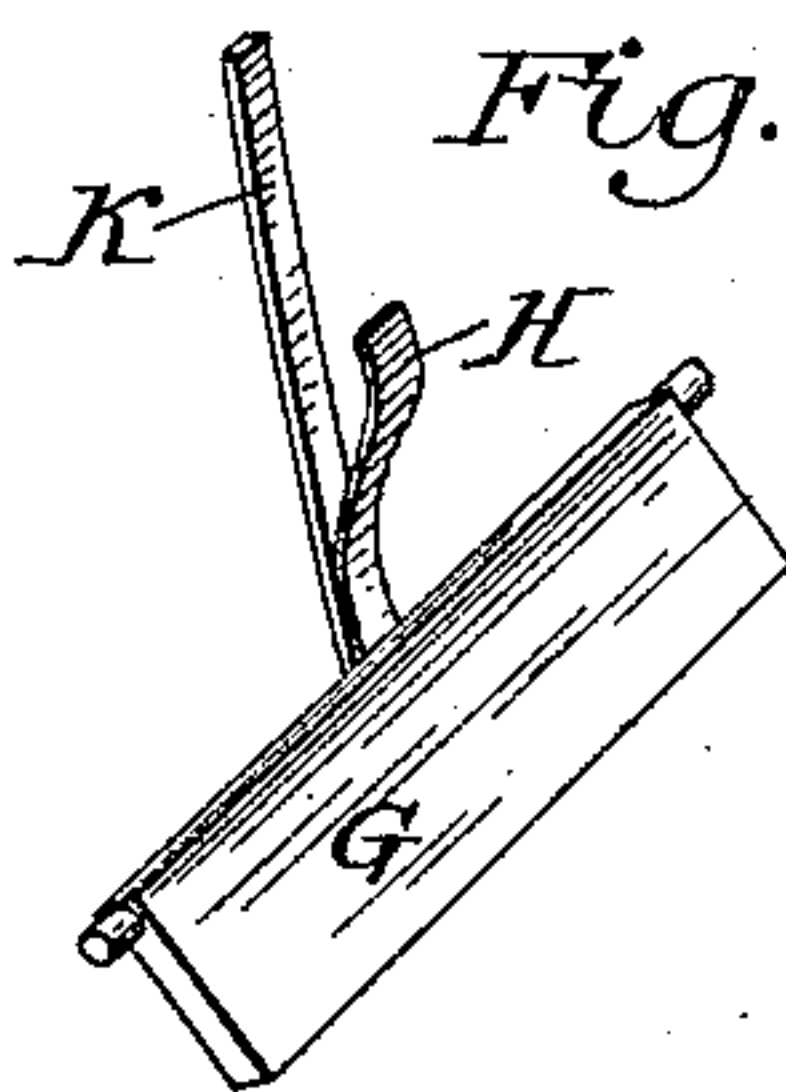


Fig. 3.



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SOFA-BED.

SPECIFICATION forming part of Letters Patent No. 451,172, dated April 28, 1891.

Application filed November 19, 1890. Serial No. 371,898. (No model.)

To all whom it may concern:

Be it known that I, MAX ROSENZWEIG, of the city, county, and State of New York, have invented certain new and useful Improvements in Sofa-Beds; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, making a part of this specification.

This invention relates to that class of sofa-bedsteads in which the seat and the end pieces of the sofa are severally formed each of two hinged pieces, so that both the seat and end pieces may open out to the front so as to double the width of the sofa, the end pieces being, furthermore, hinged to the seat in manner to drop down to a horizontal plane and thereby produce an extension thereof to the length as well as width required in a bedstead.

The object of my invention is to facilitate the transformation of the sofa into a bed and to simplify and strengthen its construction.

It consists in the combination and arrangement, in the sofa-bed, of novel devices, as hereinafter described and claimed, for upholding the hinged end pieces of the sofa and the front division of the seat thereof.

In the accompanying drawings, Figure 1 is a view in perspective of my improved sofa-bed opened out; Fig. 2, a vertical longitudinal section of the same in line $x x$ of Fig. 1; and Fig. 3, a detached detail in perspective, on an enlarged scale, of one of the spring-actuated brace-pieces by which the hinged end pieces of the sofa are supported and adjusted.

A represents the frame, and B the back, of a sofa, which may be of the ordinary form.

The seat C for the sofa is made separate from the seat-frame C', and is hinged thereto longitudinally along its front edge, so as to fold over thereon from the front to complete the sofa-seat, and to open out therefrom to form, in connection therewith, a wide bed-bottom, as shown in Fig. 1.

When opened out, the seat C is supported in a horizontal plane on a level with the seat-frame by means of legs D D, Fig. 1, formed of flat metallic bars pivoted to the front bar of the seat, so as to admit of being swung up

parallel therewith (see dotted lines in Fig. 1) to be out of the way when the seat is folded over upon the seat-frame.

E E are the end pieces for the sofa. These end pieces each carry a folding piece F of substantially the same dimension, hinged thereto so as to fold over thereon. The inner section E of each end piece proper is hinged at its lower edge to one end of the seat-frame C', so as to swing thereon from an upright to a horizontal position, carrying with it its outer or folding section F.

Each end piece E, when adjusted both in its upright or nearly upright position and when lowered to its horizontal position, is supported in that position by means of a transverse plate G, pivoted or hinged at the extremities of its upper edge to the frame of the end piece E, so as to swing upon an axis parallel with the lower edge of said piece. The lower free edge of this swinging supporting-plate G is made to coincide with the lower edge of the end piece and is automatically swung inward, so as to bring the face of the plate into parallelism, or nearly so, with the face of the end piece by means of a flat spring H, interposed between the two. This spring is preferably attached to the upper pivotal edge of the supporting-plate G to project upwardly therefrom and bear against a cross-bar I on the end piece E. When the supporting-plate G is thus held in its normal position by the stress of the spring H and the end piece E is swung up into its right position, as shown at the left in Figs. 1 and 2, its lower edge will bear against the lower edge of the end bar i of the seat-frame C', as shown at the left in Fig. 2, and thus securely brace and uphold the end piece in its elevated position.

To lower the end piece E to a horizontal position the supporting-plate G is turned upon its pivotal axis, so as to swing its lower edge out from against the end bar i far enough to allow it to pass under the bar, as shown at the right in Fig. 2.

To facilitate thus swinging the supporting-plate G, a lever K is attached to the plate, as shown in Fig. 3, to project upwardly therefrom within ready reach, and an inward pressure upon the end of the lever will operate to disengage the supporting-plate from the end

bar *i* and allow the end piece E to drop, as shown at the right in Fig. 2. When the end piece has thus dropped to a horizontal position, it is supported by the contact of a cross
5 end bar L at the foot of the end piece with the end bar *i* of the seat-frame C', as shown at the right in Fig. 2. When the end piece E is thus dropped to a horizontal position to form an extension of the bed-bottom, the front
10 edge of the folding piece F, hinged thereto, is supported at its outer end by a folding leg M, made to drop, as shown, into a vertical position for this purpose, and by an arm N, projecting from the pivoted end of the folding
15 leg D of the seat C in position to engage a pin on the edge of the piece F, as shown in Fig. 1.

By means of my invention all parts of the sofa or sofa-bed are firmly supported in
20 their various adjustments by simple easily-operated devices, both when folded up and closed to serve as a sofa and when opened out to serve as a bedstead.

I claim as my invention--

The combination, in a sofa-bed, of the main 25 seat-frame, a folding end piece hinged at its inner end directly to the end bar of said main frame, a supporting-plate pivoted at either end directly to the folding end piece parallel with the end bar of the main frame, to bear 30 with its lower edge against said end bar as a support for the folding end piece when it is lifted to its upright position, and to swing under said end bar and thereby allow the end piece to drop to a horizontal position, a lever 35 actuating said supporting-plate, and a spring operating automatically to carry the supporting-plate into engagement with the end bar, substantially in the manner and for the purpose herein set forth. 40

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

MAX ROSENZWEIG.

Witnesses:

A. N. JESBERA,
E. M. WATSON.