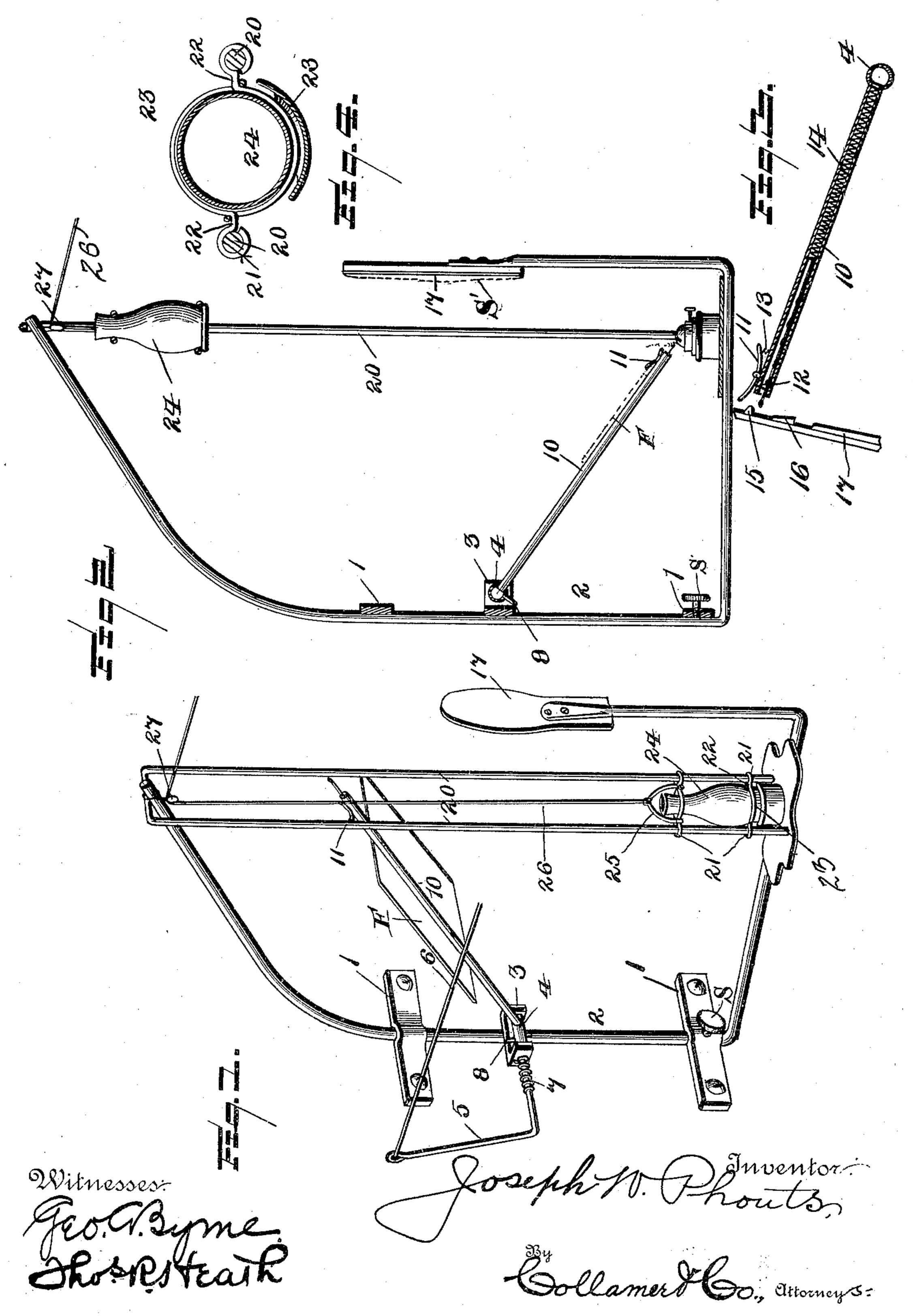
J. W. PHOUTS. LAMPLIGHTER.

(Application filed Sept. 25, 1899.)

(No Model.)



United States Patent Office.

JOSEPH W. PHOUTS, OF OLNEY, NORTH CAROLINA, ASSIGNOR OF ONE-HALF TO ROBERT W. S. PEGRAM, OF DELLAPLANE, NORTH CAROLINA.

LAMPLIGHTER.

SPECIFICATION forming part of Letters Patent No. 652,633, dated June 26, 1900.

Application filed September 25, 1899. Serial No. 731,667. (No model.)

To all whom it may concern:

Be it known that I, Joseph W. Phours, a citizen of the United States, and a resident of Olney, Alleghany county, State of North Caro-5 lina, have invented certain new and useful Improvements in Auto-Lamplighters; and my preferred manner of carrying out the invention is set forth in the following full, clear, and exact description, terminating with claims par-

to ticularly specifying the novelty.

This invention relates to lamps, and more especially to lighting systems used in connection therewith; and the object of the same is to produce a device wherein more espe-15 cially a lamp or gas-jet in a remote room can be lighted by the operator while lying in bed or while located in an apartment other than that containing the lamp to be lighted. It is well known that if one discovers the presence 20 of a burglar in his room or an adjacent room and he arises and strikes a match he places himself at the mercy of the intruder. On the other hand, if he can remain in the dark and light a lamp or gas-jet at a distance from his 25 own person the light falling on the burglar places the latter at the mercy of the householder. Again, it is often desirable to light the gas or a lamp in some other apartment than that occupied by the person doing such 30 lighting. My present invention contemplates the successful accomplishment of this object.

To this end the invention consists in a lamplighting system or a device connected by cords with a remote apartment, whereby the 35 light can be struck by a pull on the proper cord; and the invention also consists in the specific details whereby this general object is attained, all as hereinafter more fully described and claimed and as shown in the ac-

40 companying drawings, wherein—

Figure 1 is a general perspective view of the lamplighter and the chimney-raising device. Fig. 2 is a sectional view illustrating the chimney as raised and the lamplighter 45 depressed and in the act of igniting the lamp. Fig. 3 is an enlarged sectional view of the match-lever and cooperating parts which are employed when said lever is in magazine form, the parts being shown in position at the com-50 mencement of a stroke. Fig. 4 is a horizontal sectional view through the guides for the | by a second match. The head of the latter

chimney, showing the latter with a reflector such as may sometimes be employed.

Referring to the said drawings, the numerals 1 designate brackets secured to an upright 55 support, such as the wall, and 2 is a framework carried thereby and of proper construction to support the parts hereinafter described. On this framework is a bearing 3, in which is journaled a rock-shaft 4, having 60 at one extremity an operating-lever 5, from whose outer end leads a cord 6, that may be carried over pulleys (not shown) to any remote point, such as a handle or ring, which stands within convenient reach of an opera- 65 tor lying in bed. It will be understood that there may be several of these devices, although only one is shown, and the cords from all these devices can lead to different handles or rings located within reach of the op- 70 erator, and to this extent my invention constitutes a system of striking lights or lighting lamps or gas-jets from a remote point. I might add in this connection that the other cords hereinafter described (when they are 75 employed) are similarly led to within convenient reach of the operator in order to perfect the system. Said rock-shaft 4 is preferably turned in one direction by a spring 7, and a stop 8 through the shaft strikes the 80 bearing to limit the turning of the shaft in one direction under the impulse of this spring. Mounted in this shaft is a lever 10, which is preferably made tubular, so as to receive in its outer end the stem of a match, and 11 is a snap 85 pivoted in this lever and having a dog passing through a hole in the lever and adapted to clamp the stem of the match therein when this dog is thrown in its normal position by a spring 13. This is the simplest form of my 90 device, but the lever may become a magazine by making it tubular throughout, as seen in Fig. 3, and inserting therein a spring 14, whose tendency is constantly to press outward a number of matches, with which the 95 magazine can be loaded. When so constructed, there is a trip 15 properly located to engage the outer end of the snap 11 as the lever descends. This raises the dog 12 and releases the stem of the burned match last 100 used, which stem flies outward and is followed

strikes a smooth stop 16, which is also properly located, and this prevents the second match from passing outward too far. Just at this moment the free end of the snap 11 slides off the trip 15, and its spring 13 causes the dog 12 to engage the stem of the second match while the head of the latter rests against the stop 16.

17 is a piece of sandpaper or other rough abrading material supported by the framework beneath the stop 16, and in the descent of the lever with the fresh match carried thereby the head of the latter moves across this sandpaper and is ignited. The lever then moves downward to carry the lighted match to the lamp or gas-jet, as described below.

In Fig. 4 is best seen two upright rods 20 standing astride the lamp, if one is employed, 20 and supported by the framework 2. On these rods, which serve as guides, move eyes 21 at the outer ends of yokes 22, having circles 23 at their centers, which embrace the lamp-chimney 24 at its lower end and at or near its upper end, and to the upper yoke is attached a bail 25, from which leads a cord 26, which passes over a pulley 27, located at the upper ends of the guides 20, and which leads to a remote room and forms a part of the system 30 above described.

If this lamplighter is used in connection with the ordinary kerosene-lamp, it will obviously be necessary to raise the chimney thereof or the lamp itself cannot be lighted, 35 and this is done by pulling first on the proper string just above described. Thereafter the lever is caused to descend to ignite the match and to light the lamp, after which the spring causes the lever to resume its former position, 40 and then the chimney is lowered onto the lamp in a manner which will be clear; but if this device is used in connection with a gasjet or with a lamp of such construction that no chimney is employed the last-mentioned 45 portion of my invention may be omitted and the entire system will be simpler by reason thereof.

Other changes in the details of construction may be adopted without departing from 50 the general idea. The lever may contain only one match, which is inserted at bedtime and held by a suitable snap instead of being a magazine for the reception of a number of matches. I have not shown the manner in 55 which the various cords can be led over pulleys to a remote point or central station, because this is too well understood to require special illustration and description. However, it will be understood that the intention 60 is to so arrange the parts that an operator while in bed or located in some remote position may light the lamps in rooms that are remote, and by this word "lamp" I desire to be understood herein as including a candle, 65 an oil or other wick lamp with or without a chimney, or a gas or other vapor lamp. The relative sizes, proportions, and materials of

parts are not essential to the successful operation of the whole.

Among the modifications which occur to me 70 at this time and which may be well to mention I would state that a set-screw S might be inserted through one of the brackets 1, as seen in Fig. 2, so as to permit the framework to be turned at any desired angle and held in 75 such position. A fan F might be attached to the lever 10, so that a quick pull on the cord would cause it to blow out the lamp, and the sandpaper 17 might be made bulging or yielding, as indicated in dotted lines at S, in order 80 to prevent the breaking of the match as it is struck thereon.

What is claimed as new is—

1. In a lamp lighter and extinguisher, the combination with the lamp; of a framework, 85 a rock-shaft supported therein and having an operating-lever, means for moving this lever at desired speed from a remote point, an igniting device carried by the framework, a match-carrying lever projecting from said 90 rock-shaft and adapted to move the head of a match across said igniting device and into position to light the lamp, and a fan on this lever, as and for the purpose set forth.

2. In a lamplighter, the combination with 95 the lamp, and an igniting device; of a rock-shaft with means for moving the same, a tubular lever projecting therefrom, an expansive spring within this tubular lever for forcing a series of matches outward therein, a 100 spring-actuated snap carried by the lever for holding the outermost match in position to be engaged by said igniting device as the lever moves, and means for tripping said snap and limiting the outward movement of the 105 last match, as and for the purpose set forth.

3. In a lamplighter, the combination with the lamp, and an igniting device; of a rock-shaft with means for moving the same, a tubular lever projecting therefrom, means for moving a series of matches outward within this lever, a spring-actuated snap mounted on the lever and having a dog normally engaging the stem of the outermost match, a trip for raising said dog as the lever descends, 115 and a stop beneath the trip for limiting the outward movement of the last match, the whole operating substantially as and for the purpose set forth.

4. In a lamplighter, the combination with 126 the lamp, the igniting device, the framework supporting them, a rock-shaft carried by said framework, and means for moving this shaft from a remote point; of a tubular lever mounted in the shaft, a snap pivoted between 125 its ends on said lever, a dog in its outer arm entering the lever, a spring bearing the dog normally therein, a trip carried by the framework and adapted to raise the outer end of the snap as the lever descends, and a stop 130 also carried by the framework and adapted to limit the outward movement of the live match while the snap is raised, all substantially as described.

5. In a lamplighting system, the combination with a framework having two upright guides, a rock-shaft journaled in the framework, means for moving it from a remote point, a match-carrying lever projecting from said shaft, and an igniting device across which the match is moved; of a pair of yokes having eyes moving on said guides and circles embracing the lamp-chimney, a bail connected with the uppermost yoke, and a cord leading

therefrom over a pulley at the upper end of said guides and to a remote point, all as and for the purpose set forth.

In testimony whereof I have hereunto subscribed my signature this the 25th day of Au- 15 gust, A. D. 1899.

JOSEPH W. PHOUTS.

Witnesses:

WM. G. SHEPPARD, GEORGE SHEPPARD.