

H. S. SALT.

ADAPTER.

APPLICATION FILED APR. 14, 1908.

928,474.

Patented July 20, 1909.

Fig. 1.

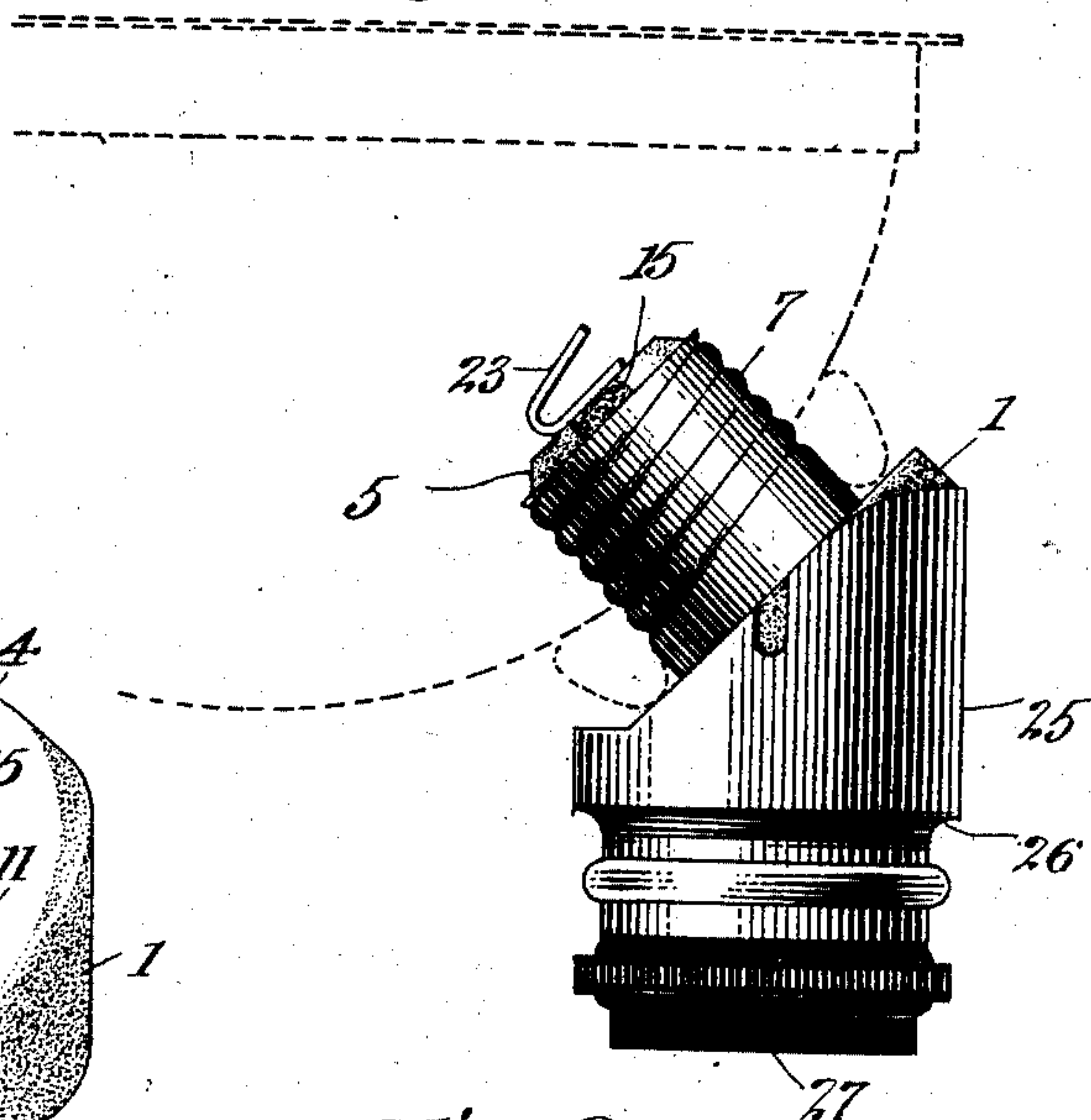


Fig. 4.

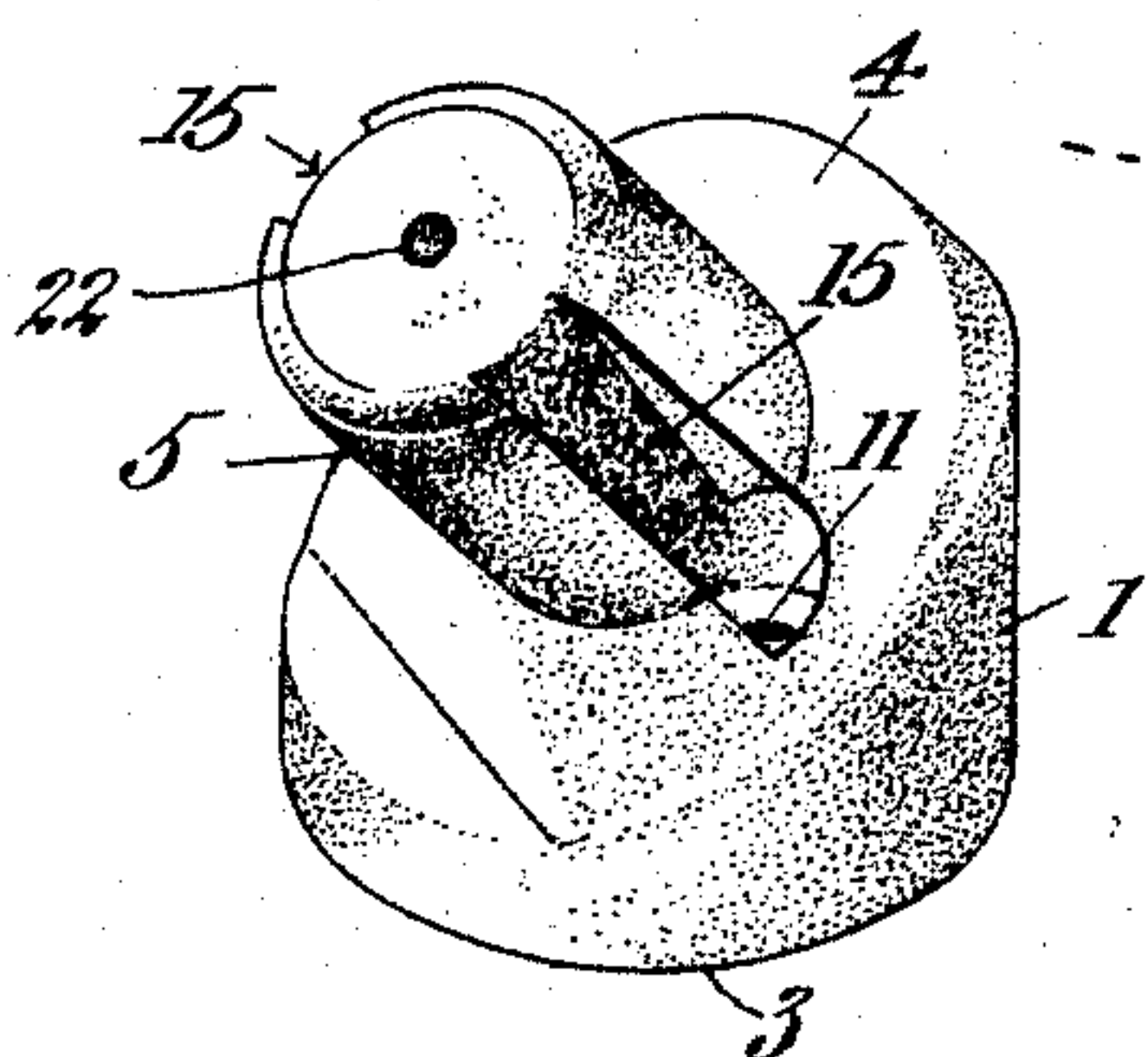


Fig. 6.

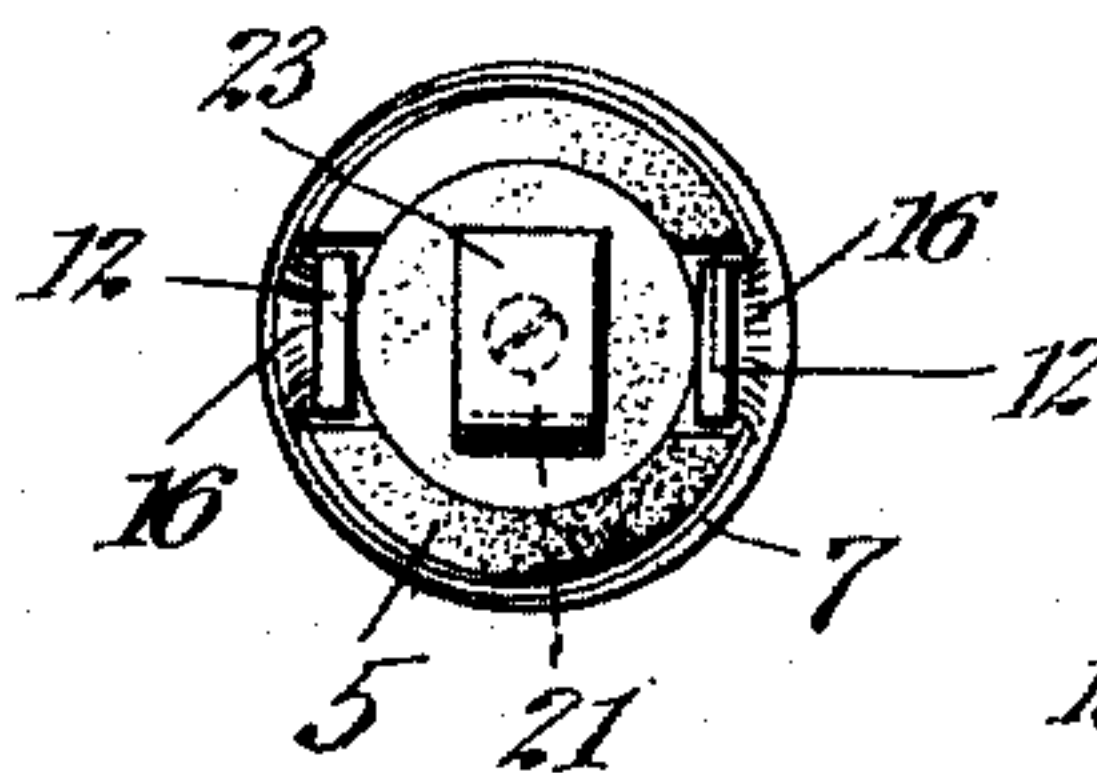


Fig. 2.

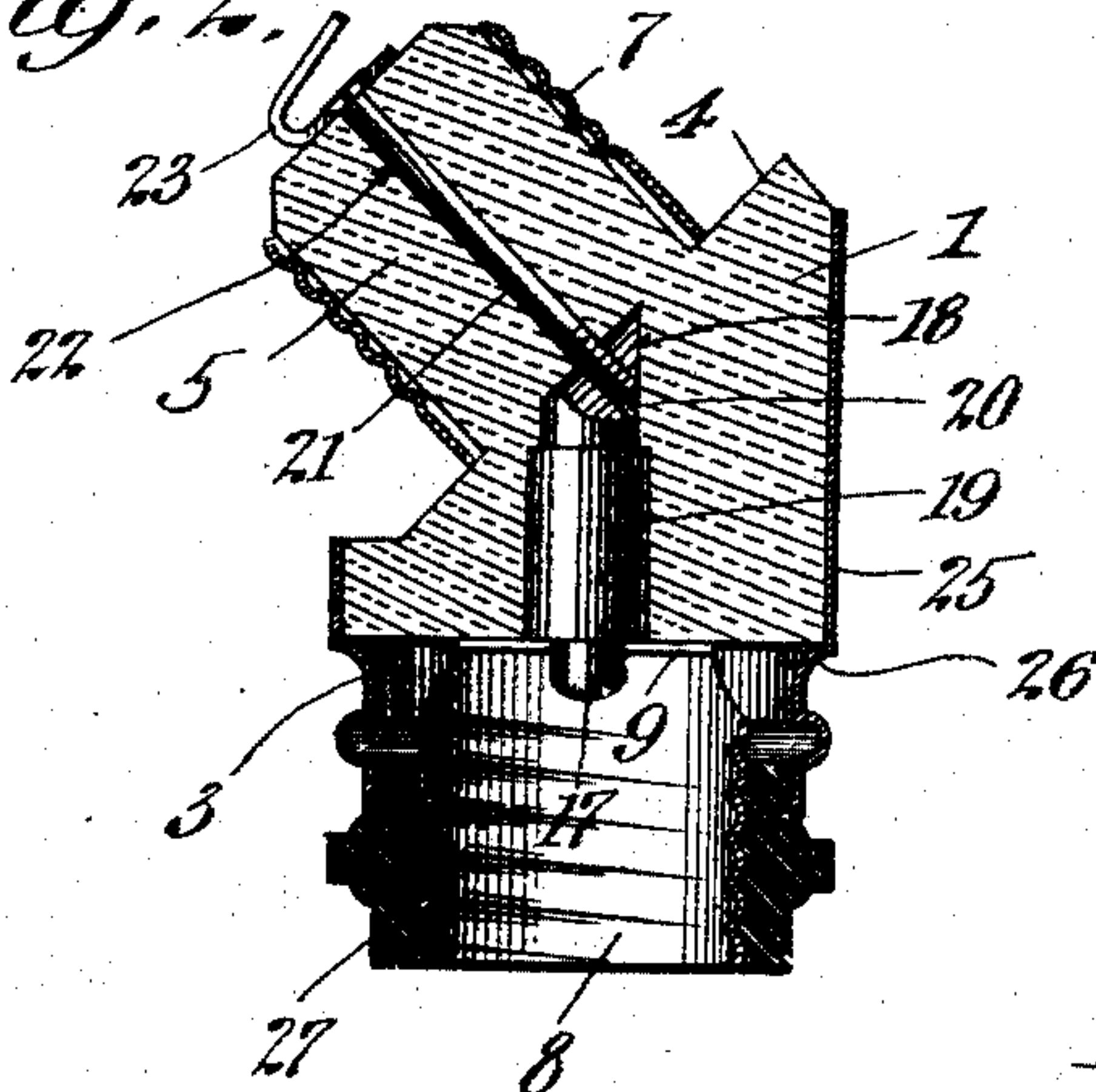


Fig. 3.

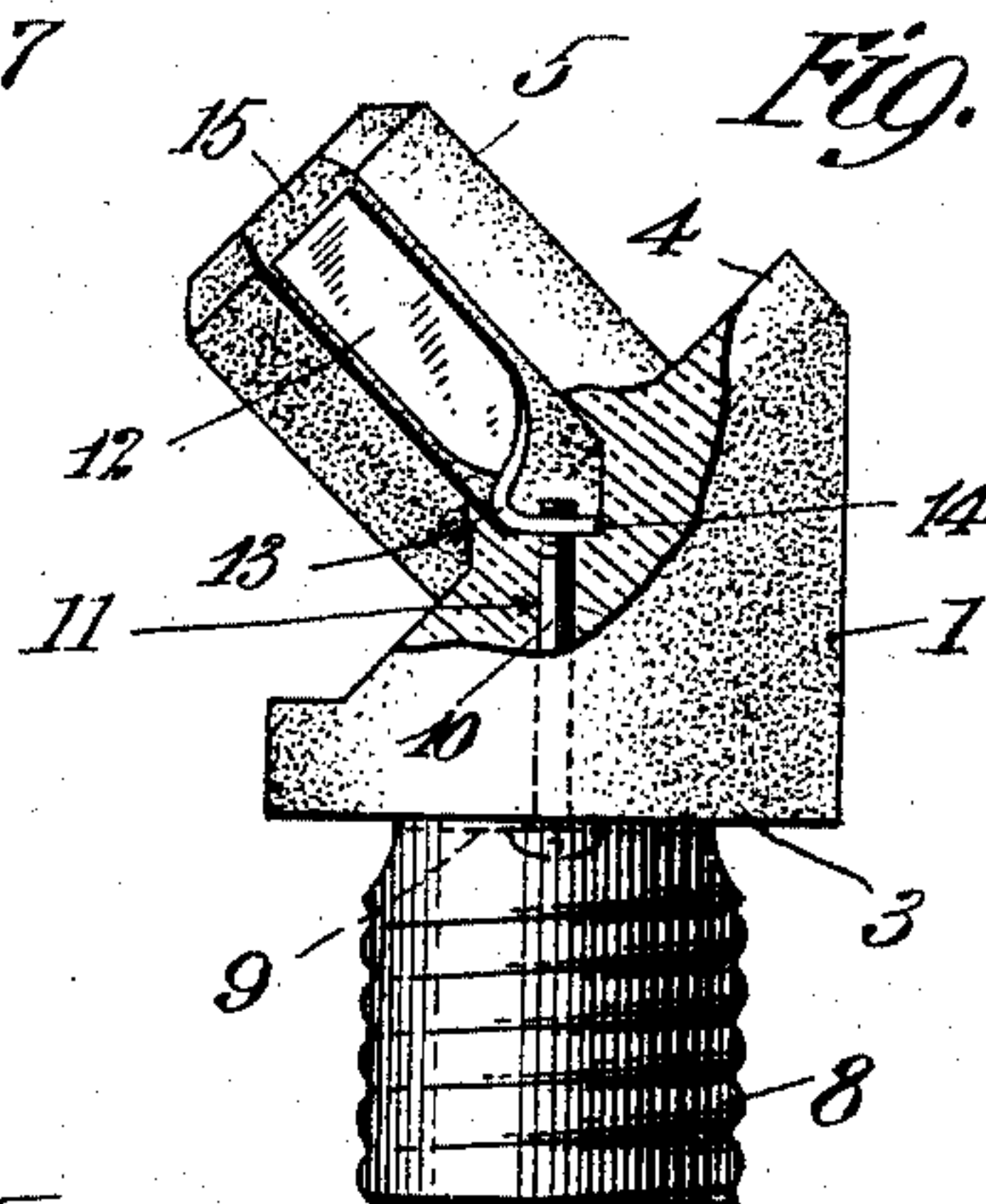
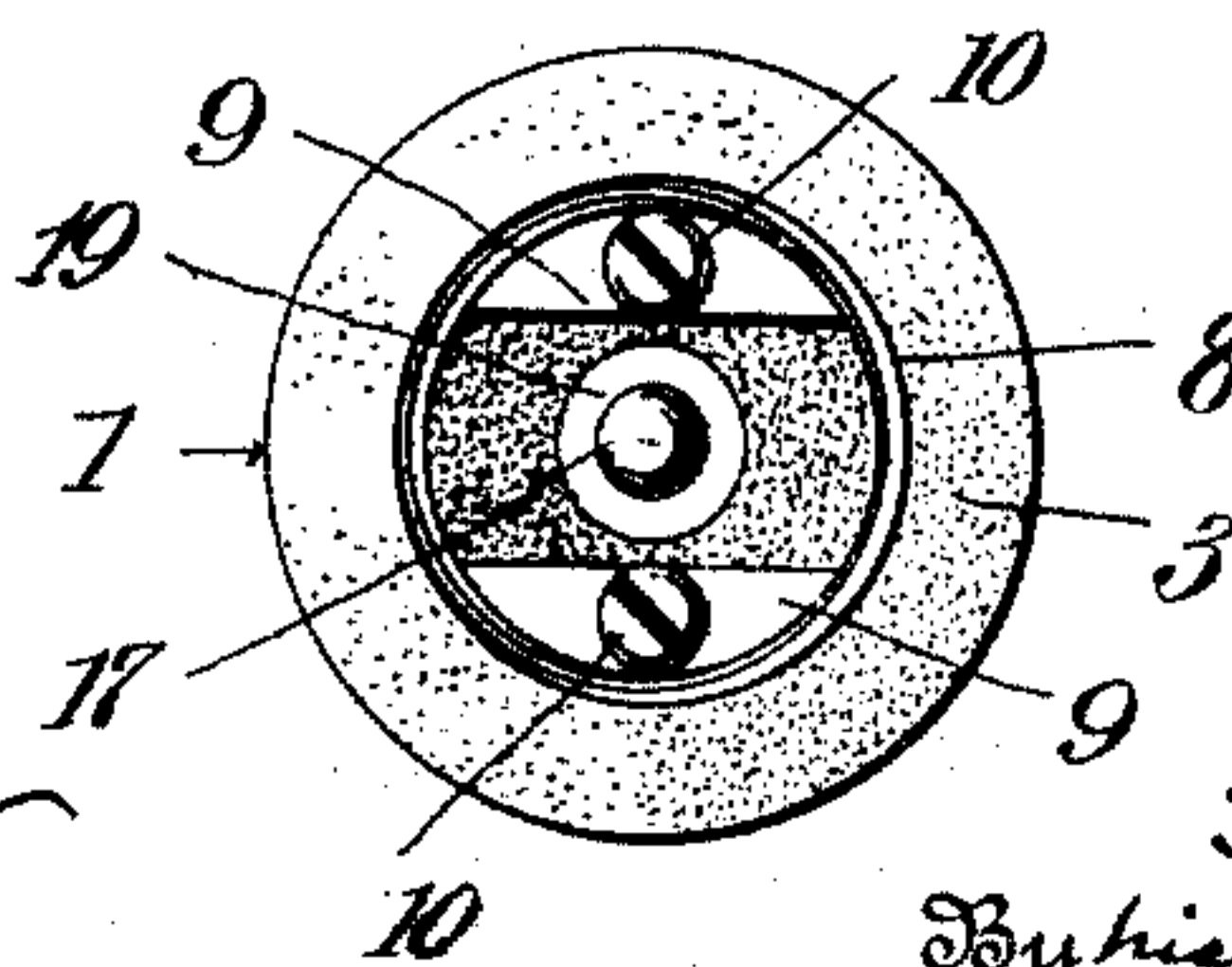


Fig. 5.



Witnesses:  
H. S. Salt  
Adaptor

Inventor  
H. S. Salt  
By his Attorneys  
Rosenbaum & Stockbridge



# UNITED STATES PATENT OFFICE.

HARMAN S. SALT, OF NEW YORK, N. Y., ASSIGNOR TO THE DALE COMPANY, A CORPORATION OF NEW YORK.

## ADAPTER.

No. 928,474.

Specification of Letters Patent.

Patented July 20, 1909.

Application filed April 14, 1908. Serial No. 426,958.

*To all whom it may concern:*

Be it known that I, HARMAN S. SALT, a citizen of the United States, residing at New York city, in the borough of Manhattan and State of New York, have invented certain new and useful Improvements in Adapters, of which the following is a full, clear, and exact description.

My invention relates to attachments for lamp fixtures, the same constituting a lamp adapter and designed for use with incandescent lamp fixtures of the type in which the sockets are directed outwardly and downwardly at an inclination or angle from the vertical axis of the fixture. A lamp adapter of this sort is particularly useful with the so-called "tungsten" and lamps which have to be supported in vertical position when in operation. It is evident that, if a building be equipped with fixtures of the ordinary type in which the sockets project outwardly at an angle from a central vertical axis, these tungsten and similar lamps cannot be used. So far as I am aware, it has been invariably necessary to go to the expense of entirely removing and replacing the usual fixtures under these circumstances.

It is the purpose of my invention to provide a simple adapter which renders the ordinary fixture above described available for use with tungsten and similar lamps.

In carrying out my invention I provide means for insuring that the adapter will assume a vertical position, regardless of the different threaded relations between the fixture socket and the adapter, which would ordinarily leave the adapter in an improper position if the latter were simply screwed home into the socket until it came into rigid abutting engagement with the center contact thereof.

The invention consists in the features of construction and combination hereinafter described and claimed.

In the drawing: Figure 1 is a side elevation of an adapter involving the principles of my invention. Fig. 2 is a vertical sectional view of the same. Fig. 3 is a side elevation partly in section with the casing and certain other parts removed. Fig. 4 is a perspective view of the porcelain block or body of the adapter. Fig. 5 is a bottom end view of the adapter, and Fig. 6 is an end view of the plug portion of the adapter.

I make use of a main supporting body of porcelain or insulating material, upon and within which are assembled certain metallic parts which cooperate with each other to provide the various terminals and connections of the adapter. The arrangement is such that the different metallic parts cooperate together to secure their firm engagement on the porcelain body, and also to establish all the necessary electrical connections of the device.

Referring to the drawing, in which like parts are designated by the same reference sign, 1 designates a porcelain block, base or body having preferably a generally cylindrical outline with a lower squarely terminating end face 3 and an upper inclined face 4 which is most conveniently made at an angle of 45° with the axis of the body.

5 designates a cylindrical extension projecting from the center of the inclined face 4 in a direction perpendicular to the plane thereof. The extension 5 constitutes a support for the socket plug. This plug comprises the usual sheet metal tube or sleeve 7 having screw threads of a size and form of those on the base of an incandescent lamp.

8 designates a threaded shell which is formed with inwardly-turned ears or flanges 9 at one end adapted to be received against the flat face 3 of the porcelain body 1. Screws 10 pass upwardly through these inwardly-turned portions of the threaded shell and through holes 11 in the body 1.

12 designates metallic clips which are conveniently formed of sheet metal twisted as at 13, at one end, and bent into a plane at 14 extending at an angle to the direction of the length of the clips. These clips are received in longitudinally extending grooves or recesses 15 on diametrically opposite sides of the extension 5. They serve to hold in place the tube or sleeve 7 and establish electrical connection between it and the threaded shell 8. For this purpose the clips 12 are soldered or otherwise fastened to the tube or sleeve 7 at points 16, and the screws 10 are screwed into threaded holes in the bent extremities 14 of the clips.

17 designates the center contact of the socket portion of the adapter, and 23 indicates the center contact of the plug portion thereof.

In practice I provide a recess or opening 18 in the porcelain body 1, and insert therein



a metallic pin 19 having the rounded reduced extremity 17 constituting the center contact. The inner end of the pin 19 has a diagonal threaded hole 20 in which is received a screw 21 passing through a hole 22 in the extension 5.

23 is a U-shaped strip of springy sheet metal which is secured at the end of the extension 5 by the screw 21. This strip constitutes the center contact of the plug portion of the adapter and is in permanent electrical connection with the pin 19 and center contact 17, through the said screw 21.

The device may be provided with a suitable casing 25 which is formed with a shoulder 26 to limit its endwise movement over the body 1. This casing is secured in place by an insulating bushing 27 which screws upon the threaded shell 8 and engages the end of said casing.

The use and operation are as follows: Assuming that the adapter is to be used with a cluster socket of the type having lamp receptacles projecting downward at about 45° angles, as shown in Fig. 1, it is merely necessary to screw the plug portion of the adapter into the receptacle until a center contact is established at 23, and thereafter give the adapter a further movement through a fractional turn until its socket portion 8 projects vertically downward. In this action the U-shaped resilient strip 23 yields inwardly, it being evident that its structure gives a sufficient range of yielding movement to permit proper positioning of the adapter under all circumstances. The tungsten or other lamp may now be screwed upward into the threaded shell 8, whereupon all electrical

connections are properly established through the screws 10 and 21 together with their associated contact studs and parts, respectively.

What I claim is:

1. An adapter comprising an insulating body having an extension and having a face inclined thereto, a threaded tube surrounding said extension, a threaded shell projecting perpendicularly from said face and having lugs extending inward on said face, a casing surrounding said body, an insulating bushing engaging said threaded shell to hold said casing in place, and means mechanically joining said tube and the lugs of said shell and establishing an electrical connection therebetween, and electrically connected center contacts.

2. An adapter comprising an insulating body having a flat face with an extension and having another flat face inclined at an angle to the first, a threaded tube surrounding said extension, a threaded shell projecting perpendicularly from the plain face and having inwardly extending lugs on said face, a casing surrounding said body, an insulating bushing engaging said threaded shell to hold said casing in place, strips and screws joining said tube and said shell in electrical and mechanical connection, and a pair of metallic parts joined together at an angle through said body and constituting center contacts.

In witness whereof, I subscribe my signature, in the presence of two witnesses.

HARMAN S. SALT.

Witnesses:

WM. H. MEYER, Jr.,  
JAMES D'ANTONIO.