

J. STERN.
ELECTRIC BATTERY LAMP.
APPLICATION FILED MAR. 1, 1917.

1,247,346.

Patented Nov. 20, 1917.

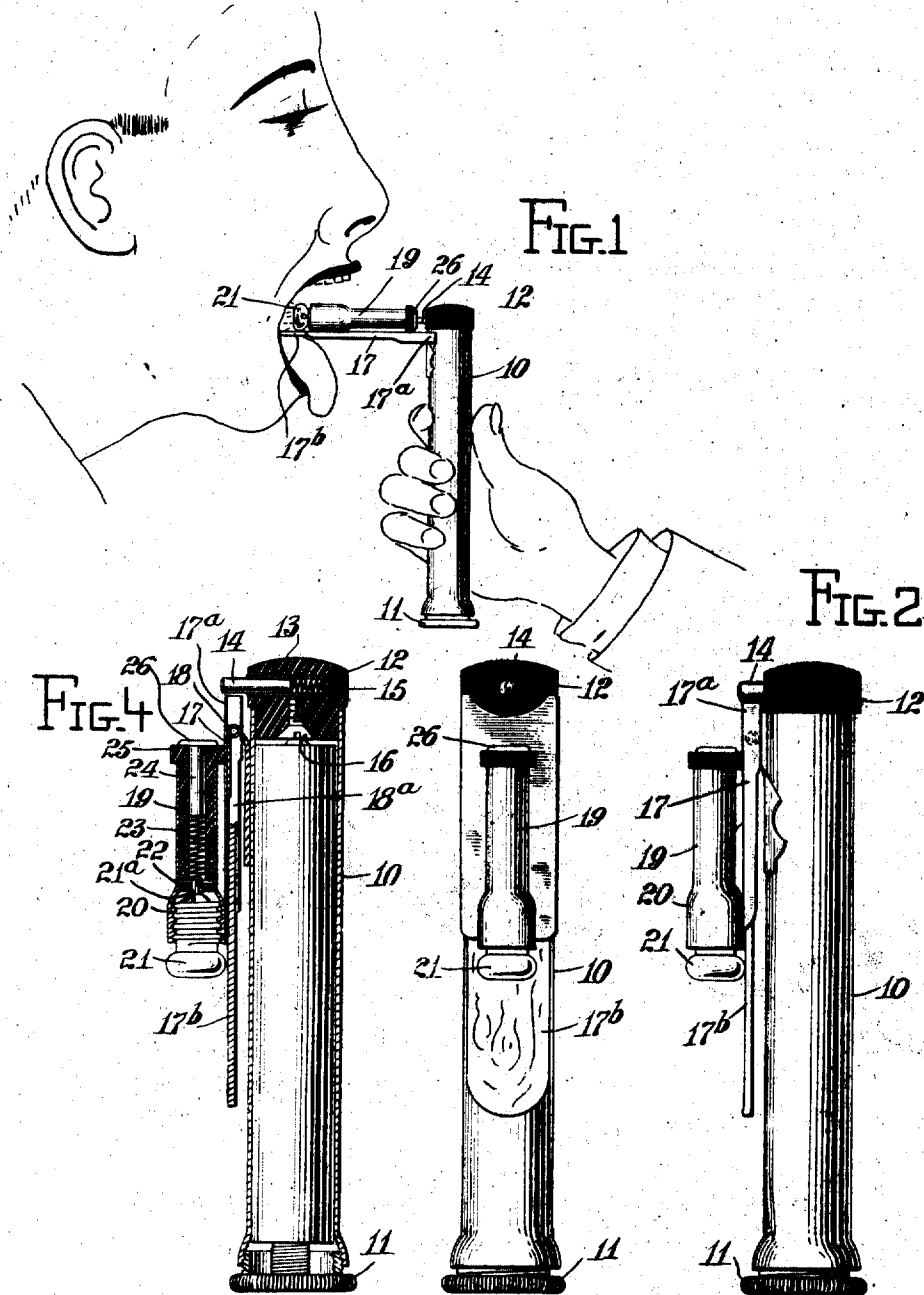


FIG. 3 Joseph Stern, Inventor,
By his Attorney,
W. P. Hutchinson.

UNITED STATES PATENT OFFICE.

JOSEPH STERN, OF AMITYVILLE, NEW YORK.

ELECTRIC BATTERY-LAMP.

1,247,346.

Specification of Letters Patent.

Patented Nov. 20, 1917.

Application filed March 1, 1917. Serial No. 151,654.

To all whom it may concern:

Be it known that I, JOSEPH STERN, a citizen of the United States, and a resident of Amityville, Suffolk county, New York, have invented a new and useful Improvement in Electric Battery-Lamps, of which the following is a full, clear, and exact description:

My invention relates to improvements in electric battery lamps, and especially to that class of lamps which are used in connection with a portable hand battery. The object of my invention is generally to produce a very simple, practical and sanitary device in which an electric lamp has a hinge connection with the battery, and is arranged so that when the lamp is inserted, for instance, in the mouth of a patient, the lamp carrying part will serve to depress the tongue and the act of depressing the tongue will cause the circuit to be closed through the battery, so that the mouth and throat will be thoroughly illuminated. In carrying out this idea I preferably use a tongue piece which can be of wood, celluloid, or other material, and which serves to make contact with the tongue, and which after use can be removed and thrown away so that the patient can always feel sure that a fresh clean tongue piece is used. More specifically, my invention consists of a handle portion adapted to carry a standard or other preferred portable battery, a hinge member connected with the handle portion, and a lamp carried by the hinge member and with the circuit closing device arranged to close the circuit through the lamp when the hinge member is swung to the position at an angle to the handle member. My invention also consists in other details which render it simple and efficient in use, which details will appear from the description which follows.

Reference is to be had to the accompanying drawings forming a part of this specification, in which similar reference characters indicate corresponding parts in all the views.

Figure 1 is a side elevation showing the application of the device to the mouth of a patient.

Fig. 2 is a side elevation of the apparatus with the tongue piece hanging against the handle member.

Fig. 3 is a front elevation of the apparatus as shown in Fig. 2, and

Fig. 4 is a longitudinal section thereof.

The apparatus is provided with a tubular handle portion 10 which is substantially like the tube ordinarily used to contain a portable standard battery, and this at one end is provided with a removable cap 11 to close the end in which the battery is usually inserted, while at the other end the tube is provided with an insulating plug 12 which fits closely in the tube or handle, but can be removed when desired.

Extending transversely into the plug 12 is a metallic tube 13 which carries a contact pin 14, this projecting from the tube end and contacting at its inner end with the spring 15 which pushes the pin outward and affords a yielding contact as will hereinafter appear. The tube 13 makes contact with the battery by means of a screw 16 which extends into the plug from the inner end thereof, and the screw serves the double purpose of binding the tube 13 in place and of making contact with the battery.

A swinging member 17 hangs from the upper part of the tubular handle 10, this member being hinged to the handle as shown at 18, and it is arranged to project above the hinge as shown at 17^a, this projecting portion being shaped to fit the handle so that when the member 17 is extended horizontally as shown in Fig. 1, the part 17^a will serve to brace and strengthen the said member. The member 17^a is preferably hollow or socketed at its free end as shown at 18^a so as to receive the tongue piece 17^b. This tongue piece is preferably of wood, though it can be of any other suitable material, but it should be of cheap material so that when once used it can be thrown away. It is adapted to contact with the tongue of a patient as shown in Fig. 1.

The member 17 carries a lamp tube 19 which is securely fastened thereto, and this is preferably enlarged slightly at one end as shown at 20 to receive a standard electric lamp 21. The lamp screws into the tube as usual, but it may have any suitable connection, and has at its inner end a contact pin 21^a extending through an insulating washer 22 in the tube. The contact pin contacts with a spring 23 which is held in the tubular insulating plug 25 of the tube 19, and presses the contact pin 24 which projects from the inner end of the plug 25, and has preferably a broadened and flattened

contact surface 26 which is adapted to contact with the pin 14 when the members 17 and lamp tube 19 are moved to a position at essentially right angles to the tube 10 as shown clearly in Fig. 1. It will be seen that both the contact members 14 and 26 have a yielding backing, so that the contact is an easy but firm one.

When the device is to be used, a fresh tongue piece 17^b is inserted in the member 17, and the tongue piece inserted in the mouth of a patient and pressed down so as to depress the tongue, and this action brings the contacts 26 and 14 together, thus closing the circuit and lighting the lamp. The tongue piece also serves in a measure as a reflector, and by the simple act of inserting it, the lamp becomes lighted, and the mouth and throat fully illuminated.

It will be seen that I have described a very simple and efficient structure for the purpose stated, and it is obvious that in many details the structure can be changed considerably without in the least affecting the invention. The main thing is to have the swinging lamp with its hinge connection with the battery tube 10 so that when the lamp is inserted against the tongue the circuit will be closed as stated, and it is also important to have the tongue piece arranged as shown, and preferably removable, but the particular structure of the member 17, the form of its connection with the tube, and the manner of attaching and hanging the lamp socket can obviously be changed materially without affecting the invention.

In the foregoing description I have not referred to any lamp circuits in detail, because these are precisely as usual in battery lamps.

I claim:—

1. An apparatus of the kind described comprising a tubular handle serving as a battery holder, a freely swinging lamp carrying member hinged to the handle, and means actuated by swinging out the lamp carrying member for closing the circuit through the lamp.

2. An apparatus of the kind described comprising a tubular battery holder serving as a handle, an electric lamp hingedly supported and swinging freely on the handle, and means for closing the circuit through the lamp by swinging the lamp outward with relation to the handle.

3. An apparatus of the kind described comprising a tubular battery handle, a lamp hingedly supported and swinging freely on the handle, and yielding contacts for closing the circuit through the lamp when the latter is swung outward with relation to the handle.

4. An apparatus of the kind described comprising a tubular battery carrying handle, a freely swinging member hinged to

the handle and adapted to enter the mouth of a patient, a lamp carried by said member and means for closing the circuit through the lamp when the lamp carrying member is swung outward with relation to the handle.

5. An apparatus of the kind described comprising a battery carrying handle, a freely swinging member hinged to the handle, a lamp carried by said member, and means for closing the circuit through the lamp when the latter is swung outward with relation to the handle.

6. An apparatus of the kind described comprising a battery carrying handle, a member hinged to the handle and adapted to swing outward with relation thereto, a lamp carried by said member, a yielding contact carried by said member, and a contact on the handle adapted to engage the first mentioned contact.

7. An apparatus of the kind described comprising a battery carrying handle, a member hinged to the handle, and swinging outwardly therefrom, a detachable tongue piece on said member, an electric lamp carried by the said member, and contacts between the lamp and battery, said contacts being closed by the outward movement of said swinging member.

8. An apparatus of the kind described comprising a battery carrying handle, an outwardly swinging member on the handle, an electric lamp on said member, and means for closing the circuit through the lamp, said means comprising the contact on the swinging member and the contact on the handle.

9. An apparatus of the kind described comprising a tubular battery carrying handle, a plug in the handle end, a pin yieldingly supported in the plug and projecting laterally therefrom, a connection between the pin and the battery, a lamp carrying member hinged to the tubular handle, and a contact on said member to strike the aforesaid pin.

10. An apparatus of the kind described comprising a tubular battery carrying handle, an insulating plug in the handle end, a contact pin yieldingly supported in the plug and projecting laterally therefrom, a retaining screw forming a connection between the pin and the battery, a hinged member mounted on the handle, a lamp carried by the member, and a contact connected with the lamp and adapted to touch the aforesaid pin.

11. An apparatus of the kind described comprising a battery carrying handle, a swinging member hinged to the handle and having its inner end shaped to partly straddle the handle and serve as a brace, a lamp carried by the swinging member, and means for closing the circuit through the lamp.

12. An apparatus of the kind described
comprising a tubular handle serving as a
battery holder, a freely swinging member
hinged to the handle and carrying an elec-
5 tric lamp at its free end, and circuit closing
means between the lamp and the battery in
the handle, said means being actuated by the

outward swinging of the lamp carrying
member.

JOSEPH STERN.

Witnesses:

WARREN P. HUTCHINSON,
M. G. O'DONNELL.