

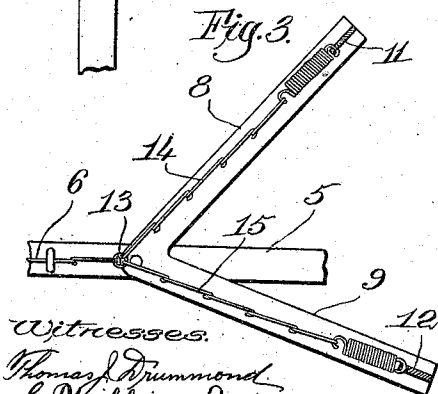
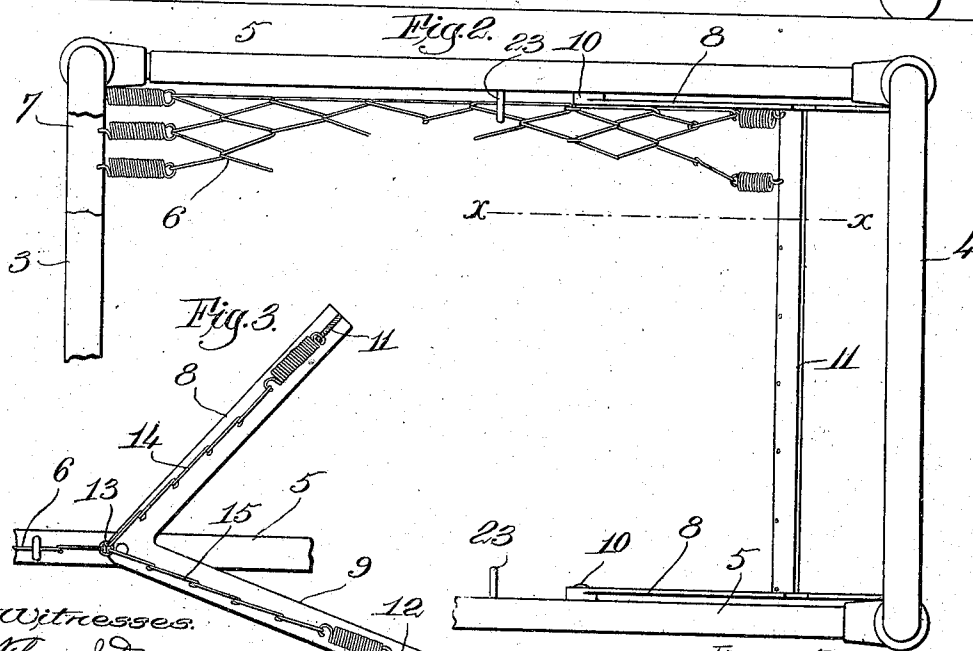
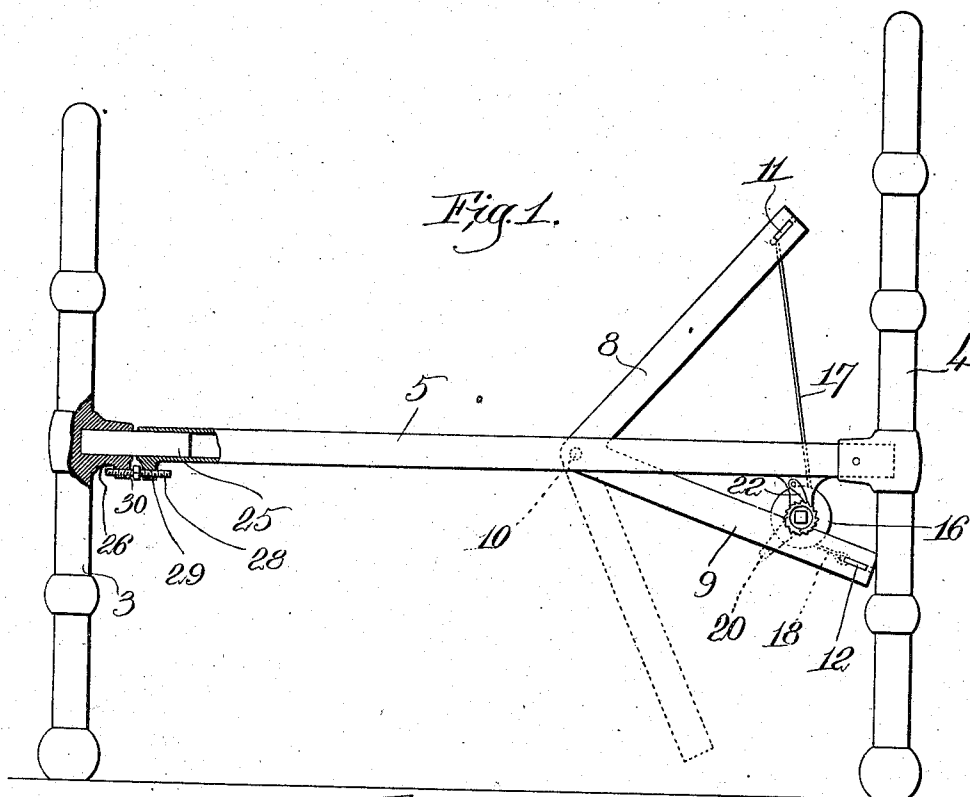
No. 840,616.

PATENTED JAN. 8, 1907.

F. G. GALE.

BED.

APPLICATION FILED APR. 26, 1906.



Witnesses:
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UNITED STATES PATENT OFFICE.

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BED.

No. 840,616.

Specification of Letters Patent.

Patented Jan. 8, 1907.

Application filed April 26, 1906. Serial No. 313,743.

To all whom it may concern:

Be it known that I, FRANCIS G. GALE, a subject of the King of Great Britain, residing at Waterville, Province of Quebec, Canada, have invented an Improvement in Beds, of which the following description, in connection with the accompanying drawings, is a specification, like numerals on the drawings representing like parts.

This invention relates to beds, and especially to that class of beds in which the head end of the woven-wire mattress may be elevated more or less, whereby the head and body of the person occupying the bed may be raised into a reclining or sitting position.

One of the objects of my invention is to provide a novel construction in which approximately the same tension on the woven-wire fabric may be maintained at all times regardless of the position of the adjustable head end of the fabric, all as will be more fully hereinafter described and then pointed out in the claims.

In the drawings, Figure 1 is a side view of a bed embodying my invention. Fig. 2 is a top plan view thereof with one corner broken out; and Fig. 3 is a section on the line *x x*, Fig. 2.

The bed-frame comprises the foot-frame 3, the head-frame 4, and the side rails 5. The wire fabric on which the mattress is supported is designated by 6, and it may be of any suitable or usual construction. As herein shown, it is fastened at one end to a cross-rail 7 of the foot-frame, and at its other end it is carried by a swinging frame pivoted to the side rails 5, whereby the head end of the wire fabric 6 may be raised or lowered by the swinging movement of the frame.

The swinging frame I have herein illustrated is substantially V-shaped, it comprising two V-shaped end members, each having two arms 8 and 9, which are secured together in any suitable way. Each end member is pivoted at its apex to a side rail 5, as at 10, and the arms 8 of the two end members are connected together by a suitable end rail 11, and the arms 9 are connected by a similar end rail 12.

The wire fabric 6 is divided on a transverse line 13, which substantially coincides with the line of the pivotal points 10 of the swinging frame, and one part 14 of the fabric extends from the line 13 to the end rail 11 and another part 15 of the fabric extends from said line 13 to the end rail 12, the two

parts 14 and 15 being connected to the rails 11 and 12 in any suitable way.

When the swinging frame is in its lowered position, as shown in dotted lines, Fig. 1, the part 14 of the divided end of the fabric occupies substantially the same horizontal plane as the main body of the fabric. By turning the swinging frame about its pivot, however, the part 14 of the wire fabric is thrown into an inclined position, depending upon the position of the swinging frame, and if a person is occupying the bed his head can be raised more or less by thus swinging the frame, as will be obvious.

The swinging frame may be raised or lowered in any suitable way. A drum or spool 16 is journaled in bearings carried by the side rails 5, and cords 17 and 18 connect said drum with the end rails 11 and 12, said cords being wound in an opposite direction on the drum, so that when the drum is turned one cord is wound thereon and the other unwound therefrom. The drum may be turned by means of a removable crank 20 (shown in dotted lines in Fig. 1) and may be held in any adjusted position by means of a suitable pawl 22 or in any other suitable way.

By making the wire fabric 6 with the two parts 14 and 15, each of which is connected to the main body of the fabric along the line 13, an even tension may be maintained on the main body of the fabric regardless of the position of the swinging frame, and, further, the movement of the frame does not throw the main body of the fabric out of its normal position. The tension to which the fabric is subjected is transmitted to both of the parts 14 and 15, at the head end thereof, and as these two parts come together along a line which is substantially in line with the pivotal points 10 the swinging movement of the frame does not cause the main body of the fabric to be raised or depressed.

If desired, I may employ guide-eyes 23, projecting from the side rails, and through which the edge, or a portion of the wire fabric 6, passes.

The side rails 5 are herein shown as tubular, and at their rear ends they are telescoped over cylindrical projections 25, extending from the boss 26 on the foot-frame 3. A right and left hand adjusting-screw 28 is screw-threaded through projections 30 and 29 on the foot-frame and side rails, respectively, this adjusting-screw being for the purpose of tightening the wire fabric.

It is not essential to the invention that one end of the divided fabric be connected directly to the foot-frame of the bed, as it will be obvious that the invention may be embodied in a mattress-frame which is separate from the bedstead.

Various changes in the construction of the device may be made without departing from the invention.

10 Having fully described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. A bedstead comprising a foot-frame, a head-frame, side rails, a swinging frame pivoted to the side rails, said frame having two branches, and a wire fabric divided at one end and secured to the two branches of the swinging frame.

2. A bedstead comprising a foot-frame, a head-frame and side rails, a V-shaped swinging frame pivoted at its apex to the side rails, a wire fabric secured at one end to the foot-frame of the bed, the other end being divided and one part being secured to each branch of the V-shaped frame.

3. A bedstead comprising a foot-frame, a head-frame and side rails, a V-shaped frame pivoted at its apex to the side rails, a wire fabric secured to the foot-frame, said wire fabric being divided at one end on a line sub-

stantially in line with the pivots of the V-shaped frame, and one part of the divided end of the fabric being secured to one arm of the V-shaped frame, and the other part on the other arm thereof.

4. A bedstead comprising a foot-frame, a head-frame and side rails, a V-shaped swinging frame pivoted at its apex to the side rails, a wire fabric secured at one end to the foot-frame of the bed, the other end being divided and one part being secured to each branch of the V-shaped frame, and means to raise and lower the frame.

5. In a bedstead, a wire fabric secured at one end to the foot of the bed, said fabric being divided at the other end, and a swinging frame to which the parts of the divided portion of the fabric are secured.

6. In a bed, a wire fabric divided at one end, and a swinging frame having two branches to which the two parts of the divided fabric are secured.

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

FRANCIS G. GALE.

Witnesses:

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