Nov. 19, 1946. C. I. BROWN 2,411,189

READING LAMP

Filed May 3, 1945

Fig. 1.

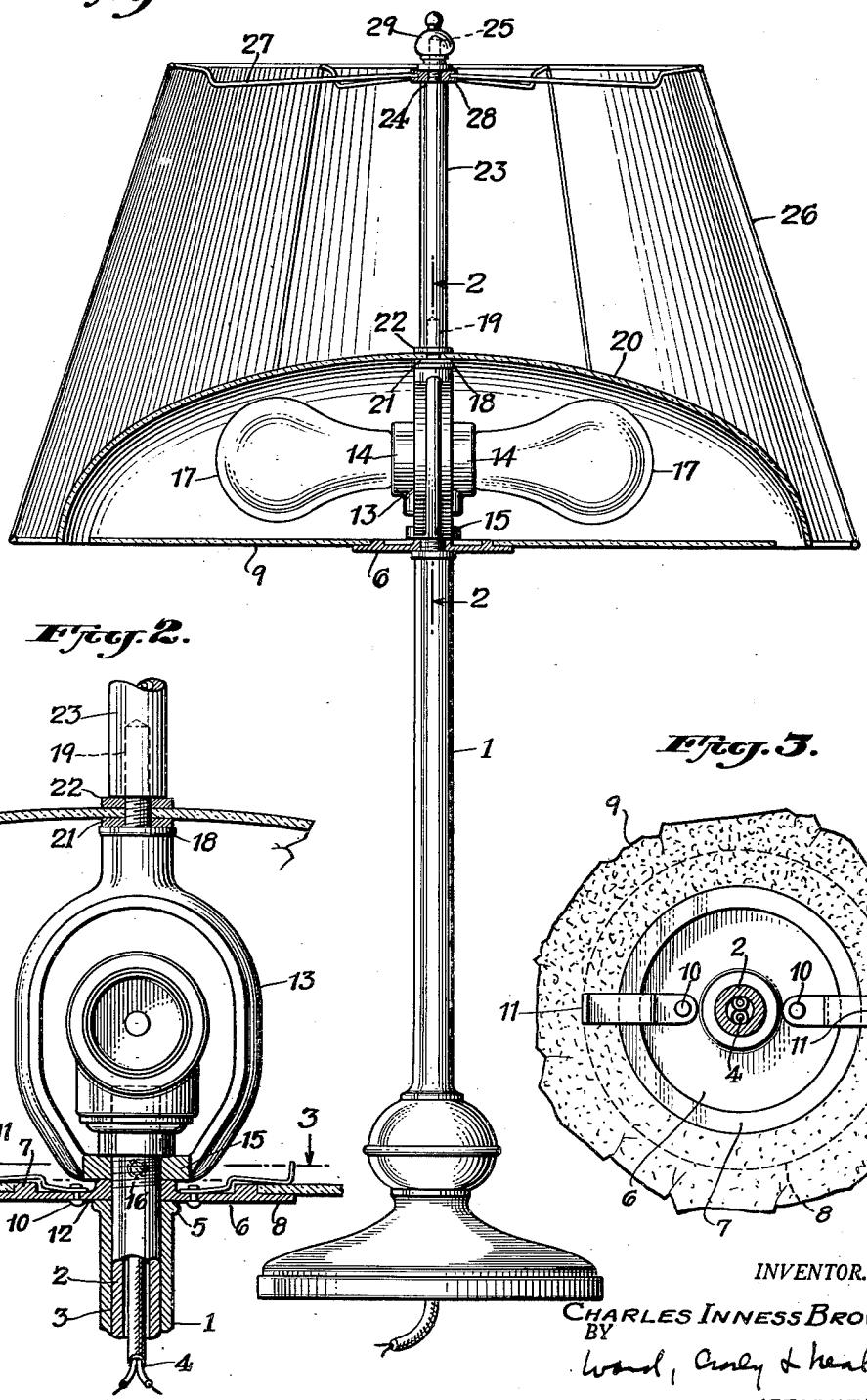


Fig. 2.

Fig. 3.

INVENTOR.
CHARLES INNESS BROWN.
BY
Wood, Cooley & Heal.
ATTORNEYS.

Patented Nov. 19, 1946

2,411,189

UNITED STATES PATENT OFFICE

2,411,189

READING LAMP

Charles Inness Brown, Floral Park, N. Y.

Application May 3, 1945, Serial No. 591,709

1 Claim. (Cl. 240—81)

1

This invention pertains to improvements in reading lamps, of shaded, incandescent lamp construction.

A type of reading lamp commonly encountered, is that employing an opaque or translucent shade made of parchment or the like, and which is of cylindrical, truncated or other open-ended configuration.

In reading lamps of this type, as heretofore constructed, a great deal of the illumination from the incandescent bulbs is directed upwardly through the upper aperture of the shade onto the ceiling, and hence is effectively lost for reading purposes.

In accordance with one aspect of my invention, I propose to greatly increase the reading illumination, for a given wattage of the incandescent bulbs, by providing within the shade, a supplemental light-reflecting, and, preferably, translucent dome, so mounted as to span the incandescent bulbs, and thereby reflect downwardly onto the reading area, a part or all of the illumination heretofore directed through the top of the shade onto the ceiling. This dome is of smaller diameter or cross-sectional area than that of the lamp shade, and is arranged within and wholly surrounded by the shade, so that its presence is not observable when viewing the lamp from normal positions, i. e., in a horizontal or substantial horizontal direction. This dome is preferably made of glass or other vitreous material.

As an additional feature of the invention, I provide a light-diffusing screen, mounted below the incandescent lamp bulbs in the path of the downwardly directed illumination, and of such dimensions as to intercept and diffuse all or substantially all thereof. This diffusing screen is preferably so colored, for example, a light blue-green, as to provide a so-called "daylight" illumination of the reading surface.

Thus, in essence, the preferred reading lamp construction of my invention comprises an upstanding support or base, usually of slender, columnar configuration, carrying at its upper end a socket member for reception of one or more incandescent lamp bulbs. The reflecting dome, above referred to, which is preferably translucent, is mounted upon the upper portions of the socket member, coaxially with the base, this dome being of such dimensions and arcuate contour as to span the incandescent lamp or lamps carried by the socket member, to reflect downwardly over a desired reading area, all or a major portion of the illumination emitted therefrom.

2

Also threaded into the upper portion of the socket member, is a columnary extension member projecting upwardly beyond the dome, for supporting the lamp shade concentrically with the dome, the shade being of such dimensions as to completely surround the dome in spaced relation thereto, thereby normally to hide the same from view. The shade may be made of any suitable material, such as parchment, cloth, etc., and may be opaque or translucent as desired. The dome on the other hand is preferably made of glass or other vitreous material, and is ordinarily made translucent. With this construction, the relatively small portion of illumination transmitted upwardly through the translucent dome is directed upwardly onto the ceiling through the upper aperture in the shade, thereby to provide a relatively soft amount of background illumination in the room; while the major portion of the illumination is reflected downwardly by the dome into the reading area.

As above stated, the lamp is preferably provided with a translucent, light-diffusing screen, for providing the "daylight" illumination effect over the reading area, this screen comprising ordinarily a centrally apertured disc of etched glass or the like and of a light blue-green color. This screen is assembled on a metal supporting shelf carried by the lamp base below the socket member, whereby it intercepts and diffuses the downwardly directed illumination, while imparting the "daylight" illumination effect thereto by virtue of its color-absorption properties.

In the drawing:

Fig. 1 is a view in elevation and partly in axial cross-section, through the shade, dome and screen assembly of a preferred reading lamp construction in accordance with the invention;

Fig. 2 is a sectional detail taken substantially at 2—2 of Fig. 1, showing the lamp socket assembly with associated supporting means for the dome, shade and diffusing screen; while

Fig. 3 is a sectional detail taken substantially at 3—3 of Fig. 2, to illustrate the manner of removably mounting the diffusing screen on the lamp-supporting base or standard.

Referring to the drawing, the assembly comprises an upstanding lamp base or standard 1, of preferably columnar configuration as shown. As shown in Fig. 2, the base 1 consists of inner and outer metal sleeves 2, 3, the inner sleeve providing a tubular passageway for the lead-in conductors 4 from the base to the lamp socket. The outer sleeve 3 terminates at its upper end in a flanged collar 5, while the inner sleeve 2 projects

upwardly beyond the collar 5 to provide a spindle. Assembled over this spindle in a sliding fit and resting on the collar 5, is a centrally apertured, disc-like, metal supporting member 6, provided with a peripherally extending, upstanding shoulder 7 and a flanged portion 8 extending radially therefrom. The above-mentioned centrally apertured, light-diffusing screen 9 is assembled on this supporting member 6, in such manner that the disc rests on the outer flanged portion 8 of supporting member 6, while the upstanding shoulder 7 thereof serves to center the diffusing screen.

For lockingly maintaining the diffusing screen in the assembled relation shown in Fig. 2, the metal supporting disc 6 has rotatably riveted thereto, as at 10, a pair of lugs 11 of metal or equivalent, these lugs being rotatable inwardly about the pivotal points provided by the rivets 10 so as to lie wholly within the shoulder 7 of support 6, whereby the diffusing screen 9 may be assembled in the relation shown, the lugs 11 being thereafter rotated outwardly, to lockingly engage the diffusing screen 9.

The metal supporting disc 6 is provided with a central collar portion 12 surrounding the spindle 2. An incandescent lamp socket member 13 carrying one or more lamp sockets, such as 14, is provided with a lower supporting collar portion 15 adapted to fit slidably over the spindle 2, and to rest upon the collar portion 12 of the supporting disc 6. A screw 16 threaded into the collar 15 and frictionally engaging the inner sleeve 2, serves to secure the lamp socket member 13 and the metal supporting disc 6 in assembled relation, as shown in Fig. 2. The lamp sockets 14 carry incandescent lamp bulbs, such as 17.

The socket member 13 terminates at its upper end in a shoulder 18 and a threaded spindle 19 projecting upwardly therefrom. The above-mentioned light-reflecting and preferably translucent dome 20 of glass or the like, is provided with a central aperture for assembling the dome concentrically over the spindle 19, the dome resting upon and being supported by the shoulder portion 18 of the socket member 13. For preventing

breakage of the dome, a washer 21, or rubber, synthetic resin, or the like, is interposed between the shoulder 18 and the dome 20. Likewise, a second and similar washer 22 is assembled on the spindle 19 above the dome 20, and a metal extension member 23, having at its lower end, an internally threaded recess, is screwed onto the spindle 19, as shown.

The extension member 23 terminates at its upper end in a shoulder 24 and a threaded spindle 25 of smaller diameter, onto which is assembled a lamp shade 26 of parchment or the like, the shade being provided for this purpose with radially extending, wire supporting members 27, welded or otherwise integrally joined to a central sleeve member 28, which is centrally apertured to fit slidably over the spindle 25, the shade being held in place by a knob 29 having a threaded recess threading onto the spindle 25. As stated the shade 26 may be opaque or translucent as desired, and is ordinarily of cylindrical, truncated or other open ended configuration.

What is claimed is:

A reading lamp, comprising: an upstanding support, comprising outer and inner sleeve members, said outer sleeve member terminating in a collar and said inner sleeve member projecting beyond the same in the form of a spindle, a centrally apertured supporting disc fitting over said spindle and resting on said collar, a centrally apertured light-diffusing screen carried by said supporting disc, said supporting disc having means for lockingly engaging said light-diffusing screen, a socket member for incandescent lamps mounted on said spindle, a centrally apertured light-reflecting dome carried by an upstanding spindle of said socket member, said dome spanning the socket member and incandescent lamp means carried thereby for reflecting light downwardly through said diffusing screen, an extension member threaded onto said socket spindle, and a lamp shade carried by said extension member, said lamp shade being spaced from and surrounding said dome.

CHARLES INNESS BROWN.