

(No Model.)

C. G. PERKINS.

SOCKET FOR INCANDESCENT ELECTRIC LAMPS.

No. 504,743.

Patented Sept. 12, 1893.

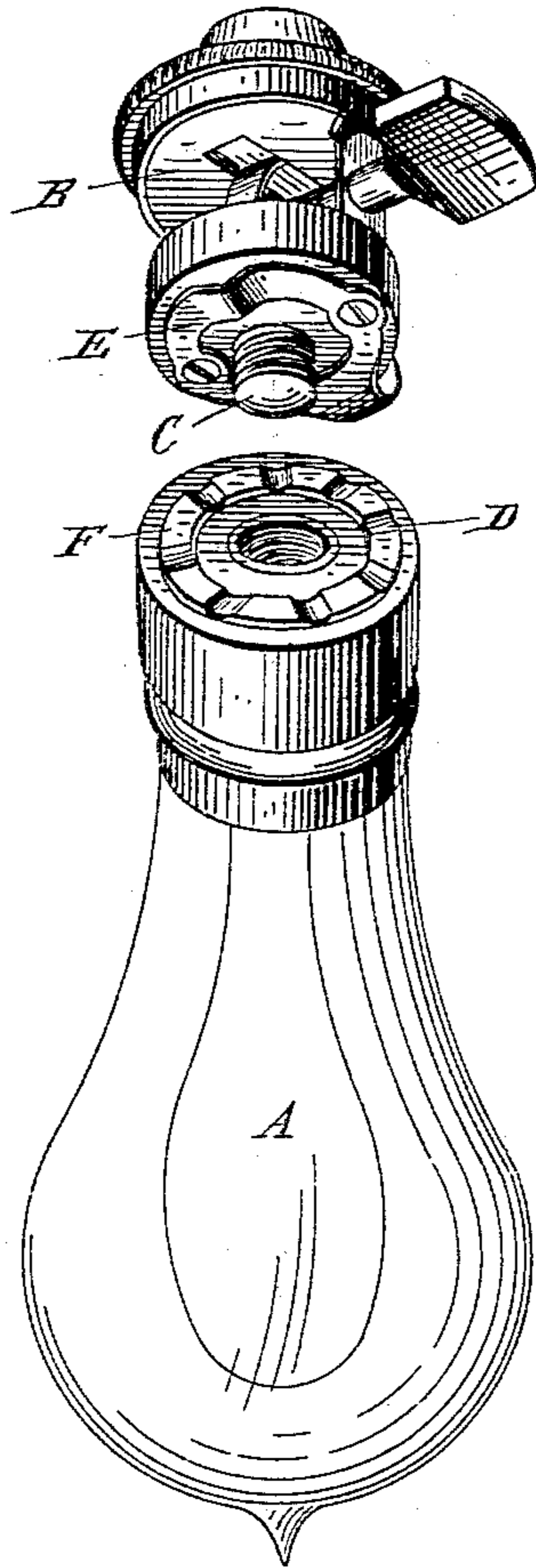


Fig. 1

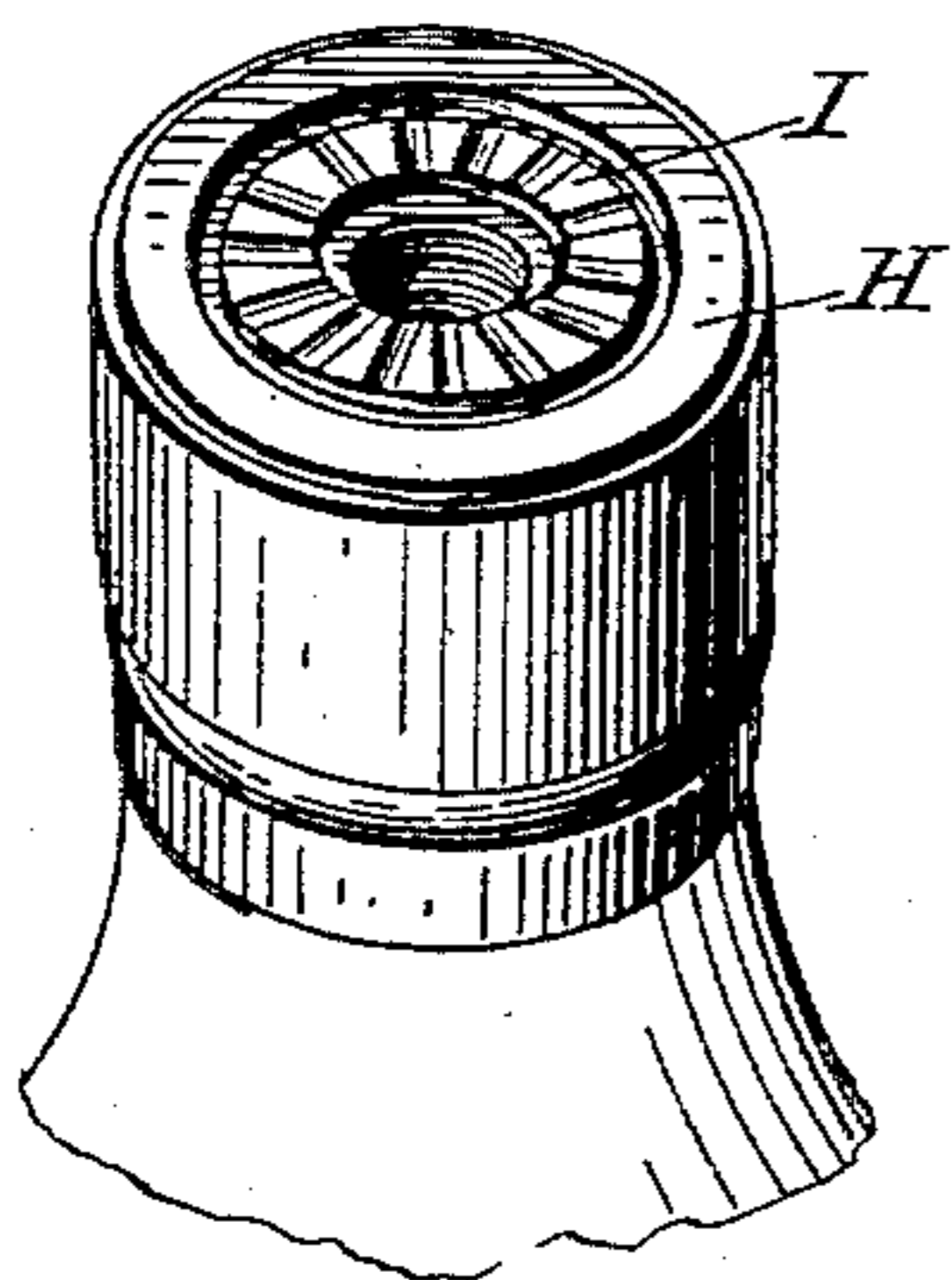


Fig. 2

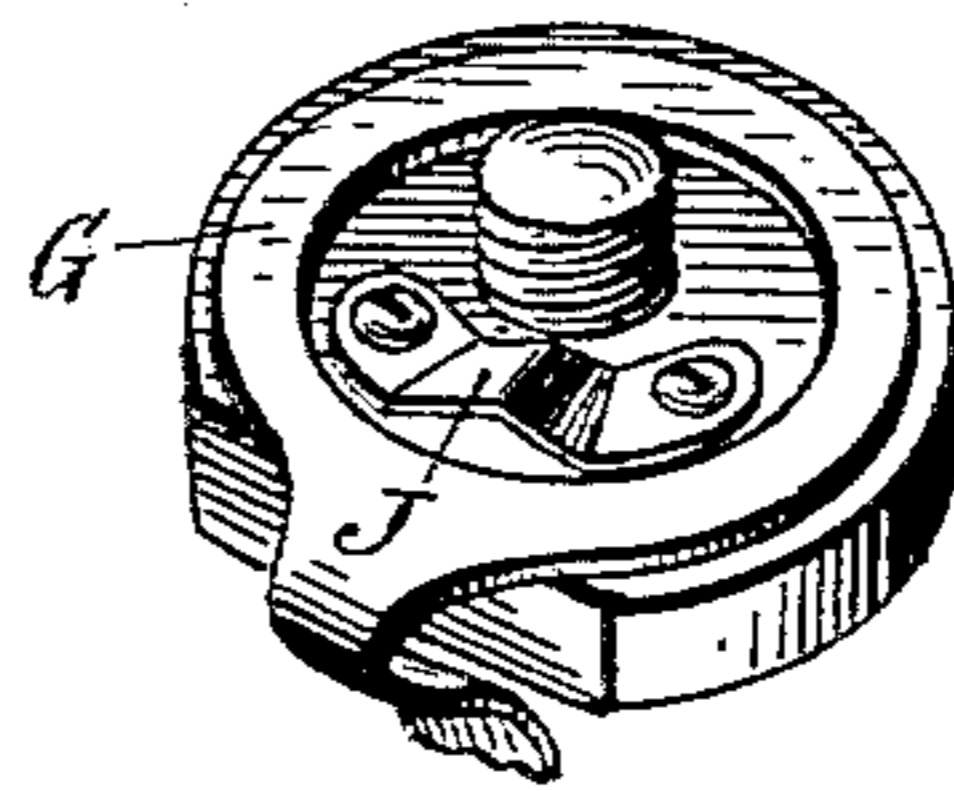


Fig. 3

WITNESSES:

*Walter W. Longgrove.*  
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INVENTOR

*Charles G. Perkins,*  
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# UNITED STATES PATENT OFFICE.

CHARLES G. PERKINS, OF HARTFORD, CONNECTICUT.

## SOCKET FOR INCANDESCENT ELECTRIC LAMPS.

SPECIFICATION forming part of Letters Patent No. 504,743, dated September 12, 1893.

Application filed July 10, 1891. Serial No. 399,097. (No model.)

*To all whom it may concern:*

Be it known that I, CHARLES G. PERKINS, a citizen of the United States, residing at Hartford, in the county of Hartford, State of Connecticut, have invented certain new and useful Improvements in Locks for Holding Electrical Appliances in Position, of which the following is a specification.

The object of the invention is to provide means for preventing the detachment of the parts of couplings, by reason of the shocks to which they are liable to be subjected when in use. The invention, however, is especially applicable to incandescent lamps, and for this reason will be illustrated and described in connection with such devices.

In the accompanying drawings, Figure 1, shows a perspective view of an incandescent lamp and the coupling parts thereof, and Figs. 2 and 3 illustrate modifications of the same.

A is an incandescent lamp, and D, the socket thereof, which is internally screw-threaded at its center for the reception of the externally screw-threaded extension C of the coupling section B, which carries the key and devices for establishing and cutting off the circuit through the lamp. The socket and extension C form one terminal of the lamp or device, the other terminals being formed by a metallic ring or collar E on the section B and a ring or collar F also of metal surrounding the socketed portion of the lamp. The ring E is made of spring metal and is bent up so as to form a rib *e*, while the ring F is provided with a series of corrugations, corresponding in shape to the rib *e* so that the two will perform the double function of making a good electrical contact, and locking the parts of the coupling against accidental displacement. The number of ribs and corrugations is immaterial. It is clear from the above that when the coupling parts are screwed together, the two rings will slide over each other and successive corrugations will engage with the rib, each further movement making a firmer connection between the parts. I prefer to make the ring E yielding, and to give it some play so as to allow several of the cor-

rugations to pass successively over the rib. If desired, the play can be given to the ring F instead of the ring E, and the socket may be made in the coupling section B, and the screw extension formed at the center of the ring F without departing from my invention. When the parts are in place, they are held firmly by the pressure of the rib into the corrugation which last covers it and there is no danger of the lamp working loose; and at the same time the best electrical contact is made. The parts E and F need not, necessarily, be complete rings, but can be other shapes as well.

In Figs. 2 and 3, I show a construction in which separate devices are employed for performing the electrical and mechanical functions of my apparatus. G and H are contact rings, I is the corrugated ring, and J is a short strip of spring metal bent to form a rib for entering the corrugations on the ring I. The mode of operation is obvious.

I have shown the device in combination with an electric incandescent lamp, but I may use it with any other electrical appliance which is subjected to shocks that tend to loosen it from its support.

What I claim as my invention is—

1. The combination, in an electric coupling, of a coupling section having a projecting screw-threaded extension and a ribbed wing with a corresponding coupling section having an internally threaded socket, and a radially corrugated contact surface adapted to engage the rib to make close electrical contact therewith and lock the parts, substantially as described.

2. The combination, in an electric incandescent lamp, of a lamp section having an internally threaded socketed ring at its top, provided with radial corrugations and a coupling section having an externally screw-threaded section, and an elastic ribbed ring adapted to engage the radial corrugations, the socket and screw extension forming one terminal of the circuit through the lamp, and the ribbed and corrugated rings, the other terminal, substantially as described.

3. In an electric incandescent lamp having

on its coupling end a radially corrugated contact surface, of a co-operative device provided with a rib adapted to engage the corrugated contact surface to make electrical connection therewith and lock the parts of the coupling, substantially as described.

4. An incandescent electric lamp having a central terminal and an outer ring terminal

on the end of its neck, the ring terminal being corrugated or roughened.

In testimony whereof I have hereunto set my hand this 1st day of July, A. D. 1891.

CHARLES G. PERKINS.

Witnesses:

FREDERICK W. DAVIS,  
G. H. STOCKBRIDGE.