No. 733,450. PATENTED JULY 14, 1903.

A. M. WOLF.

SPRING ROCKER.

APPLICATION FILED FEB. 24, 1903.

NO MODEL.

Fig. 4.

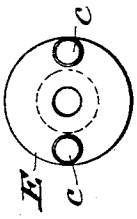


Fig. 2.

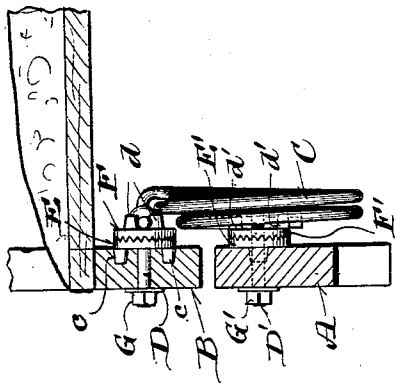


Fig. 5.

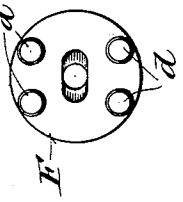


Fig. 3.

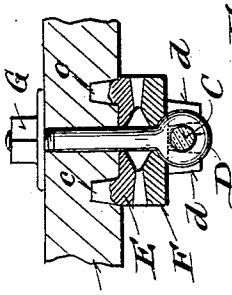
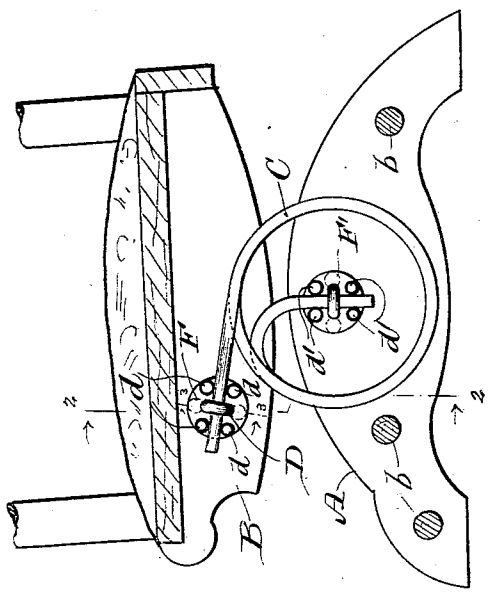


Fig. 1.



Witnesses
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THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

No. 733,450. Patented July 14, 1903.

UNITED STATES PATENT OFFICE.

ADAM M. WOLF, OF PLYMOUTH, WISCONSIN.

SPRING-ROCKER.

SPECIFICATION forming part of Letters Patent No. 733,450, dated July 14, 1903.

Application filed February 24, 1903. Serial No. 144,559. (No model.)

To all whom it may concern:

Be it known that I, ADAM M. WOLF, a citizen of the United States, and a resident of Plymouth, in the county of Sheboygan and State of Wisconsin, have invented certain new and useful Improvements in Spring-Rockers; and I do hereby declare that the following is a full, clear, and exact description thereof.

My invention has for its object to provide simple, economical, durable, and quiet-action spring-rockers that are readily adjustable as to tension and elevation, said invention consisting in certain peculiarities of construction and combination of parts hereinafter particularly set forth with reference to the accompanying drawings and subsequently claimed.

Figure 1 of the drawings represents a vertical front to rear section view of a spring-rocker chair made in accordance with my invention; Fig. 2, a transverse section view of a fragment of the chair, this view being indicated by line 2 2 in the first figure; Fig. 3, a detail section view indicated by line 3 3 in said first figure, and Figs. 4 and 5 side elevations of clutch-disks that constitute details of the invention.

Referring by letter to the drawings, A indicates one of a pair of parallel standards that in practice are connected by rounds *b* or otherwise to form the base of a chair, and a side bar B of the chair-seat frame is put in spring-rocker connection with the standard. The spring C herein shown is of spiral form. One end of the spring engages an eye extremity *b* of a bolt D, that extends through central apertures of a pair of clutch-disks E F and the side bar B of the chair-seat frame, a flanged nut G being run on the outwardly-extending screw-threaded end of the bolt. To accommodate the eye of the bolt, the exposed side of the inner clutch-disk F is provided with a concavity, and this concavity is intersected by the bolt-aperture in said disk.

Diametrically opposite lugs *c* of the clutch-disk E fit in sockets with which the side bar B of the chair-seat frame is provided, and the adjacent end of the spring C is caught between lugs *d*, that project in pairs from clutch-disk F, the opposing sides of the two disks being radially toothed to engage one with the other. The other end of the spring engages an eye extremity of a bolt D′, that extends through clutch-disks E′ F′ and the standard A of the chair-base, a flanged nut G′ being run on the outwardly-extending screw-threaded end of said bolt. This end of the spring is also caught between lugs *d*′, that project in pairs from the adjacent disk. The clutch-disks E′ F′ are the same in every particular as the ones E F, and the chair-base standard is provided with sockets (not shown) for the engagement of lugs that extend from the adjacent disk.

The clutch-disks next adjacent to standard A of the chair-base and side bar B of the chair-seat frame are held against turning as a result of the engagement of their lugs with the sockets provided in said standard and bar. By tightening the nuts G G′ the ends of the spring C are clamped tight against the opposing sides of clutch-disks F F′ between the lugs that extend in pairs from said disks.

In practice the normal angle of the chair-seat frame or other rocking superstructure and the tension of the supporting-springs are regulated by rotary adjustment of either or both of the inner clutch-disk fittings or the set of the upper ends of said springs, the corresponding eyebolts being loosened to permit the adjustment. The elevation of the spring-rocker superstructure is determined by the set of the ends of its springs in the lower eyebolts.

While I have shown and described a preferred construction and arrangement of parts, it is practical to vary details of the assemblage without departure from the scope of my invention.

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

1. The combination of a base, a superstructure, a pair of clutch-disks one of which is held fast in connection with the superstructure, the other being in rotatory adjustable connection with its companion, paired lugs extending laterally from the rotary adjustable clutch-disk, and a spiral spring held at its ends in connection with said base and superstructure, its upper ends being also caught between the lateral lugs of said rotary adjustable clutch-disk.

2. The combination of a base and superstructure each provided with a pair of clutch-disks one of which in each pair is held against turning, the other being for rotatory adjustment, paired lugs extending laterally from each rotary adjustable clutch-disk, and a spiral spring held at its ends in connection with said base and superstructure and between the lateral lugs of both the rotary adjustable clutch-disks.

3. The combination of a base, a superstructure provided with sockets, a pair of clutch-disks one of which is provided with side lugs engaging said sockets, the other being for rotatory adjustment, paired lugs extending laterally from the rotary adjustable clutch-disk, and a spiral spring held at its ends in connection with said base and superstructure, its upper end being also caught between the lateral lugs of said rotary adjustable clutch-disk.

4. The combination of a base and superstructure each provided with sockets, paired clutch-disks one of which in each pair is provided with socket-engaging side lugs, its companion being for rotatory adjustment, paired lugs extending laterally from each rotary adjustable clutch-disk, and a spiral spring held at its ends in connection with said base and superstructure and between lateral lugs of both rotary adjustable clutch-disks.

5. The combination of a base, a superstructure, a pair of clutch-disks one of which is held fast in connection with the superstructure, the other being for rotary adjustment, an eyebolt extending through the clutch-disks and superstructure, a clamp-nut run on the bolt, paired lugs extending laterally from the rotary adjustable clutch-disk, and a spiral spring held at one end in connection with the base by suitable means and having its other end engaged with the bolt-eye as well as caught between the lateral lugs of said rotary adjustable clutch-disk.

6. The combination of a base and superstructure each provided with paired clutch-disks one stationary and the other rotary adjustable, an eyebolt extending through each pair of disks and the adjacent base or superstructure, a clamp-nut run on each bolt, paired lugs extending laterally from each rotary adjustable clutch-disk, and a spiral spring engaged at its ends with the eyebolts and between lateral lugs of both rotary adjustable clutch-disks.

In testimony that I claim the foregoing I have hereunto set my hand, at Plymouth, in the county of Sheboygan and State of Wisconsin, in the presence of two witnesses.

ADAM M. WOLF.

Witnesses:
H. J. ROONEY,
C. F. WANDERSLEBEN.