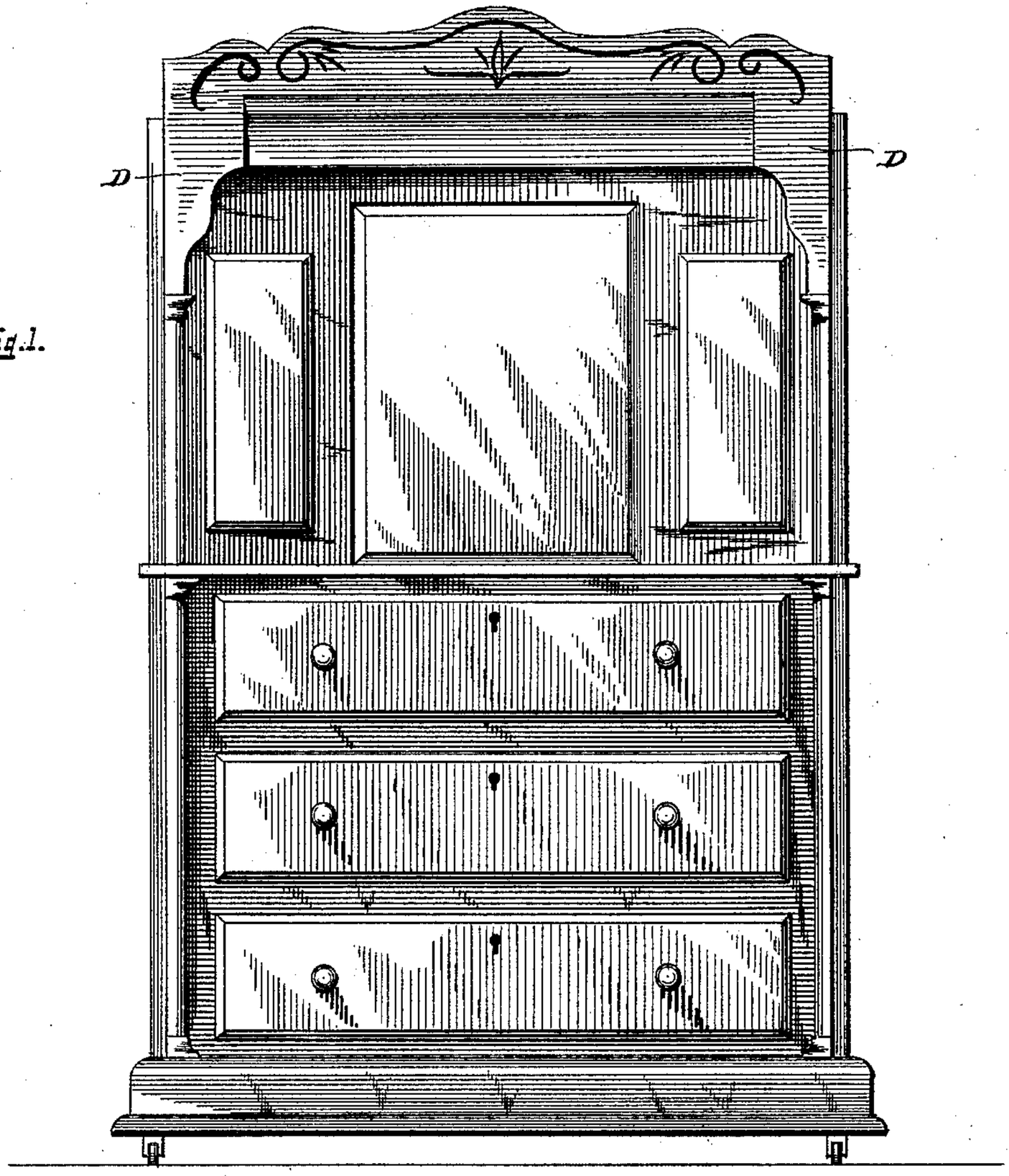
(No Model.) 2 Sheets—Sheet 1.

G. VAN HOOREBEKE & T. E. FORD.

FOLDING BED.

No. 409,527. Patented Aug. 20, 1889.

Fig. 1.



Witnesses:

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(No Model.) 2 Sheets—Sheet 2.

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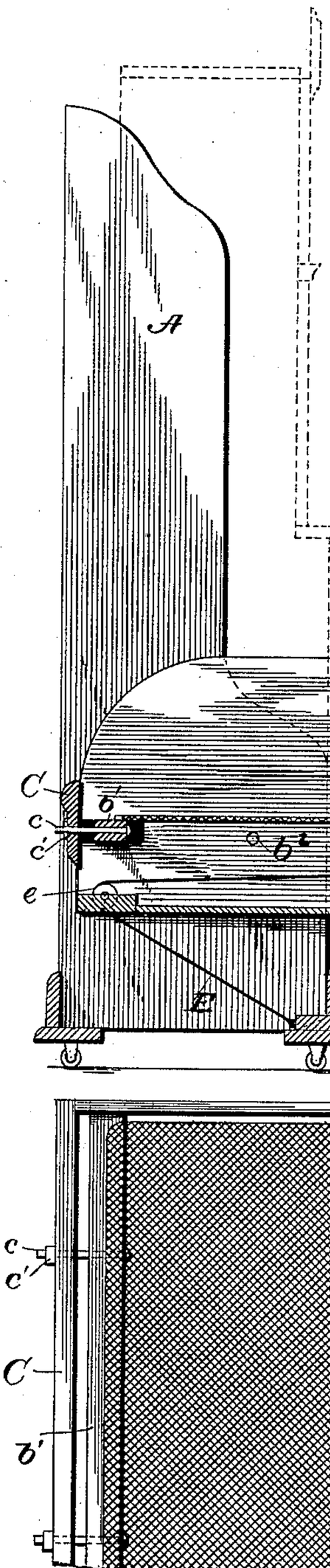

Fig. 2.

Fig. 3.

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UNITED STATES PATENT OFFICE.

GUSTAVUS VAN HOOREBEKE AND THOMAS E. FORD, OF CARLYLE, ILLINOIS.

FOLDING BED.

SPECIFICATION forming part of Letters Patent No. 409,527, dated August 20, 1889.

Application filed December 19, 1887. Serial No. 258,402. (No model.)

To all whom it may concern:

Be it known that we, GUSTAVUS VAN HOOREBEKE and THOMAS E. FORD, of Carlyle, in the county of Clinton and State of Illinois, have invented a new and Improved Combination Folding Bed; and we do hereby declare that the following is a full and exact description of the said invention.

This invention relates to household furniture.

The object of the invention is to produce a folding bedstead which shall be simple in construction, comparatively inexpensive to manufacture, and reliable in use.

With these objects in view the invention resides essentially in a folding bedstead comprising an upright stationary portion, a folding portion pivoted to the upright portion and having legs pivoted to it, and a cord having an interposed spring attached to the legs thereof above their pivoted point and to the stationary portion and passing over the pivoted portion in the rear of the pivoted connection between the stationary and movable portions.

We have illustrated the invention in the accompanying drawings, in which like letters of reference indicate corresponding parts in all the figures, and in which—

Figure 1 represents a front elevation, the bedstead being shown closed, Fig. 2 representing a side elevation, partly in section, showing the folding portion lowered, with the mechanism for opening the legs; Fig. 3, a top plan view of the folding portion, showing the balancing-weight and the draft-screws.

In the drawings, A designates the upright portion, B designating the folding frame constructed of wood or any other suitable material. *b* is a rail rigidly attached to B at the outer end and has fastened to it the wire mattress. *b'* is another rail adapted to slide in slots at the inner end of the frame and carries the bolts or draft-screws, as shown.

C is a heavy strip of metal acting as the balancing-weight, is made larger at the top than at the bottom, and is firmly secured to the frame at the end nearest the stationary portion. In the balancing-weight are perforations through which pass the bolts or draft-screws *c*, carried by the sliding rail *b'*. The wire mattress is stretched between the two rails *b* and *b'*, and is tightened by nuts *c'* on the draft-screws.

The letter b^2 indicates the trunnions, in which the folding frame swings in bearings in the upright stationary portion and may be of any approved construction.

D indicates the folding legs hinged at *d* to the outer end of the frame B. These are made in the form of a frame extending the entire width of the bed, and may be ornamented as desired to make the head of the dressing-case.

E indicates a cord, which is fastened to the base of the stationary portion, passes over the pulley *e*, and is attached to the spring X, from the other end of which another cord *e'* is carried to the folding legs, as shown at e^2 in Fig. 2. The legs are formed with a top piece, to which at e^2 is attached the end of the cord. This point being above the hinge the legs will open and assume the position shown in Fig. 2 when the cord is drawn tightly, while when the folding frame is raised and the cord thereby loosened the legs will close in obedience to gravity. The function of the spring is to compensate for the weight of the folding portion. As this folding portion is lowered, the distance between the point at which the cord or wire is attached and the pulley on the movable part increases, causing the cord or wire to play over the pulley and impose a tension on the spring, gradually increasing as the folding portion descends; consequently more power is required to sustain it. As the portion B rises to a closed position the tension gradually is taken from the spring, and thus sudden closing by the action of the spring is avoided.

By the employment of this spring the heavy weight usually employed for counterbalancing the weight of the movable part of the bed is dispensed with and the cost of the structure materially lessened.

The wire mattress is attached at one end to the rail, which is rigidly secured to the outer end of the frame, and at the other to a rail which is provided with bolts passing through the frame and the weight. It is evident that when the mattress requires to be more tightly stretched the nuts on the bolts must be

screwed up. The bolts, therefore, act as draft-screws, and the nuts thereon have a solid bearing on which to turn. This construction presents the advantage of giving greater strength and stability, and at the same time it facilitates the raising and lowering of the bed and also provides means for keeping the wire mattress properly stretched.

Having thus fully described our invention, what we claim as new, and desire to secure by Letters Patent, is—

1. In a folding bed, the combination, with the upright stationary portion, of the folding portion pivoted thereto, having legs hinged to its end, the cords having the interposed spring and attached to the legs above the hinge and to the stationary portion and passing over the pivoted portion in the rear of the pivotal connection between the stationary and movable portions, substantially as described.

2. In a folding bed, the combination, with the upright stationary portion, of the folding portion pivoted thereto having legs hinged to its end and the weight attached in the rear of the pivot, the cord having the interposed spring attached to the legs above the hinge and to the stationary portion and passing over the pivoted portion in the rear of the pivotal connection between the stationary and movable portions, substantially as described.

GUSTAVUS VAN HOOREBEKE.
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