S.C. Maine. Maranobe Bedstead.

Nag1,244. Patented Jun. 15, 1869.

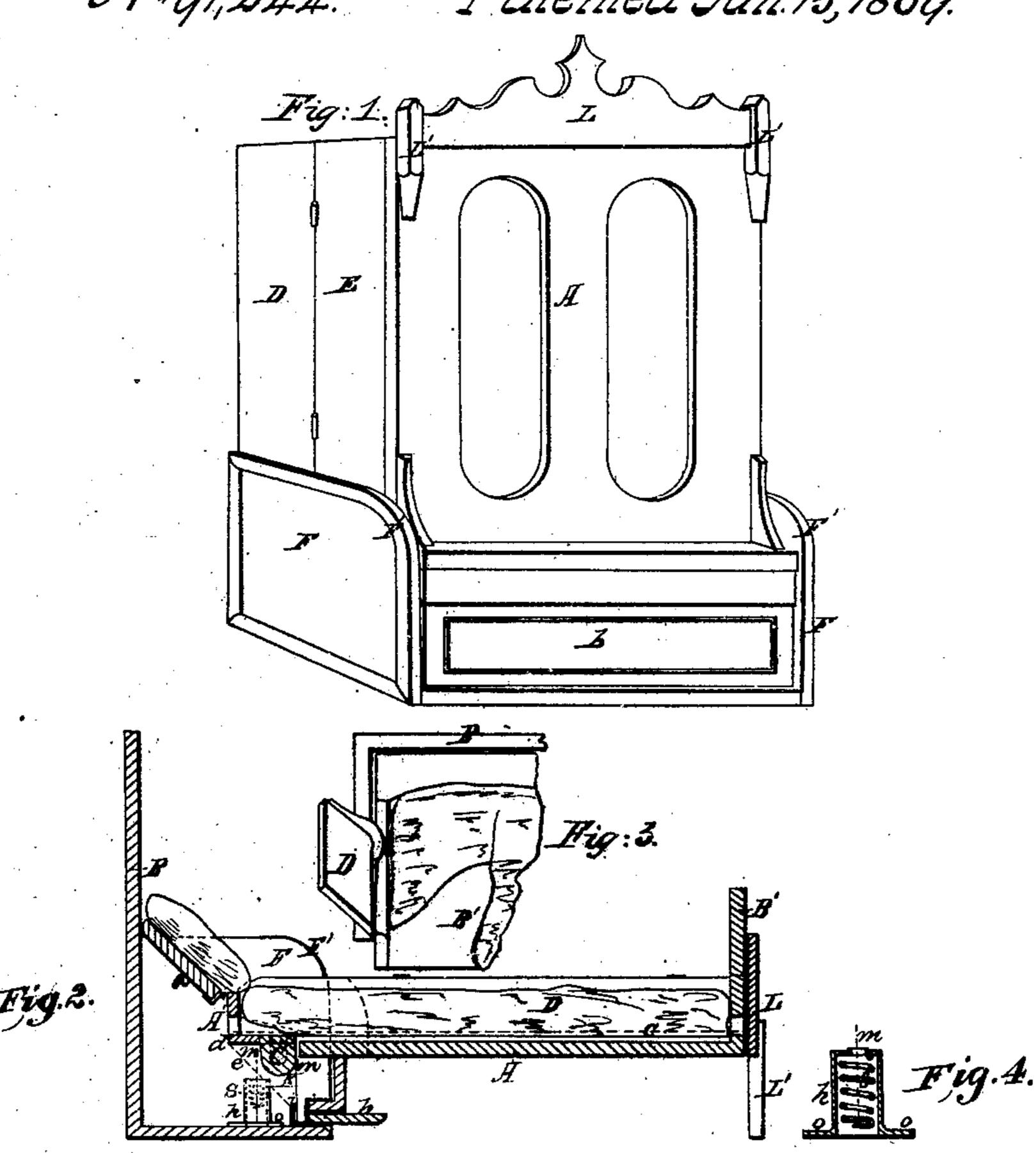


Fig. 6.

Witnesses: M. S. A. Wilde. Austin S. Howarth. Sebemi C. Maine by Cantl Billryfit

UNITED STATES PATENT OFFICE.

SEBEUS C. MAINE, OF BOSTON, MASSACHUSETTS.

IMPROVED CABINET-BEDSTEAD.

Specification forming part of Letters Patent No. 91,244, dated June 15, 1869.

To whom it may concern:

Be it known that I, Sebeus C. Maine, of Boston, county of Suffolk, and State of Massachusetts, have invented an Improved Cabinet-Bedstead; and do hereby declare the following to be a full, clear, and exact description thereof, reference being had to the accompanying drawings, in which—

Figure 1 represents my bedstead folded in perspective. Fig. 2 shows longitudinal section of bedstead extended. Fig. 3 shows sectional plan view of wing or sides being folded. Fig. 4 shows the balancing-spring used in my improved bedstead. Fig. 5 is a rear view of my bedstead, looking to the front, showing op-

eration of wings.

The object of my invention is to produce a cabinet-bedstead that when extended there shall be no appearance of a case left standing, and that when folded the bedstead shall be cased and have the appearance of being a book-case, secretary, or kindred piece of furniture, with no resemblance to a bedstead; and to so construct a cabinet-bedstead to secure these results that the case shall be self-closing—that is, shall close automatically when the bedstead is turned up—and also that the casing shall be removed when the bedstead is turned down, and the closing and opening of the case be done by the movement to turn up or extend the bedstead.

The nature of my invention consists in an automatically opening and closing case—that is, opening and closing without special atten-

tion.

In the drawings, A is the bottom of the bedstead, being the front of the cabinet when bedstead is turned up. B is the head-board, B' the foot-board, of the bedstead. F is an arm or side to a case, containing supports for shaft or roller, together with spring for balancing the bedstead. F has rounded corners F'. D is a wing attached by hinges to the side E of the bedstead. G is a roller or shaft fixed to lower part of bedstead, and turning in supports K.

For balancing the bedstead, in order to facilitate the raising and lowering of the same, I use the springs and shaft or roller patented by myself, in patent for cabinet-bedstead, March 19,1867, or the device shown in the drawings—that is, coiled spring S, contained in receptacle

h, which is fastened by a lip, o, to the bottom of the case F.

The strap, chain, or cord m is attached to the lower part of the spring S, and extends up through the spring and through the top of case h, then winds around the shaft G, as shown in Fig. 2; or this strap may be attached to the bedstead-frame at any convenient part. The spring is shown in its contracted condition. Now, when it is desired to raise the bedstead, a slight outlay of strength at the foot will carry it to its upright position, (shown in Fig. 1,) for the action of the spring is to draw the bedstead up. The spring also retards the motion in extending the bedstead, so that no special amount of strength is required to hold the bedstead from coming down too rapidly. The spring S and case h are shown more plainly in Fig. 4.

a is a shelf, attached by hinges to the end of the bedstead-frame A'. This shelf serves to hold pillows when the bedstead is extended, and to close the space between the bedsteadframe and the head-board. b is a door or lid, which closes the space below the bedsteadframe when the bedstead is up. The shelf a

and lid b act automatically.

L is a finish when the bed is up; but it has the supports L' attached to each end. This part is attached to the foot end of the bed-stead-frame by hinges, and when the bedstead is lowered it assumes the position shown in Fig. 2, and the supports L' become the legs of the bedstead. This action is secured by means of the strap c extending from i to L. When the bedstead is lowered the strap c draws around the end of the bedstead-frame at d, and brings the finish L and supports L' to the position shown in Fig. 2.

The construction of my improved bedstead having been described, its operation is as follows: The bedstead is closed or turned up, as in Fig. 1. Its appearance now is that of a book-case, secretary, or kindred piece of furniture, in any style of finish and design which may be desired. When it is wished to extend the bedstead, lower the whole by drawing the bedstead to the front from the top. The wings D gradually and quietly fall to the side of the bed-frame. The shelf a rises and takes the position shown in Fig. 2. The finish L and supports L' are drawn to a perpendicular position,

and the whole is in the form and position shown in Fig. 2, and the only exertion required is to gently draw the bedstead to the front and lower the same. No attention is needed to the perfect action of the wings and other parts.

In turning the bedstead up a light lift under the foot will, with the action of the spring, carry the bedstead to its upright position.

In turning up, the wings D are closed by means of the rounded arm F acting upon the scarfed end of the wings. This action is shown more plainly in Fig. 3. The action of the rounded arm F upon this scarfed surface of the wing produces a winding or screw motion and turns the wing to place. These wings may be so constructed as to be adjusted by hand and held by buttons or other convenient means; but the same results as sought by the automatic action will be accomplished.

In turning the bedstead up the lid b falls to its place, shelf a takes its proper position, holding the pillows and bed clothing from falling to the commode-space at the bottom of the cabinet. Thus by one movement, as in extending, the bedstead is turned up into a case.

The advantages of this invention are apparent. No cumbrous case is left when the bed is extended, but only a neat French bedstead is seen. It can be cheaply constructed, enabling persons of moderate means to secure it. as one of the greatest disadvantages of all other cabinet-beds is their great expense, even the cheapest of them. Ease of action in extending and raising is a great desideratum in cabinet-beds, which I claim to have perfected; and by the adjustment of the cord or chain, or whatever may be used, which is attached to the spring and winds about the shaft G, I can the latest the balance my bed at any height, so that no mat- | Austin S. Howarth.

ter what changes may be made in the character of the bed-clothing, the change need not interfere with the balance of the bed. The peculiar construction of the spring and its case (shown in Fig. 4) enables me to secure this nice adjustment.

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

Patent, is— 1. A folding or cabinet bedstead operating automatically as to the casing, so constructed that when the bedstead is extended no upright case remains, substantially as described.

2. The wings D, operating in combination with the arms F, substantially as set forth.

- 3. The combination of the spring S, case h, and strap or cord m, as and for the purpose herein described.
- 4. The combination of the spring mechanism above mentioned with shaft or roller G and bed frame or bottom A A', as set forth.
- 5. The combination of automatically-operating shelf a and door b with the bed-frame A A', as described.
- 6. The combination of cord c, bed-frame A, and finish L, having supports L', substantially as described.
- 7. The combination of all the above-named parts in an automatically or otherwise operating cabinet-bedstead in which the case is removed when the bedstead is extended.

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

S. C. MAINE.

Witnesses:

CARROLL D. WRIGHT,