G. FRANKEL.

ELECTRIC LAMP SOCKET.

APPLICATION FILED JAN. 13, 1919.

1,332,867.

Patented Mar. 2, 1920.

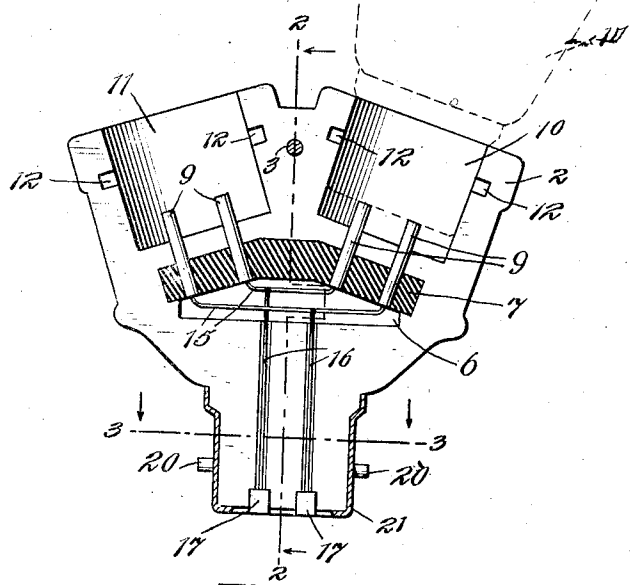


Fig. 1.

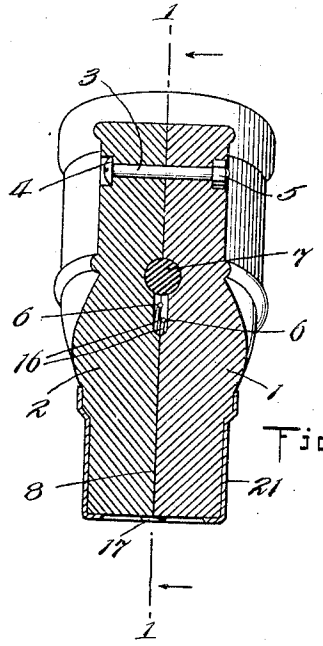


Fig. 2.

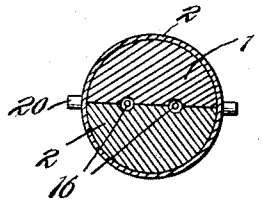


Fig. 3.

WITNESSES

Gustav Frankel INVENTOR

BY Mock & Blum

ATTORNEYS

UNITED STATES PATENT OFFICE.

GUSTAVE FRANKEL, OF NEW YORK, N. Y.

ELECTRIC-LAMP SOCKET.

1,332,867. Specification of Letters Patent. Patented Mar. 2, 1920.

Application filed January 13, 1919. Serial No. 270,814.

To all whom it may concern:

Be it known that I, GUSTAVE FRANKEL, a citizen of the United States, residing at New York, in the county of New York and State of New York, have invented certain new and useful Improvements in Electric-Lamp Sockets, of which the following is a specification.

My invention relates to a double socket, of the kind that are inserted into a suitable electric light fixture and furnish two connections or two sources of current.

Devices of this character are used in great quantities when it is desired to draw a current for a table lamp as well as for an ordinary electric light from a single socket, and for a variety of other purposes, and numerous structures have been proposed for this purpose.

The object of my invention is to produce a double socket of great simplicity and cheapness that can be quickly manufactured and assembled and shall be very reliable in preventing cross-circuits, short circuits, and the like.

Other objects of my invention will be set forth in the following description and drawings which illustrate a preferred embodiment thereof.

Figure 1 is an elevation view partially in section of my proposed device, and is a section on the line 1—1 of Fig. 2.

Fig. 2 is a section on the line 2—2 of Fig. 1, part of it being in perspective.

Fig. 3 is a section on the line 3—3 of Fig. 1.

All of the sections are in the directions of the arrows on the respective lines on which they were taken.

The socket is made of two similar halves 1 and 2 which are pressed out of some suitable composition which is made of an insulating material, and it is preferably a poor conductor of heat. Numerous compositions out of which the parts 1 and 2 can be molded or cast in suitable dies, or by other methods, are old and well-known in the art, so that they require no specific mention, as my invention is neither directed nor limited to any specific composition. The sections or halves 1 and 2 are connected by a bolt 3, whose head 4 is countersunk in a suitable recess in section 1, and whose nut 5 is countersunk in a like recess. Each of the sections 1 and 2 has a recess 6 formed therein, so that when they are fitted and firmly pressed together by means of the bolt 3, a cavity is formed in the assembled structure.

As seen in Fig. 1, the sections carry a projecting bridge 7 of similar insulating material, which coöperates with the corresponding recesses in the sections so that the parts can be accurately fitted together along the line of division 8. Into this bridge 7, pins 9 are secured during its molding or shaping, so that they project into the socket portions 10 and 11. These socket portions 10 and 11 are provided with lateral bayonet recesses 12, for coöperation with the head of an ordinary bulb 14, provided with projections that fit into the bayonet sockets 12, and that form electrical connection with the pins 9, the bulb 14 being held in the socket by the well-known bayonet construction.

The pins 9 are connected in pairs by the wires 15, which are laid in grooves in the recess 6, so that as seen in Fig. 2, the wires 16 which may contact with the metal terminals 17, do not contact with wires 15, and are reliably held against forming cross circuits. The head of the fixture is provided with pins 20, for the insertion into a suitable bayonet socket into the electric light fixture from which the current is drawn. If desired, the head 21 of the fixture, which may be called the main head portion of the device, may be made of metal in the usual manner. The current is drawn from the mains and divides into two circuits by the connections shown to the two sockets 10 and 11, so that two bulbs may secure power from a single fixture.

As seen in Fig. 3, the sections 1 and 2 are recessed along their line of union 8 so as to hold the wires 16 permanently in proper position. The wires 16 may be soldered or fastened in any convenient manner to the terminal 17.

In this preferred embodiment of my invention, the entire structure consists of three parts which can be very readily assembled and in which the parts are prevented from any movement relative to each other.

The wires 15 and 16 may be covered with insulating material if desired.

It is obvious that if desired, the bridge 7 could be permanently connected to either of the sections 1 and 2 or made integral with either of them, and that other omissions and changes of parts can be made without departing from the spirit of my invention.

I claim:—

1. In combination, a double socket comprising two like halves, each of these halves including a main head portion and branch socket portions, so that when the said halves are joined together, they form a main head adapted to be connected to a source of electricity and branch sockets adapted to be connected through the said main head to the said source, means for connecting the said halves together, and a bridge made of moldable insulating material intermediate and held by the said halves when they are connected, the said bridge carrying electrical means for leading current from the said source through the said main head to the said branch sockets.

2. In combination, a double socket having two like halves, each of said halves comprising branch socket portions made of insulating material, the said halves being connected by a main head made of metal, a bridge of insulating material intermediate and held by the said halves when they are connected, means for connecting the said halves together, the said main head portions being provided with metal pins, so that the main head can be inserted into a bayonet socket, metal terminals secured at the interior of the said main head and projecting metal pins carried by the said bridge and projecting in pairs into the said branch sockets, the said projecting metal pins being connected to the said terminals of the main head so as to be adapted to make a complete circuit when they are electrically connected, the said branch sockets being provided with recesses so that a bayonet head may be secured therein and contact with the said projecting metal pins.

3. In combination, a double socket having two like halves, each of said halves comprising branch socket portions made of insulating material, the said halves being connected by a main head made of metal, a bridge of insulating material intermediate and held by the said halves when they are connected, means for connecting the said halves together, the said main head portions being provided with metal pins, so that the main head can be inserted into a bayonet socket, metal terminals secured to the interior of the said main head and projecting metal pins carried by the said bridge and projecting in pairs into the said branch sockets, the said projecting metal pins being connected to the said terminals of the main head so as to be adapted to make a complete circuit when they are electrically connected, the said branch sockets being provided with recesses so that a bayonet head may be secured therein and contact with the said projecting metal pins, the part of said bridge intermediate the said socket portions being at right angles to the line of division between the said halves, and the other parts of the said bridge being inclined to the said line of division.

4. In combination, a double socket having two like halves, each of said halves comprising branch socket portions made of insulating material, the said halves being connected by a main head of metal, and a separate bridge made of insulating material and adapted to be placed intermediate and to be held by the said halves when they are connected, and means for connecting the said halves together, the said bridge having electrical connecting means adapted to place the said main head portion in electrical communication with the said branch sockets when the structure is assembled.

In testimony whereof I hereunto affix my signature.

GUSTAVE FRANKEL.