April 2, 1935. F. E. BILLINGS 1,996,563

FLASH LIGHT PEN AND PENCIL

Filed Oct. 18, 1934

Fig. 1

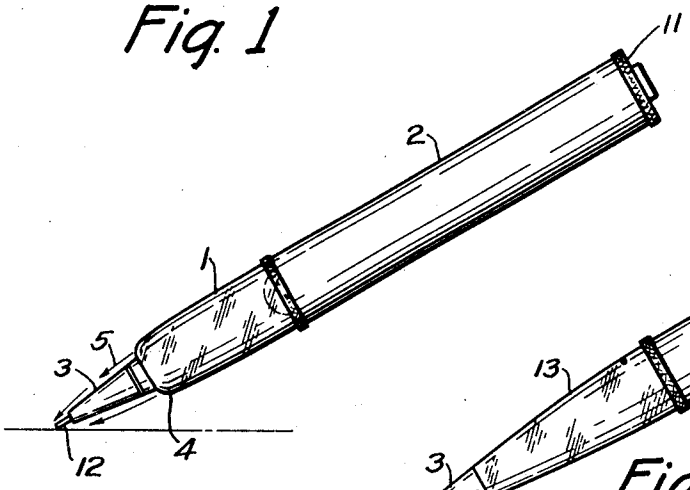


Fig. 2

Fig. 3

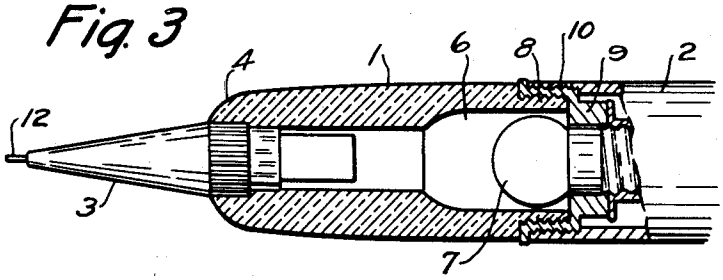
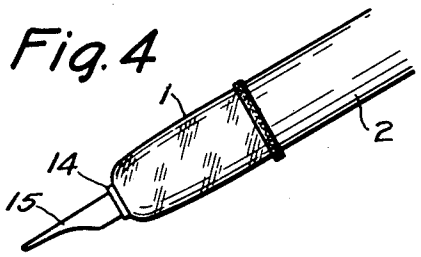


Fig. 4



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1,996,563

FLASH LIGHT PEN AND PENCIL

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Application October 18, 1934, Serial No. 748,854

1 Claim. (Cl. 240—6.46)

The purpose of this invention is to provide means in a pen or pencil for producing a light around the point thereof, so that one may write in the dark.

The invention is a pencil, or the like, having a battery with a miniature light incorporated therein and with a part of the pencil between the battery and point made of substantially transparent material, permitting the light to be projected around the point.

The object of this invention is, therefore, to provide means for incorporating an electric light within the limits of a pen or pencil, so that the pen or pencil may be used in the ordinary manner, and so that it may readily be carried in a pocket or purse without taking up additional space.

Another object is to provide means for incorporating a battery and flash light in a pencil or pen which does not increase the length thereof.

Another object is to provide a combination pencil having an electric light therein, in which the light may be used independent of the pen or pencil.

Another object is to provide a combination pen or pencil having an electric light therein, in which the parts may be provided and sold as separate and independent units.

Another object is to provide a pen or pencil having a flash light therein, in which the light is surrounded by a transparent shield, which forms part of the pencil, and which is non-breakable.

A further object is to provide a combination flash light pencil in which the lead thereof may readily be replaced.

And a still further object is to provide a pen or pencil having a flash light therein, which is of a simple and economical construction.

With these ends in view the invention embodies a comparatively small cylindrical flash light having a battery therein and with a bulb in one end, a substantially transparent section adapted to be attached to the flash light and placed over the bulb, and a pen or pencil installed in the end of said transparent section.

Other features and advantages of the invention will appear from the following description, taken in connection with the drawing, wherein:

Figure 1 is a view showing the complete device in the form of a pencil, in which the transparent section bulges out around the point, providing means for directing light rays to the point.

Figure 2 is a view showing the point of a pencil of an alternate design, in which the transparent section tapers with the outer surface of the point.

Figure 3 is a longitudinal section thru the point showing the design shown in Figure 1.

Figure 4 is a view showing a point similar to that shown in Figure 1, showing a pen point instead of a pencil.

In the drawing the device is shown as it may be made wherein numeral 1 indicates the transparent section, numeral 2 the battery forming the upper part of the pencil, and numeral 3 the point.

The section 1 may be made of celluloid, pyralin, or any transparent, translucent, or semi-transparent material, and this may be of any shape or design. In the design shown, this section is illustrated as forming a part of a pencil or pen between the upper part or handle and the point; however, it will be understood that this section may extend the full length of the pencil, and the point and battery may be incorporated therein, or it may be of any size, shape or design. This section may also be substantially solid, as shown in Figure 3, or the walls thereof may be thin or thick, as may be desired. In the design shown, the section 1 is formed so that the lower end thereof adjacent the point, bulges at the point 4, thereby providing a substantially transparent area extending out beyond the outer surface of the point 3, so that light rays may pass to the point of the pencil, as indicated by the arrows 5 in Figure 1; whereas it will be understood that if the outer surface of this section tapers with the point, as shown in Figure 2, the light rays will extend around the point, but will leave a small dark area at the point. It will be appreciated that this section may be shaped in any other manner in order to direct the light rays to the point.

This section 1 is provided with an opening 6 of a sufficient size to fit over a light bulb 7, and a threaded shank 8 is provided around the bulb, which may be screwed into a bushing 9 in the end of the handle 2, which forms the upper part of the pencil, and which may have suitable electric batteries incorporated therein. In this design, the bushing 9 is threaded in the member 2, as shown at the point 10; however, it will be understood that this bushing may be held in the upper part of the pencil in any manner, and the light bulb may also be mounted therein by any means, and any means may be used for connecting the member 1 to the upper part of the pencil, or to the battery.

The part 2 is commonly known as a pen light,

and is used as a small flash light, and the threads are provided in the bushing 9 so that a cover may be placed over the bulb 7. This part, therefore, is standard equipment and, altho the device is shown in the drawing as using this standard equipment, it is not desired to limit the invention to this, or any, form of battery housing, or any means for holding a light bulb in combination with batteries or cells in the upper part of a pencil. The member 2 is also provided with a switch in the upper end; however, it will be understood that the switch may be located at any point or points, and may be arranged in any manner. It is preferred to operate the switch by turning a nut 11 at the upper end, however, the switch may also be operated by a button or other means. The switch, however, may also be considered as standard equipment, as it is preferred to use this unit as it is now manufactured. The member 1 is preferably screwed into the end of the member 2 over the light bulb, so that the light rays will shine out thru the member 1 and will be directed toward the point of the pencil. The pencil point, as indicated by the numeral 3, is mounted in the end of the member 1, as shown in Figure 3, however, it will be understood that this point may be of any type of design, and may be mounted in the member 1 in any manner, or by any means. The point 3 holds a lead 12, and it will be understood that the lead is adjustable by turning the point, so that it may be moved outward as it is used, and this is also arranged so that the lead may readily be replaced. This point is also standard equipment, such as is commonly used in many mechanical pencils.

In the design shown in Figure 2, the member 1 is replaced by a member 13, and interior of which is similar to the member 1, and this member may be to the members 2 and 3, the same as the member 1. The outer surface, however, is finished so that it is flush with the point, thereby presenting a more pleasing appearance, and it may be that it may be preferred to manufacture the pencil in this design.

In the design shown in Figure 4, the device is similar to that shown in Figure 1, except that the point 3 is replaced by a pen holder 14 having a pen point 15 therein, and it will be understood that the device may be used for either a pen or pencil, and these may be of any design, or arranged in any manner. It will also be understood that this device may also be used for any other purpose, as this invention relates to the incorporating of an electric or flash light inside of a pencil, pen or the like.

It will be understood that other changes may be made in the invention without departing from the spirit of the invention. One of which changes may be in the shape or design of the members 1 and 2 as, whereas these are shown of a cylindrical shape, it will be understood that they may be made of any shape, another may be in the use of a continuous transparent member with the light and battery incorporated therein instead of providing the joint between the two, and still another may be in the use of any other means for holding the writing part of this device in the transparent member.

The construction will readily be understood from the foregoing description. In use the device may be provided as shown and described, and it will be understood that, as hereinbefore stated, the member 1 may be of any transparent or semi-transparent material, and this may be machined or molded or formed in any manner. With this device constructed and assembled as shown, the switch may readily be turned on, so that the light will light, and as the light will throw rays or light around the point, it will be possible to see what you are writing while writing in the dark, and it will be noted that, even tho part of the light rays will be obstructed by the thumb and forefinger, a sufficient amount of the light rays will pass thru the spaces between the fingers to illuminate the surface upon which one is writing. It will also be understood that the device may be used for many other purposes.

It will be noted that this device is provided in separate and independent units, so that the flash light 2 may be sold as one unit, the member 1 and the point 3 as another unit, and the bulb 7 as a third unit, and the units may readily be assembled, as shown and described. These units may, therefore, be manufactured separate and independent, and may be made of various colors and designs, as may be desired.

Having thus fully described the invention, what I claim as new and desire to secure by Letters Patent, is:

An illuminated pencil embodying the combination with a flashlight having a tubular casing, one end of said casing being open, a bushing mounted in said open end carrying a lamp bulb and providing an internally threaded portion surrounding said bulb; of a transparent member of substantially the same diameter as the casing, having threads on one end adapted to be screwed into the bushing end of said casing, and having a mechanical pencil mounted in the opposite end thereof, the outer surface of said member comprising a substantially cylindrical portion terminating in a curved shoulder of substantial depth at the intersection of said member and said pencil, a recess in the screw threaded end of said member adapted to receive the lamp bulb in assembled position, said flashlight adapted for use with or without the pencil, and said transparent member adapted for quick attachment with and detachment from said flashlight.

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