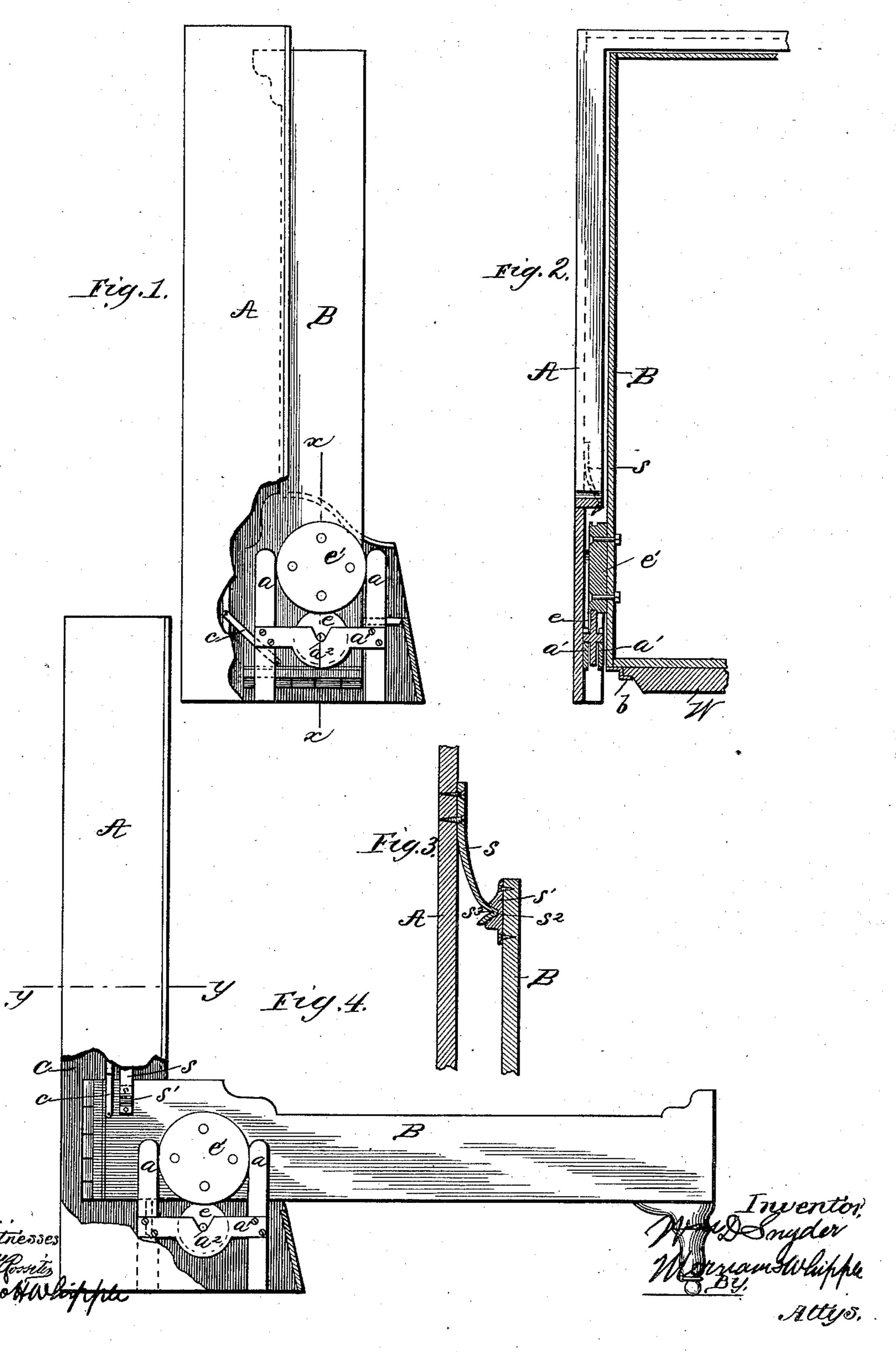
W. D. SNYDER.
WARDROBE BEDSTEAD.

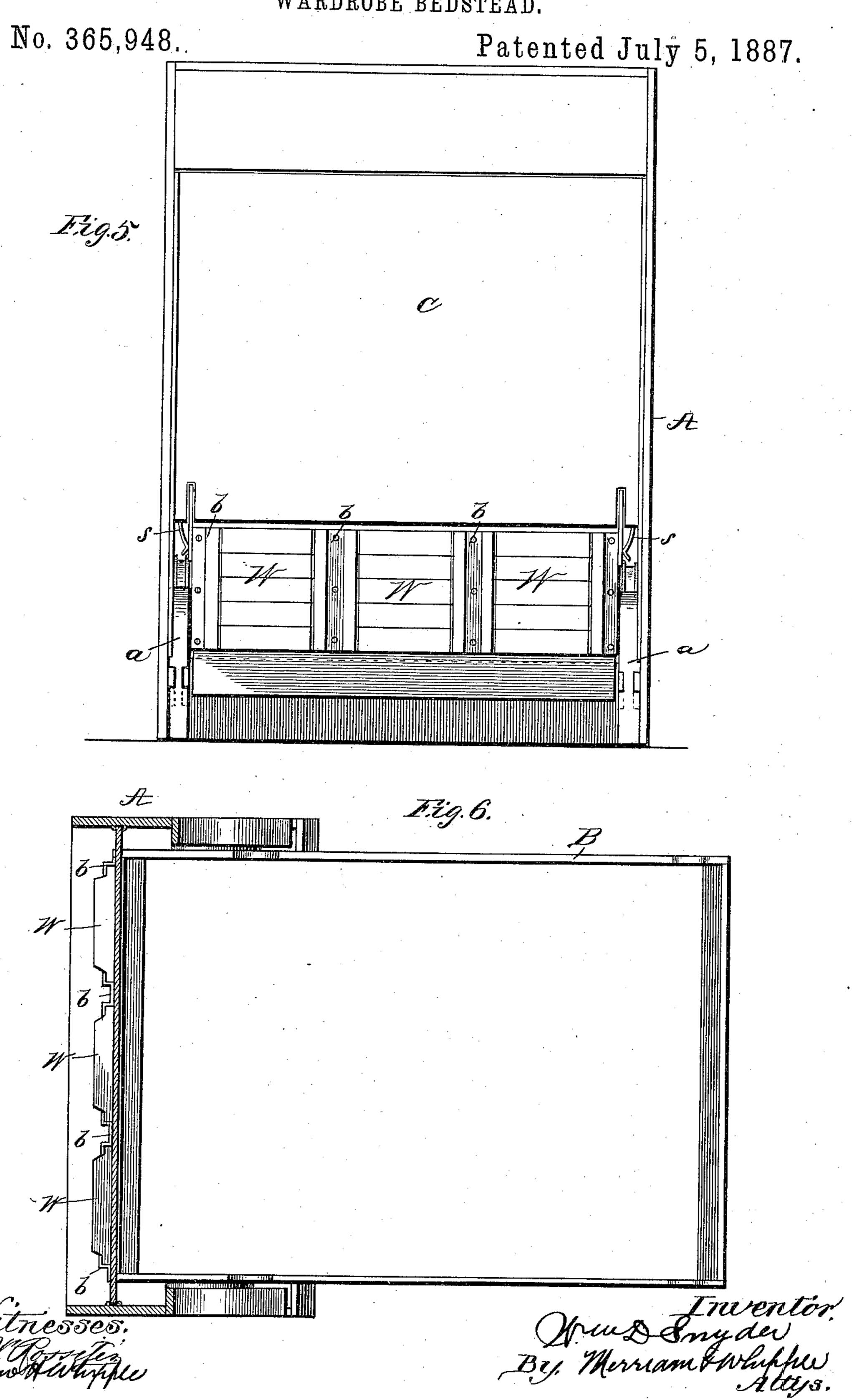
No. 365,948.

Patented July 5, 1887.



## W. D. SNYDER.

WARDROBE BEDSTEAD.



## United States Patent Office.

WILLIAM D. SNYDER, OF CHICAGO, ILLINOIS.

## WARDROBE-BEDSTEAD.

SPECIFICATION forming part of Letters Patent No. 365,948, dated July 5, 1887.

Application filed November 2, 1886. Serial No. 217,769. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM D. SNYDER, of Chicago, Illinois, have invented certain new and useful Improvements in Wardrobe-5 Bedsteads, of which the following is a specification.

My invention relates to improvements in wardrobe bedsteads in which a weight is employed to counterbalance the folding frame; and to the object is to provide a pivotal connection of the stationary and movable frame on which they may move in folding and unfolding with less friction than heretofore, and which will permit them to be readily taken apart. I at-15 tain this object by the mechanism illustrated in the accompanying drawings, in which—

Figure 1 is a side elevation of a closed bed of the class mentioned containing the invention, part of the upright frame being broken 20 away. Fig. 2 is a section taken on line x x of Fig. 1. Fig. 3 is an enlarged sectional detail. Fig. 4 is a side elevation of the bed open, part of the upright frame being broken away. Fig. 5 is a rear elevation. Fig. 6 is a horizontal 25 section on line y y of Fig. 4, the bed being open.

A designates the upright frame, and B the folding frame.

C is the head-board, which slides in grooves 30 in the upright frame, and is connected by a vibrating link, c, to the outside of the folding frame on each side, whereby the head-board is made to slide up and down by the folding and unfolding. On the inside of the upright 35 frame, on each side, there are secured vertical cleats a a and cross-pieces a', provided with a notch or recess,  $a^2$ , in the center or midway between the inner edges of the upright cleats. There is sufficient open space left between the 40 cross-pieces a', so that a thin roller, e, may be placed between them, with its shaft or pin through the center resting in the bottom of the notch or recess  $a^2$  and supporting it, so as to turn freely in the space between, with the 45 upper edge of its periphery projecting above the top of the cross-pieces.

To the outside of the folding frame, upon each side of the bed, are attached grooved disks e', having their lower edges flush with to the bottom edge of the side rail when unfolded.

These disks are attached as a permanent fixture to the side rails, and they should be of the proper size to fit closely between the upright parts a, affording only slight play. They rest upon the upper edges of the rollers e and 55 support the folding frame thereon, the points of contact of the circular edges of the rollers and disks being the fulcra upon which the folding frame turns. The parts a a serve as guides or keepers to maintain the disks directly 60 over the rollers at all times during the opera-

tion of folding and unfolding.

To the head end of the folding frame are attached the weight-holders b, made of metal, with a flat portion adapted to be attached to 65 the flat surface of the end rail by screws and a raised flangesupported a short distance from the rail, affording a narrow space between the face of the rail and the flange, and open at the top, so that the ends of the weights W may be 70 placed therein, and the counterpoise thus readily secured to the end of the folding frame. The weight is thus distributed over the entire surface of the end rail of the folding frame, and when the bed is open the weight is wholly 75 above the fulcrum or point of contact of the disk and rollers; but when the bed is closed the weight is located differently relative to the rollers and disks, it being then beneath the rollers, instead of to one side of them, and that 80 point on the periphery of the disks which is nearest to the weight is brought into contact with the rollers by the disks having been turned a quarter of a revolution in the folding.

To the sides of the upright frame are attached springs s, whose lower ends project sufficiently to come in contact with lugs s', attached to the outside of the folding frame near the head end, which lugs are provided with a 90 flaring socket or recess,  $s^2$ , adapted to receive a lug or bent portion, s3, at the end of the spring, the arrangement being such that as the folding frame is lowered to the floor the lug will strike the inclined or beveled end of the spring 95 and throw it inward until the lugs s<sup>3</sup> come into line with the socket, which takes place simultaneously with the touching of the foot legs of the folding frame on the floor. The lugs then enter the sockets and lock the parts in their 100

open position, so as to prevent the bed from being closed by accident. The lugs or bent portions  $s^3$  at the ends of the springs are inclined or tapered toward the outer end or an-5 gle, so that a slight impulse or lift on the footrail will cause them to be disengaged automatically from the sockets of the folding frame. The counterpoise W exerts its greatest influence when the bed is open, in which position to the maximum of force is required to move the bed, and, being above the fulcrum or plane of the meeting faces of the disks e' and rollers e, it gradually descends during the folding operation until it reaches its position below 15 the rollers, in which only the minimum of force is needed; but during its descent it still bears in the direction of a vertical line through the axis of the rollers. When the bed is nearly closed, part of the weight will have crossed 20 this vertical line, thereby diminishing its effect to such an extent that the bed does not slam shut. This effect is in part secured by the upright cleats a a, one or the other of which in keeping the disks directly over the 25 rollers will come in contact with the disks, as they incline slightly from the highest point of the rollers during the operation, imparting slight friction. The weight and bed are equalized at any angle between the open and the 30 closed position by the changing position of the weight with reference to the fulcrum during the operation of opening or closing, and the slight friction of the parts a on the disks is sufficient to hold the bed at rest in any posi-35 tion between vertical and horizontal at which it may be stopped.

I am aware of the patent to Everitt, No. 332,144, of December 8, 1885, which shows a wardrobe-bedstead having a considerable portion of each of the side rails cut away by a recess and semicircular slot, and having the folding frame supported on three rollers ar-

ranged on an arc upon each side of the upright frame, and admitted through the recess into the semicircular slot and arranged to 45 travel therein as the folding part is operated; but this construction does not contain my invention.

The distinguishing features of my construction over that of Everitt's are the disk at 50 tached to the side rails, made without any recess or slot, the means for maintaining the disk on and directly over a single roller on each side of the bedstead, and the relative arrangement of the guides, rollers, and disks, 55 whereby the folding frame may be readily disconnected from the upright frame by simply lifting the side rails up, so that the disks will be raised above the guides. The advantages of this arrangement are, first, the strengthen- 60 ing of the side rails at the point of their pivotal connection with the upright frame by the attachment of the disks thereto; second, the bed can readily be taken apart without loosening or removing bolts or screws and put together 65 again without the employment of a skilled mechanic; third, the connecting parts are extremely simple and can be cheaply made; and, fourth, the automatic clutch secures the bed from being prematurely closed.

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

In a wardrobe-bedstead, the pivotal connection of the upright and the folding frame, 75 consisting of the rollers e, vertical guides aa, and cross-pieces  $a^2$ , attached to the upright frame, and the disks e', attached to the folding frame and riding on the top of the rollers e, substantially as specified.

WM. D. SNYDER.

Witnesses:

JNO. H. WHIPPLE, J. R. DEAN.