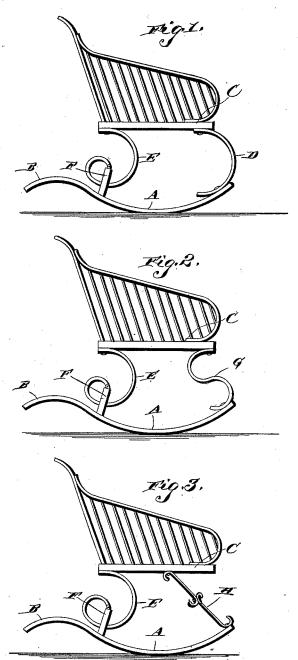
(No Model.)

## C. L. JOHNSON. ROCKING CHAIR.

No. 421,284.

Patented Feb. 11, 1890.



Witnesses Of Taylor Jevgarner

Inventor Charles L. Johnson.

By Kis attorneys

## UNITED STATES PATENT OFFICE.

CHARLES LUCIEN JOHNSON, OF AUGUSTA, GEORGIA, ASSIGNOR OF THREE-FOURTHS TO GEORGE N. BARNES, CLARENCE G. HARMON, AND CHARLES H. AMES, OF CORRY, PENNSYLVANIA.

## ROCKING-CHAIR.

SPECIFICATION forming part of Letters Patent No. 421,284, dated February 11, 1890.

Application filed May 18, 1888. Serial No. 274,281. (No model.)

To all whom it may concern:

Be it known that I, CHARLES LUCIEN JOHNSON, a citizen of the United States, residing at Augusta, in the county of Richmond and State of Georgia, have invented a new and useful Improvement in Rocking-Chairs, of which the following is a specification.

My invention relates to an improvement in rocking-chairs; and it consists in the peculiar construction and combination of devices, that will be more fully set forth hereinafter, and particularly pointed out in the claims.

In the accompanying drawings, Figure 1 is a side elevation of a rocking-chair embodying my improvements. Fig. 2 is a similar view of a modified form of the same. Fig. 3 is a similar view of another modified form of the same.

A represents the rockers, which are made 20 of resilient material—such as bar-steel, wood, or other material—and are curved, as shown, and have downwardly-curved arms B at their rear ends.

C represents a chair seat or body.

D represents semicircular springs, which have their upper ends secured under the front corners of the seat or body and their lower ends secured on the front ends of the spring-rockers, and E represents convolute
 springs, which have their upper ends secured under the rear corners of the seat or body and their lower ends pivotally connected to vertical arms F, that project from the upper sides of spring-rockers at a suitable distance
 from the rear ends thereof.

A rocking-chair thus constructed is adapted to rock with a very free, easy, and buoyant motion, is cheap and simple, and highly orna-

mental in appearance.

In Fig. 2 I illustrate a modified form of my invention, in which I substitute S-shaped springs G for the springs D, and in Fig. 3 I illustrate another modified form of my invention, in which I employ S-shaped springs H, having convolutions at their ends, the lower ends of said springs H being connected to the front ends of the rockers and the up-

per ends of said springs being secured under the center of the chair-seat.

I have filed two other applications which 50 bear somewhat on this invention. They are known as "Cases A and E," and serially numbered, respectively, 274,278 and 274,282. The difference between the present invention and the others is this: In Case A the rockers have 55 interal curved extensions at their front ends to connect with the under side of the chairbody, while in the present case the rockers are connected to the chair-body at the front by separate springs; also, in Case E the rear 60 spring connecting the chair to the rockers is entirely different in construction and mode of attachment from the rear spring in the present case. In the present application only Cshaped springs are used as a rear connection 65 between the seat and the rockers, and these springs are pivotally connected to the rockers; but in Case E, any of the various combinations of springs can be employed to advantage.

Having thus described my invention, I 70 claim—

1. The combination of the curved spring-rockers having the vertical arms F near their rear ends, the chair-seat, the springs connecting the same to the front ends of the 75 rockers, and the convolute springs pivotally connecting the rear corners of the chair-seat to the upper ends of the arms or standards F, substantially as described.

2. The combination of the spring-rockers 80 having the arms or standards F near their rear ends, the **C**-shaped convolute springs E, connected to the rear corners of the seat and pivoted to the upper end of said arms or standards, and the springs supporting the 85 front side of the chair-seat above the front ends of the rocker, substantially as described.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in presence of two witnesses.

CHARLES LUCIEN JOHNSON.

Witnesses:

PATRICK N. BAIRD, JNO. R. COFFIN.