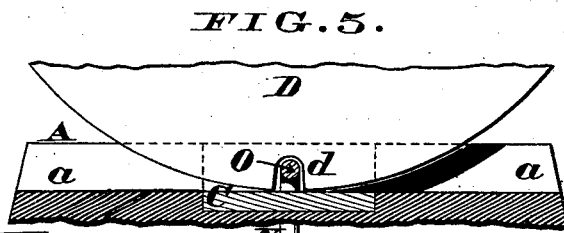
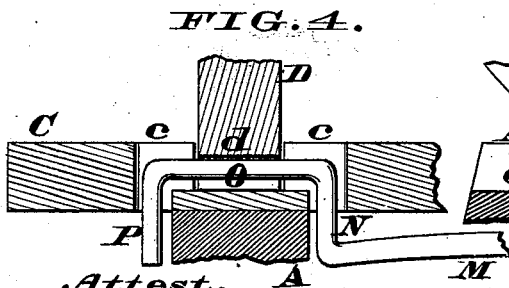
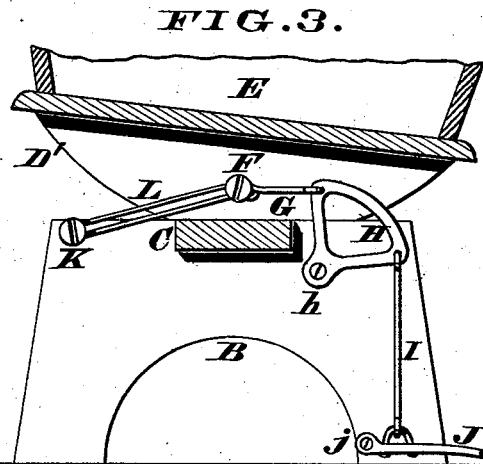
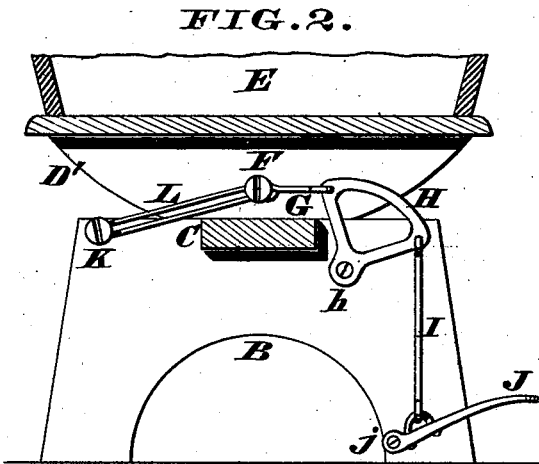
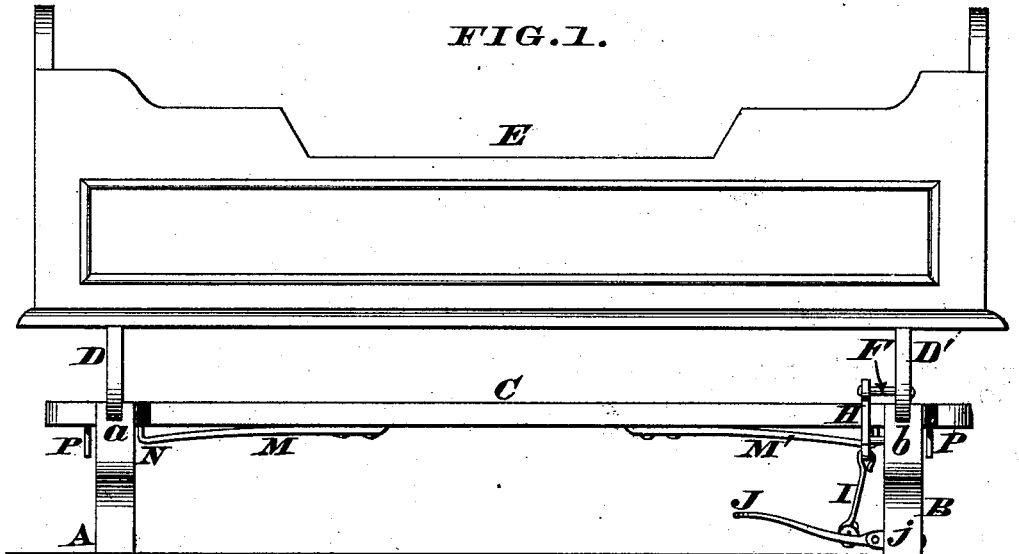


E. WHITEHEAD.
Cradle.

No. 208,052.

Patented Sept. 17, 1878.



Attest.
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UNITED STATES PATENT OFFICE.

EDWARD WHITEHEAD, OF CINCINNATI, OHIO.

IMPROVEMENT IN CRADLES.

Specification forming part of Letters Patent No. **208,052**, dated September 17, 1878; application filed July 29, 1878.

To all whom it may concern:

Be it known that I, EDWARD WHITEHEAD, of Cincinnati, Hamilton county, Ohio, have invented certain new and useful Improvements in Cribs or Cradles, of which the following is a specification:

This invention relates to those cradles or cribs which are adapted to rock on supporting stands or bases; and the first part of my improvements comprises a novel treadle attachment, which attachment consists, essentially, of a pedal, connecting-rod, bell-crank, link, and elastic band or thong, all combined and adapted to operate as hereinafter more fully described.

The second part of my invention consists in mounting the rockers on springs or cushioned supports applied longitudinally of the base-stretcher, which method of applying the cradle to the base allows the former to rock with the utmost ease, and also prevents any jar or concussions, as will appear hereinafter. Furthermore, this construction permits the ready removal of the cradle from the base when it is desired to rock the former on the floor, the rubber band and link having been previously disengaged from the screw or pin to which they are normally applied.

In the accompanying drawing, Figure 1 is a side elevation of a crib or cradle embodying my improvements. Fig. 2 is an enlarged transverse section of the same, the cradle proper being shown in its normal position. Fig. 3 is a similar section, but showing the cradle rocked to the right. Fig. 4 is a vertical section of one of the rockers, taken in the plane of the supporting-spring; and Fig. 5 is another vertical section, but taken at right angles to said spring.

The supporting base or stand consists, essentially, of two standards, A B, securely united together by a longitudinal stretcher, C, the upper portions of said standards being grooved respectively at *a b* to receive the rockers D D', which latter are attached to the crib or cradle body E. Projecting inwardly from rocker D' is a ring-eye or screw, or other convenient device, F, to which is applied one end of a link, G, the other end of said link being connected to a bell-crank, H, pivoted at *h* to standard B. Depending from this bell-crank is a connecting-rod, I, that takes hold of a pedal or treadle,

J, pivoted at *j* to the aforesaid standard. This treadle may be disposed longitudinally of the cradle, as seen in Fig. 1, or it may project laterally from the standard, as represented in Figs. 2 and 3. Projecting inwardly from this standard B is a pin, or screw, or staple, or other device, K, around which and around pin F is passed an endless band or thong, L, of india-rubber or other elastic material; but, if preferred, a spring may be substituted for this thong.

The above-described treadle attachment may be applied to any form of crib or cradle or other article of furniture capable of rocking on a supporting stand or base, as seen in Figs. 2 and 3; but in order to enhance the utility of such cradles, I prefer to couple the body D D' E to the standards A B in the following way: Secured to the under side of stretcher C, and disposed longitudinally of the same, are two spring-bars, M M', whose outer or free ends are bent upwardly at N, thence horizontally at O, and finally carried down at P, which portions N O P of said springs occupy suitable mortises in the stretcher, one of said mortises being shown at *c* in Fig. 4. If preferred, these mortises may be provided with metallic boxes or bushings to prevent wear. Each rocker D D' is notched, as at *d*, so as to rest upon the horizontal portions O of the springs, as clearly shown in Figs. 4 and 5.

In constructing my cradle the tension of band L should be such as to preserve the body E in its normal or horizontal position, in which position the treadle J is elevated, as seen in Fig. 2. As soon as the treadle is depressed bell-crank H swings upon its bearing *h* and rocks the cradle to the right, as seen in Fig. 3, the elastic band L yielding readily to permit such an oscillation of the body. Pressure being now removed from said treadle, the band L exerts its force and rocks the cradle to the left, thereby elevating said treadle and leaving it in a proper position to be again depressed by the attendant's foot. As treadle J, connection I, bell-crank H, link G, and band L are all coupled together, it is evident they must move in unison, and consequently there is no danger of one of said devices interfering with either of the others. It is also evident that

said devices G, H, I, J, and L perform their various duties without producing any jar or concussion of the cradle E.

Another great advantage results from mounting the rockers D D' upon the spring-bearings O, as said rockers are thereby permitted to oscillate within their respective grooves *a b*, while at the same time said members D D' are elastically supported. This elastic support of the cradle enables the members D D' to have the necessary vertical play as they rock from side to side, and it also prevents any noise or jar at the termination of each stroke. Furthermore, this construction permits the ready removal of the cradle by simply lifting rockers D D' out of their respective grooves *a b* after the band L and link G have been unhooked from the screw or pin F. The portions P of the springs M M' may be omitted, if desired.

I claim as my invention—

1. In combination with a crib or cradle adapted to rock on a supporting base or stand, the pins F K, link G, bell-crank H *h*, connecting-rod I, treadle J *j*, and elastic band L, substantially as herein described, and for the purpose set forth.

2. In combination with a crib or cradle adapted to rock on a supporting stand or base, the notched rockers D D' *d* and spring-bars M M', which latter are bent at N O, in order that said rockers may be supported upon the horizontal portions O of said bars, substantially as herein described, and for the purpose set forth.

3. The notched rockers D D' *d* of a crib or cradle, in combination with elastic or yielding supports O, applied to the stand or base of said cradle in such a manner as to permit the ready removal of cradle E by simply lifting said rockers out of their respective grooves *a b* and unhooking the rubber band and link from the screw or pin to which they are normally attached, substantially as herein described, and for the purpose set forth.

In testimony of which invention I hereunto set my hand.

EDWARD WHITEHEAD.

Witnesses:

JAMES H. LAYMAN,
GEO. H. KOLKER.