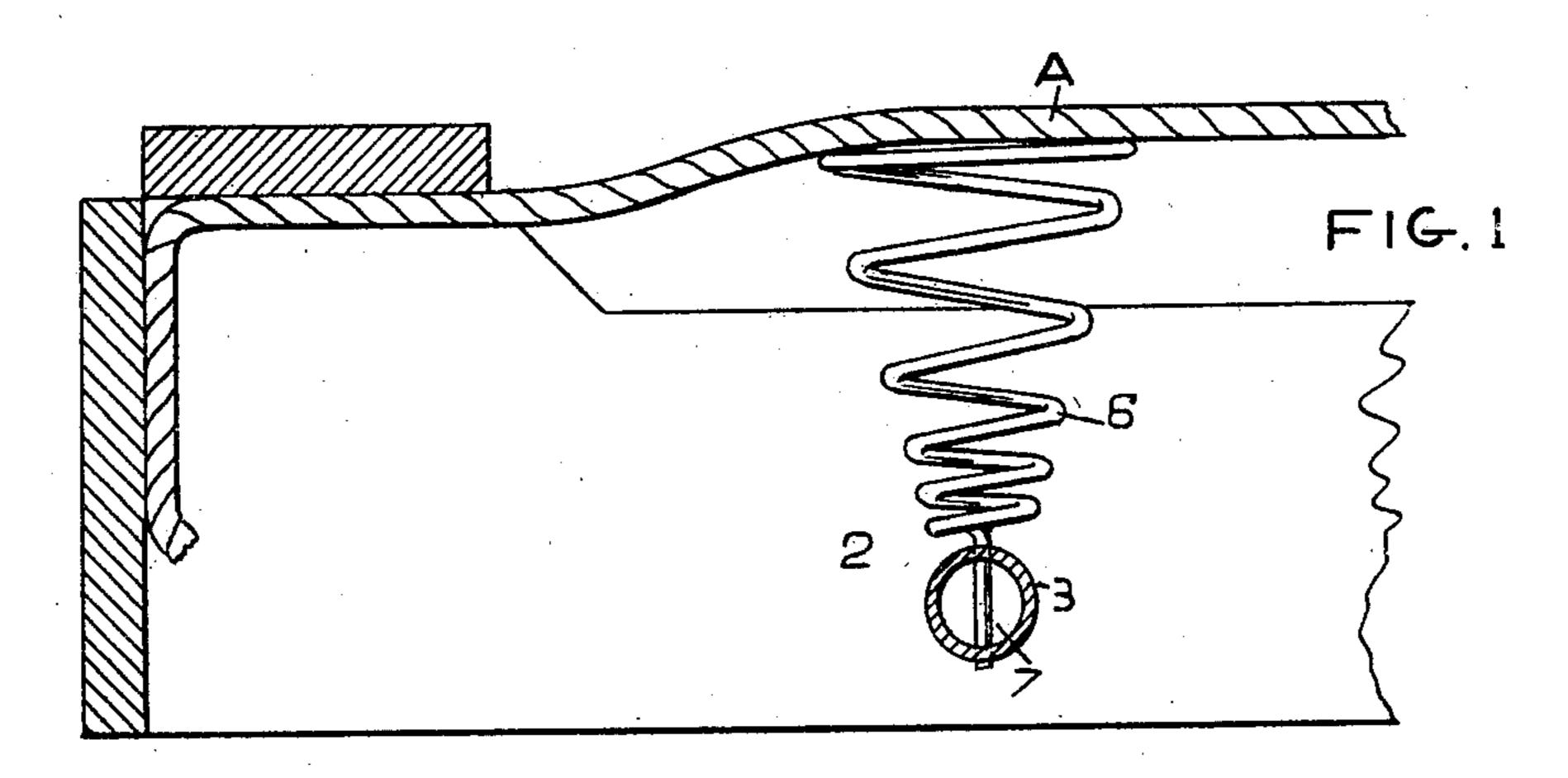
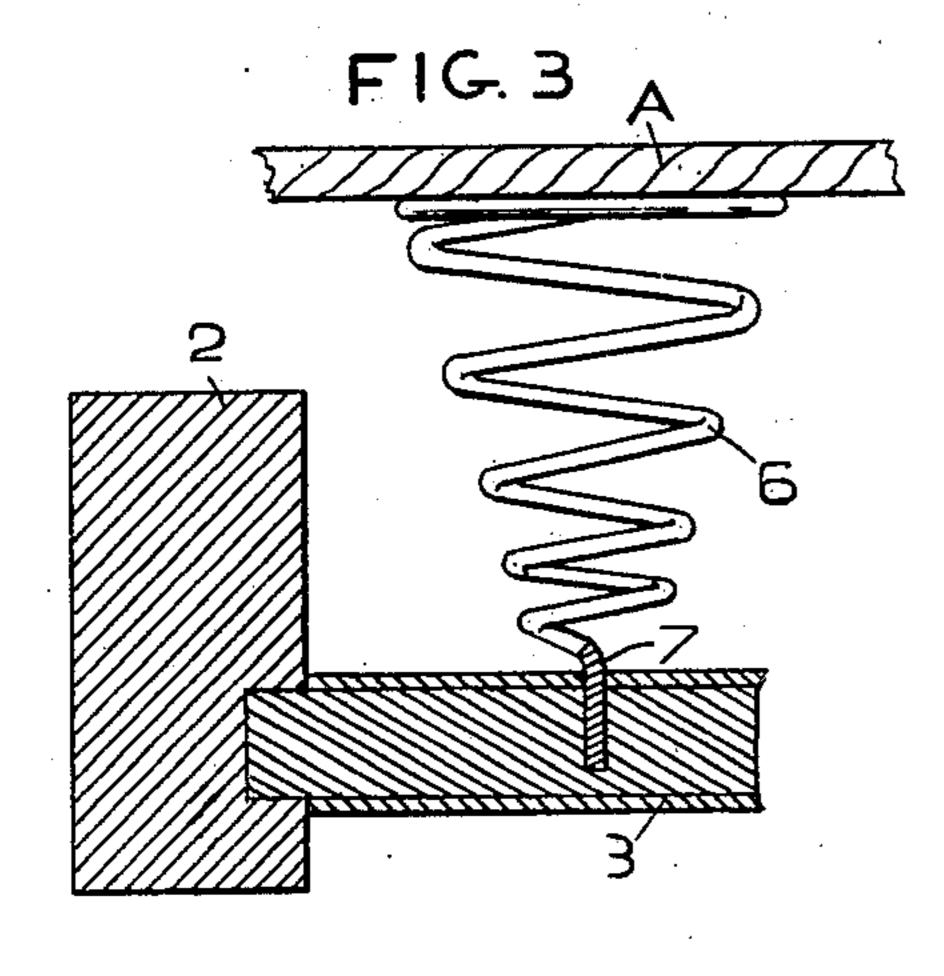
J. HOEY.

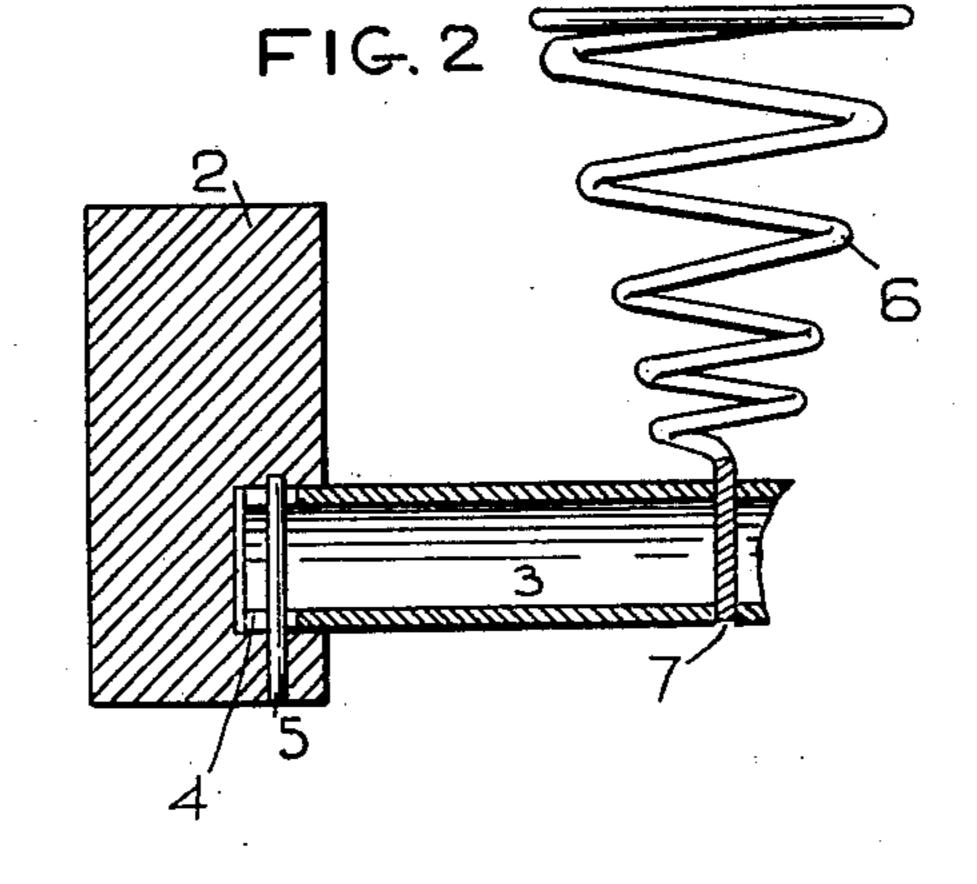
BED BOTTOM AND UPHOLSTERY SUPPORT.

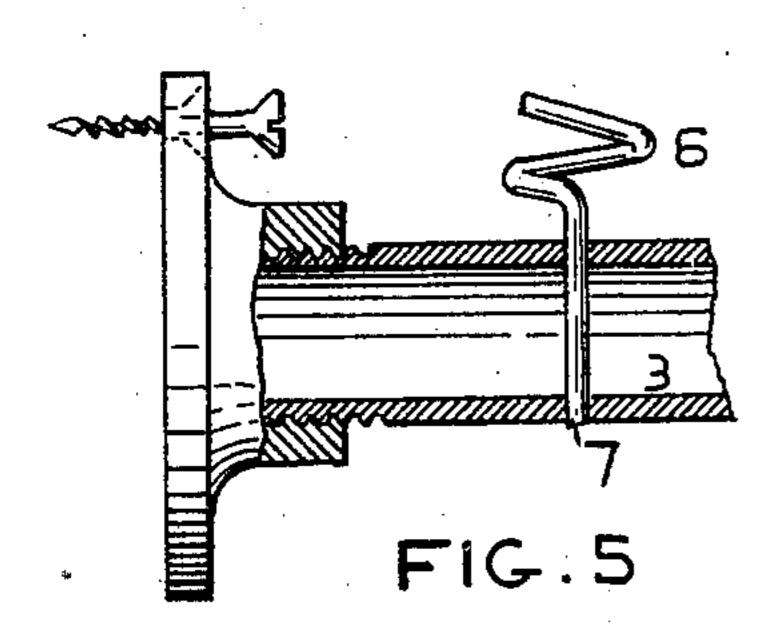
(Application filed June 11, 1901.)

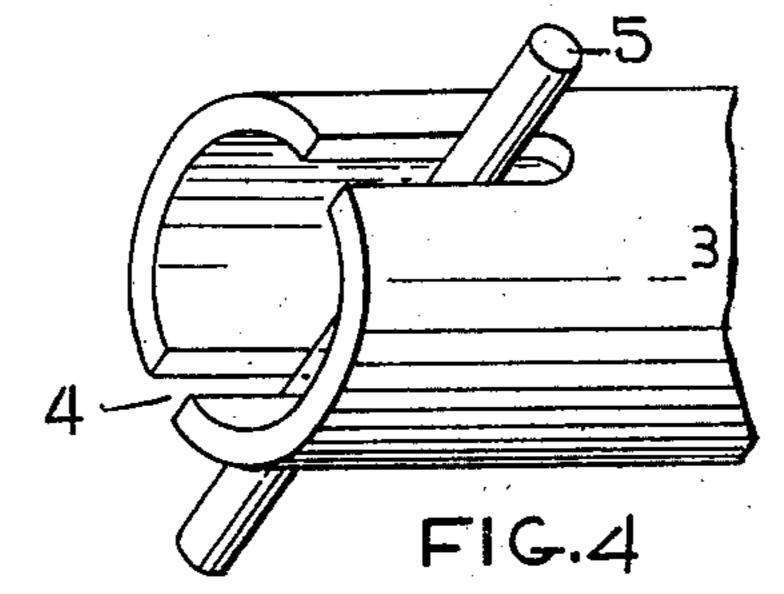
(No Model.)











Witnesses,

By Down Hoey trongtos.

United States Patent Office.

JOHN HOEY, OF SAN FRANCISCO, CALIFORNIA.

BED-BOTTOM AND UPHOLSTERY SUPPORT.

SPECIFICATION forming part of Letters Patent No. 683,175, dated September 24, 1901.

Application filed June 11, 1901. Serial No. 64,100. (No model.)

To all whom it may concern:

Be it known that I, John Hoey, a citizen of the United States, residing in the city and county of San Francisco, State of California, 5 have invented an Improvement in Bed-Bottom and Upholstery Supports; and I hereby declare the following to be a full, clear, and

exact description of the same.

My invention relates to an improvement in to the construction of bed-bottom and upholstery supports; and it consists in the combination, with the spiral supporting-springs, of transverse tubular bars having perforations made through the top and bottom to receive 15 a straight shank formed on the lower end of the spring and by which the spring is maintained in a vertical position. The ends of the tubular bars extend into holes made for them in the side rails of the bedstead, and 20 these are slotted to fit upon pins fixed in the side rails and by which the tubular supports are prevented from turning.

My invention also comprises details of construction, which will be more fully explained 25 by reference to the accompanying drawings,

in which—

Figure 1 is a longitudinal section through one end of the bed-bottom. Fig. 2 is a sectional detail of the spring supporting tube. 30 Fig. 3 is a similar view, the tube being stripped over the usual wooden bar. Fig. 4 shows the manner of preventing the tube from turning. Fig. 5 shows the tube supported by bushings on the inside of the side rails.

In the construction of bed-bottoms it is customary to stretch a woven-wire fabric over the bed-bottom frame and to support this fabric at intervals by spiral or coiled springs the lower ends of which rest upon transverse 40 wooden bars. The strains brought upon these bars frequently break them and make it necessary to repair before the bed can be con-

veniently used.

It is the object of my invention to prevent 45 such breakage, to reduce the size of the supports, and to generally provide an improved construction of the whole device. For this purpose, as illustrated in the present case, the woven-wire mattress A is stretched be-50 tween the end bars of the bed, and at inter-

verse tubular metal bars 3. These may be made of gas-pipe or other suitable material, and the ends are perforated or slotted, as shown at 4, and pins, as 5, may be driven 55 through or into the side rails 2 and through the slots or openings, so as to firmly lock the ends of the tubes and prevent their rolling and also holding them, so that they act to hold the sides of the bed-bottom together. 60 Between the tops of these bars and the surface of the woven-wire fabric A are fitted any suitable number of spiral springs, as at 6. These springs are preferably made conical or smaller at the bottom and enlarging at the 65 top, so as to provide a wide surface of support for the woven-wire fabric. The lower ends of the springs have a straight portion projecting downwardly, as at 7, and this straight part fits in the holes bored through the tubes 70 3, so that if the tube is hollow without any filling these ends can extend across both sides, so that they are braced and the spring is prevented from tipping, while the bar itself being locked by the pin 5 is in a similar 75 manner prevented from tipping or being displaced.

In some cases it may be found desirable to fill the interior of the tube with a wooden rod or body of proper size, and when this is done 80 the end of the rod need not be passed entirely through the two sides of the tube, since the solid interior filling will be sufficient to prevent the spring from tipping upon the rod, because the end will be embedded in this 85 body. A bed-bottom thus constructed is stiffer, provides a better support for the spring, and being of small diameter is not in the way of the spring in its compression and extension under use.

Having thus described my invention, what I claim as new, and desire to secure by Letters

Patent, is—

1. The combination in a bed-bottom of the side and end rails, a woven - wire fabric 95 stretched between said ends, conical spiral springs, the bases of which form a support for the woven-wire fabric, transverse tubular rods extending between the sides, underlying and forming a rigid support for the springs and having their ends fitted to the vals between the side rails 2 extend the trans- | inner sides of the side rails, and having holes

bored through them, and straight extensions at the lower ends of the springs fitting into said holes.

2. The combination in a bed-bottom of the end and side bars, a woven - wire fabric stretched over the top, spiral springs having their axes vertical, upon the upper ends of which the woven-wire fabric is supported, tubular rods extending transversely between the sides and fitted to the inner surfaces thereof, said rods underlying the springs and forming a rigid support therefor and having holes made vertically through them, the lower ends of the springs having straight extensions adapted to pass through the holes

whereby the springs are rigidly held upright.

3. The combination with the bed-bottom, the side and end frames, the woven-wire fabric stretched over the top between the end frames, spiral springs upon the upper ends of which the woven-wire fabric rests, tubular

rods extending transversely beneath the springs and forming a rigid support therefor and having their opposite ends fitting holes in the inner surfaces of the sides of the bed- 25 bottom frame, said tubes having transverse holes or slots near the ends, with pins passing therethrough and also through the side rails and locking them into the side rails, holes made vertically through the tubes and approximately axial with the lines of the springs, said springs having straight extensions from the lower ends fitting into the holes whereby the springs are maintained in an upright position.

In witness whereof I have hereunto set my

hand.

JOHN HOEY.

Witnesses:

W. R. PEASE, CHARLES HOEY.