No. 779,788. PATENTED JAN. 10, 1905.

J. KRODER.

CURTAIN POLE.

APPLICATION FILED MAY 18, 1904.

Fig. 1.

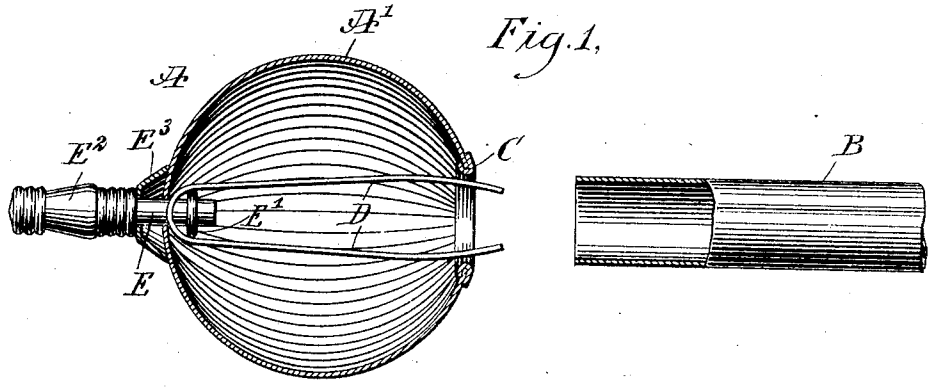


Fig. 2.

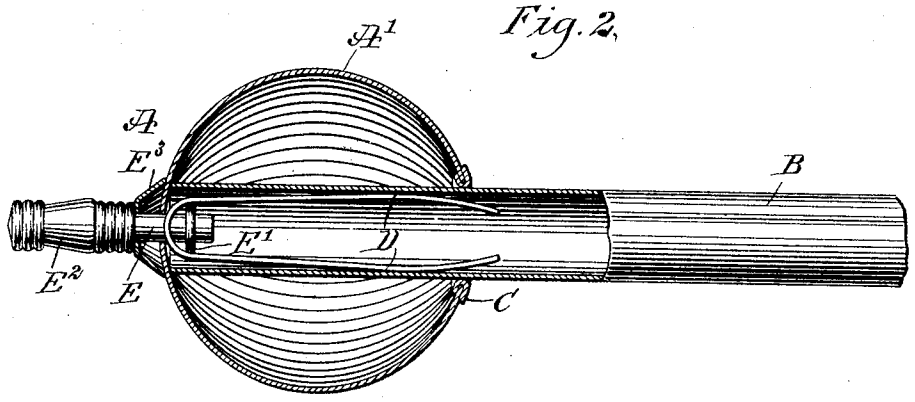
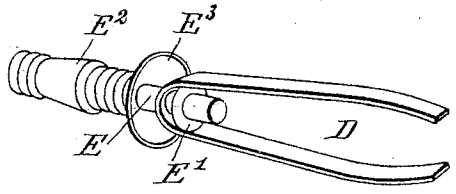


Fig. 3.



WITNESSES:

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No. 779,788. Patented January 10, 1905.

UNITED STATES PATENT OFFICE.

JOHN KRODER, OF NEW YORK, N. Y.

CURTAIN-POLE.

SPECIFICATION forming part of Letters Patent No. 779,788, dated January 10, 1905.

Application filed May 18, 1904. Serial No. 208,538.

To all whom it may concern:

Be it known that I, JOHN KRODER, a citizen of the United States, and a resident of the city of New York, borough of Manhattan, in the county and State of New York, have invented a new and Improved Curtain-Pole, of which the following is a full, clear, and exact description.

The invention relates to curtain-rods, curtain-poles, and similar fixtures; and its object is to provide a new and improved means for removably fastening knobs, balls, or like end ornaments in position on the ends of a tube, pole, or similar fixture.

The invention consists of novel features and parts and combinations of the same, as will be more fully described hereinafter and then pointed out in the claims.

A practical embodiment of the invention is represented in the accompanying drawings, forming a part of this specification, in which similar characters of reference indicate corresponding parts in all the views.

Figure 1 is a longitudinal sectional elevation of the improvement, showing the ornament detached from the fixture. Fig. 2 is a like view of the improvement, showing the parts assembled; and Fig. 3 is a perspective view of the spring and its support.

Each of the balls, knobs, or like ornaments A for the ends of a tube, pole, or like fixture B consists, essentially, of a shell A′, having a ring-shaped bearing C, forming an entrance-opening for the end of the fixture B, and within the said shell A′ is held a spring D, passing into the hollow end of the fixture B to press by its own resiliency with sufficient force against the inner face of the fixture to securely hold the ornament A in position on the said fixture B.

The spring D is preferably made from a single piece of flat steel bent into U shape and attached at its middle or bent portion to a pin E, secured to the side of the shell A′ diametrically opposite the bearing C and in axial alinement with the said bearing and the fixture B when the ornament is in position thereon. The arms of the spring D extend lengthwise of the shell and their terminals pass freely through the bearing C to project a short distance beyond the outside of the shell, so that when the ornament A is slipped into position on the fixture B then the terminals of the spring readily pass into the fixture B immediately previous to the fixture engaging the bearing C. By this arrangement the spring positively passes to the inside of the fixture to press against the inner face thereof to hold the ornament in position. By having the spring arranged as described it forms a second bearing for the corresponding end of the fixture, as the latter is supported at the bearing C, and at the same time the spring serves to hold the ornament in an accurate position on the fixture.

In practice the middle or bent portion of the spring D is formed with an opening for the pin E to extend through, and on the inner end of the pin is arranged an integral or rigid annular flange or shoulder E′ for the bent portion of the spring to abut against, the outer face of the said bent portion abutting against the inside of the shell A′, so that the bent portion is clamped between the shoulder E′ and the inner face of the shell, as plainly shown in Figs. 1 and 2. On the outer end of the pin is secured or formed an ornamental head E^2, abutting against a washer E^3, resting on the outside of the shell. By the arrangement described the head E^2 and the washer E^3 form an ornamental portion of the shell A′ to heighten the appearance of the ornament.

The parts are assembled by inserting or slipping the outer or main portion of the pin E through an opening in the bend of the spring, after which the pin and spring are introduced into the shell A′ through the bearing C and the outer or main portion of the pin projected through a corresponding opening in the shell, as shown. The washer E^3 is then slipped over the projecting portion of the pin, and finally the head E^2 is riveted or screwed onto the pin against the washer.

By projecting the ends of the spring D through the bearing C the spring is unfailingly engaged with the inside of the fixture B, and as the spring bears on the inner face immediately after the bearing C has passed onto the fixture B it is evident that the ornament can slip any desired distance along on

the fixture B, preferably, however, until the terminal of the fixture abuts against the inner face of the shell A′ directly opposite the washer E^3, as shown in Fig. 2.

The device is very simple and durable in construction and can be cheaply manufactured.

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

1. A curtain-pole comprising a hollow fixture, a hollow end ornament provided with an entrance-opening for the fixture, a spring pressing the inner side of the fixture, and means on the ornament for fastening the spring in position on the ornament, said means constituting a rigid abutment for the spring.

2. A curtain-pole comprising a fixture, a hollow end ornament provided with a bearing for the fixture and with a pin arranged axially relative to the bearing, and a U-shaped spring attached at its middle to the said pin within the ornament and extending within the hollow end of the fixture to press against the inner side thereof, said pin having thereon a rigid abutment for the limbs of the spring.

3. A curtain-pole comprising a fixture, a hollow end ornament provided with a bearing for the fixture and with a pin arranged axially relative to the bearing and forming part of the exterior ornamentation of the ornament, said pin having a rigid annular shoulder near its inner end, and a U-shaped spring attached at its middle to the said pin within the ornament and extending within the hollow end of the fixture to press against the inner side thereof, the portions of the spring near its bend abutting against said shoulder.

4. A curtain-pole ornament comprising a shell provided with a ring-shaped bearing for the curtain-pole, a pin mounted in the side of the shell directly opposite the said bearing and in axial alinement therewith, said pin having a rigid annular shoulder near its inner end, and a spring made U shape and attached at its middle to the pin on the inside of the shell and having its arms extending lengthwise and through the opening in the said bearing, the portions of the spring near its bend abutting against said shoulder.

5. A curtain-pole ornament comprising a shell provided with a ring-shaped bearing for the curtain-pole, a pin mounted in the side of the shell directly opposite the said bearing and in axial alinement therewith, and a spring made U shape and attached at its middle to the pin on the inside of the shell and having its arms extending lengthwise and through the opening in the said bearing, the pin having a rigid annular shoulder near its inner end for the spring to abut against and the outer portion of the pin forming an ornamental portion of the shell.

6. A curtain-pole ornament comprising a shell having a bearing, a pin mounted in the side of the shell, directly opposite to and in axial alinement with the said bearing, the pin having a rigid annular shoulder near its inner end, and a U-shaped spring engaging with its bent portion the said pin, the bent portion being clamped between the said shoulder and the inner face of the shell.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

JOHN KRODER.

Witnesses:

THEO. G. HOSTER,

EVERARD BOLTON MARSHALL.