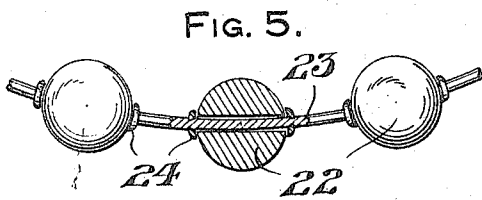
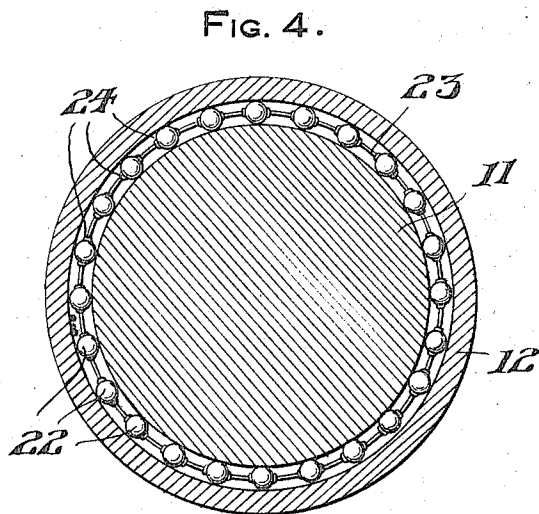
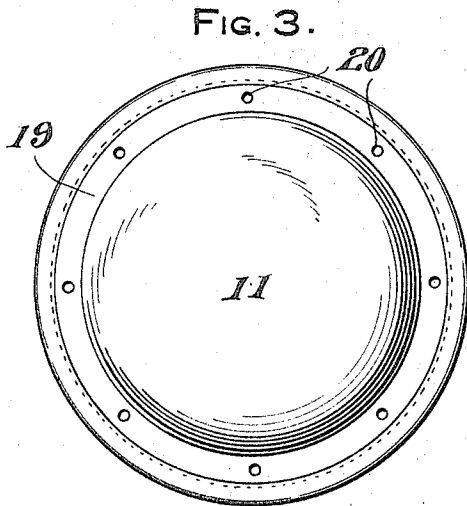
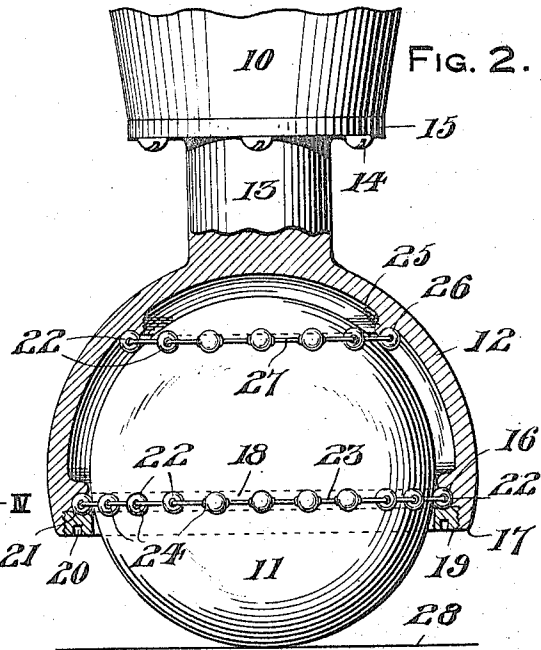
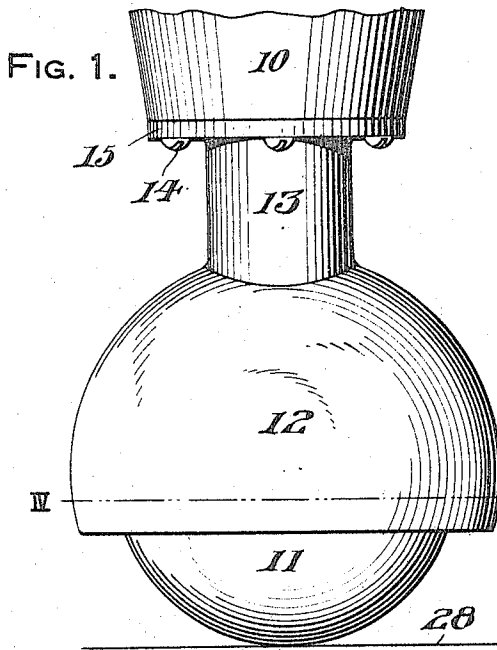


1,222,045.

Patented Apr. 10, 1917.



Inventor
J. Sobilo

By

M. Wilson

Attorney

UNITED STATES PATENT OFFICE.

JOHN SOBILO, OF MEADVILLE, PENNSYLVANIA.

CASTER.

1,222,045.

Specification of Letters Patent.

Patented Apr. 10, 1917.

Application filed January 4, 1917. Serial No. 140,527.

To all whom it may concern:

Be it known that I, JOHN SOBILO, a subject of the Emperor of Austria, residing at Meadville, in the county of Crawford and State of Pennsylvania, have invented certain new and useful Improvements in Casters, of which the following is a specification.

This invention relates to new and useful improvements in casters.

The primary object of the invention is the provision of a ball-bearing caster adapted for supporting furniture or other articles of great weight, the same being of strong construction, easily and cheaply manufactured and being formed of renewable parts whereby portions thereof may be replaced when worn or broken.

A further object of the invention is the provision of a caster in which the weight mounted thereon is supported by a spherical member mounted in a plurality of anti-friction elements rendering the same easily operable for moving about upon a surface in any direction.

With these general objects in view and others that will appear as the nature of the invention is better understood the same consists of the novel combination and arrangement of parts hereinafter fully described and illustrated in the accompanying drawing and pointed out in the appended claim.

In the drawing forming a part of this application like reference characters refer to corresponding parts throughout the same.

Figure 1 is a side elevation of the device positioned upon a furniture leg, the latter being broken away,

Fig. 2 is a similar view with parts shown in central vertical section,

Fig. 3 is a bottom plan view thereof,

Fig. 4 is a transverse sectional view taken upon line IV—IV of Fig. 1, and

Fig. 5 is a detail view, partially in elevation and partially in sections of a portion of one of the anti-friction elements.

Referring to the drawing it will first be noted that the device is herein illustrated in connection with a lower portion of the leg 10 of a piece of furniture, such as a table, the invention mainly providing a spherical body 11 after the manner of a ball caster, anti-frictionally retained within a hollow substantially hemispherical inverted cup-shaped member 12, the latter having an outwardly projecting centrally arranged post 13 secured to the lower face of the leg 10, by

means of screws 14 extending through a flange 15 at the free end of the said post.

The globe or dome 12 has an inwardly projecting annular rib 16 spaced from the lower free edge 17 of the dome adapted for seating an anti-friction element 18 against its lower curved face, a retaining ring 19 being screw-threaded within the lower end of the dome beneath said element 18 for maintaining the latter in its annular operative arrangement, the rib 16, ring 19 and adjacent portion of the dome 12 serving to form a cage for the anti-friction element 18. Wrench-receiving sockets 20 are provided in the ring 19, while its inner face has a curved seat 21 upon which the element 18 is adapted to rest.

The anti-friction element 18 may be of any preferred annular construction, but as herein illustrated is formed of a plurality of balls 22 threaded upon an elongated member or rod 23, being equally spaced apart thereon, and retained in position by washers 24 secured upon the said rod.

An annular shoulder 25 of less diameter than the rib 16 is arranged within the dome 12 inwardly of the said rib, with the shape of which the said shoulder substantially conforms, a curved seat 26 being provided upon the lower face of the shoulder 25 adapted for the reception of an anti-friction element 27, identical in construction to the aforementioned element 18 although being of less diameter.

The ball 11 being arranged within the dome 12 has the anti-friction element 27 engaging its surface adjacent one pole thereof, while the element 18 engages the ball 11 beneath the circumferential line of the ball, the said elements 18 and 27 being positioned in parallel planes. It being understood that the dome 12 is slightly greater than the hemisphere, the lower portion thereof, including the rib 16 as well as the anti-friction element 18, being beneath the horizontal axis of the ball 11 thereby retain the ball in its operative position when the elements are assembled.

The ball 11 being contacted solely by the anti-friction elements 18 and 27 renders the same freely movable, while the ball 11 and dome 12 possess great strength whereby the device is capable of supporting a great weight and may be readily pushed around in any direction, positioned upon a support such as the floor 28. The said anti-friction

elements being solely in engagement with the ball 11 are subjected to strain exerted by the ball 11 in all directions.

What I claim as new is:

- 5 A caster comprising a dome member, a ball member positioned therein, and anti-friction members arranged between the dome

member and ball member, including a circular rod having anti-friction balls loosely journaled thereon and washers fixed to said rod at opposite sides of the balls for spacing the balls. 10

In testimony whereof I affix my signature.
JOHN SOBILO.