No. 875,494. PATENTED DEC. 31, 1907.

I. E. BEDELL.

BALL BEARING FOR CHAIRS.

APPLICATION FILED FEB. 20, 1907.

Fig. 1.

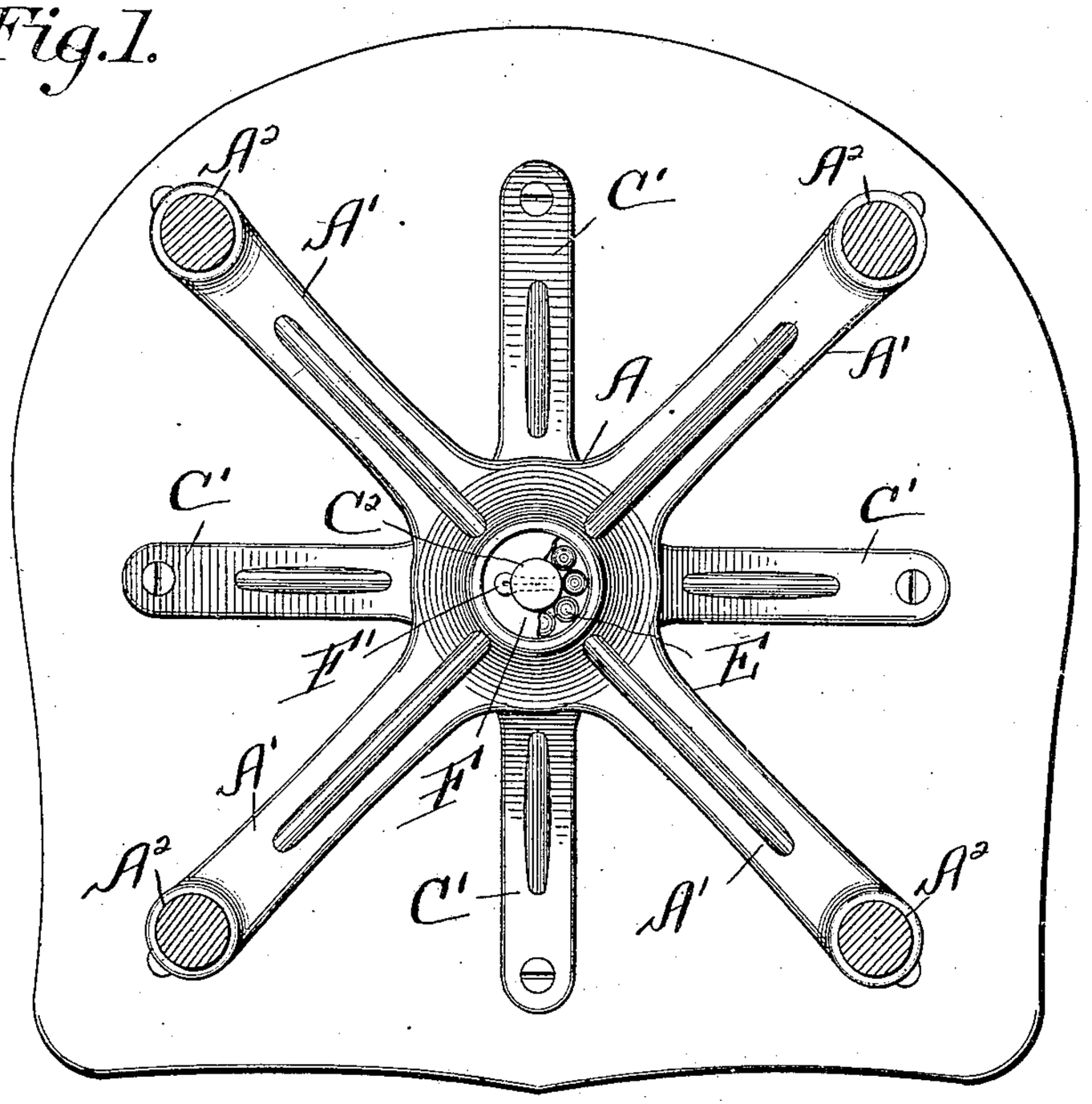

Fig. 2.

Witnesses

E. B. McBath

Rea P. Albright

Inventor

I. E. Bedell

By Owen & Brock

Attorneys

UNITED STATES PATENT OFFICE.

ISAAC E. BEDELL, OF YORK, PENNSYLVANIA.

BALL-BEARING FOR CHAIRS.

No. 875,494. Specification of Letters Patent. Patented Dec. 31, 1907.

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To all whom it may concern:

Be it known that I, ISAAC E. BEDELL, a citizen of the United States, residing at York, in the county of York and the State of Pennsylvania, have invented a new and useful Improvement in a Ball-Bearing for Chairs, of which the following is a specification.

This invention relates to ball bearing for chairs, the object being to provide ball bearings for chairs which are perfectly noiseless and one which is so constructed that the wear of the balls and bearing will be taken up automatically.

Another object of my invention is to provide a bearing which is very simple and cheap in construction and one which is very effective in use.

With these and other objects in view, the invention consists in the novel features of construction, combination and arrangement of parts hereinafter fully described and pointed out in the claims.

In the drawing forming a part of this specification:—Figure 1 is an inverted plan view of the bearing partly broken away showing it attached to the bottom of a chair. Fig. 2 is a vertical sectional view through the bearing showing a portion of the chair bottom and legs in elevation.

Referring to the drawing, A indicates a base provided with oppositely disposed outwardly projecting arms A′, provided with sockets A^2 at their ends, in which the legs of the chair are adapted to be secured in any suitable manner. The base is provided with a circular recess A^3 in its top having inclined sides and bottom, the junction of the two being formed rounded, forming a raceway for balls B, adapted to be arranged therein.

A downwardly projecting portion is formed on the base through which passes a central bore A^4 communicating with the bottom of the recess A^3 having a rounded edge A^5 and outwardly flanged sides A^6 for the purpose hereinafter described.

A rounded head C provided with oppositely disposed outwardly projecting apertured arms C′ is adapted to be secured to the under side of the bottom of the chair by screws. The head is adapted to fit in recesses and rest on the balls arranged therein. A depending spindle C^2 is formed centrally on the head adapted to extend down through the bore communicating with the recess of the base A, over which is adapted to be driven into the tapering bore, a mica washer D.

Balls E are arranged in the tapering bore around the spindle and are secured therein by a concaved convex washer F which is also driven into the bore over the spindle and is secured therein by a cotter pin F′ passing through an opening in the spindle.

From the foregoing description it will be readily seen that I have provided a very novel bearing so constructed that it can be used on tables or chairs of all descriptions and one which will take up the wear on the balls and bearing, so that a noiseless bearing will be formed.

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

1. A ball bearing comprising a base having a recess formed in its top provided with inclined sides and bottom forming a raceway, a downwardly projecting portion formed on said base provided with a central bore communicating with the bottom of said recess having outwardly flanged sides, balls arranged in said raceway, a rounded head arranged on said balls provided with a depending spindle extending through said bore, balls arranged in said bore around said spindle, and a washer arranged on said spindle in said bore and bearing on the last mentioned balls, for the purpose described.

2. A ball bearing comprising a base having a recess formed in its top provided with inclined sides and bottom, the junction of the two being rounded forming a raceway, a downwardly projecting portion formed on said base provided with a bore communicating with said recess having outwardly flanged sides, a rounded head arranged in said recess provided with a depending spindle extending through said bore, balls arranged in the raceway under said head, a mica washer arranged on said spindle in said bore, balls arranged around said spindle in said bore, a concaved convexed washer arranged on said spindle and balls in said bore, and a cotter pin passing through said spindle engaging said washer, for the purpose described.

ISAAC E. BEDELL.

Witnesses:
B. R. PAXTON,
GEORGE S. DELLINGER.