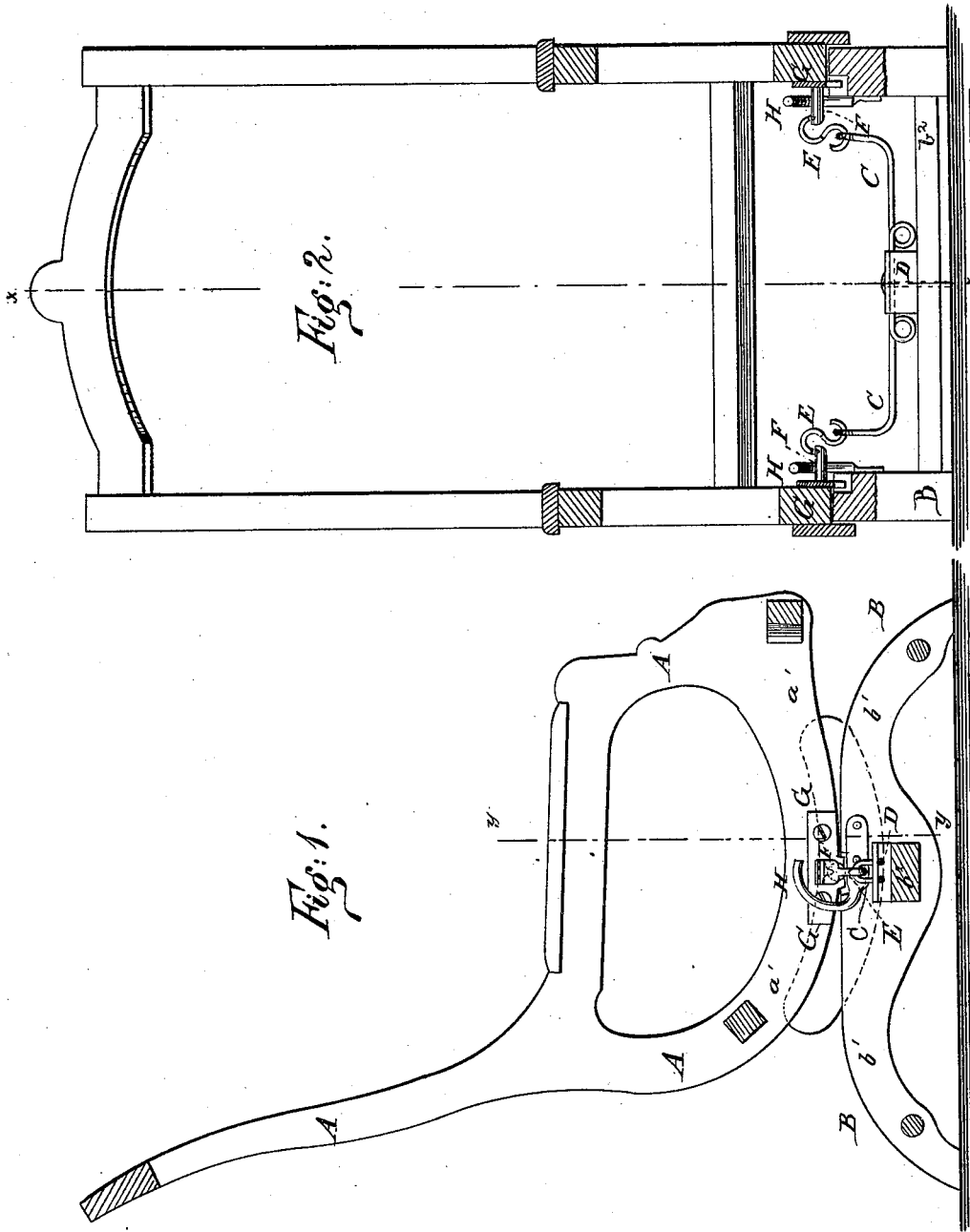


J. KRAPP.  
Rocking-Chair.

No. 199,212.

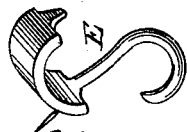
Patented Jan. 15, 1878.



WITNESSES:

*Chas. Nida.*  
*J. H. Scarborough.*

Fig. 3.



INVENTOR:

*J. Krapp.*  
BY *Merrill*

ATTORNEYS

# UNITED STATES PATENT OFFICE.

JOHN KRAPP, OF BROOKLYN, E. D., NEW YORK, ASSIGNOR TO MARTIN J. GROSSMAN, OF NEW YORK CITY.

## IMPROVEMENT IN ROCKING-CHAIRS.

Specification forming part of Letters Patent No. **199,212**, dated January 15, 1878; application filed October 30, 1877.

### *To all whom it may concern:*

Be it known that I, JOHN KRAPP, of Brooklyn, in the county of Kings and State of New York, have invented a new and useful Improvement in Spring Rocking-Chairs, of which the following is a specification:

Figure 1 is a vertical section of my improved chair, taken through the line *x x*, Fig. 2. Fig. 2 is a vertical section of the same, taken through the line *y y*, Fig. 1. Fig. 3 is a detail perspective view of the connecting-hook.

Similar letters of reference indicate corresponding parts.

The object of this invention is to furnish a rocking-chair provided with springs, so arranged as to bring the chair back to an upright position as it moves forward and back in rocking, and which shall be simple in construction, and not liable to break or get out of order.

The invention consists in the combination of the stop-hooks with the pins, the double or **S** hooks, the springs, and the chair and base, as hereinafter fully described.

A represents the frame of the chair, the lower edges of the lower side bars *a'* of which are rounded off to serve as rockers. B is the base, pedestal, or platform, the upper edges of the side bars *b'* of which are rounded off to serve as stationary rockers for the rockers *a'* to rock upon. C are two wire loops, the ends of which are clamped or otherwise secured to a block, D, attached to the center of the central cross-bar *b<sup>2</sup>* of the base B. In the wires of the

loops C at the sides of the block D are formed coils, to give them greater elasticity. The outer parts of the loops C are bent upward nearly at right angles, and are hooked upon the lower hooks of the **S** or double hooks E. The upper part of the double hooks E are made wide, and with a point upon the center of their ends, which point rests in a small socket in the upper side of the ends of the pins F. The pins F are formed upon or attached to plates G, which are attached to the inner sides of the middle parts of the rockers *a'*.

Upon the lower edges of the plates G are formed lugs, which enter notches in the bars *b'*, to prevent the chair A from having a sliding motion upon the base B.

H are hooks, attached to the long base *b'* and curved above the pins F, for the said pins to strike against, and thus prevent the chair A from rocking too far in either direction.

With this construction the double hook E gives perfect freedom to the chair in both directions when rocking.

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

The combination of the stop-hooks H with the pins F G, the double or **S** hooks E, the springs C, and the chair A and base B, substantially as herein shown and described.

JOHN KRAPP.

Witnesses:

WM. BERNARD.

WILLIAM ECKEL.