Feb. 25, 1941. R. B. FOSTER 2,232,680

STANDARD TYPEWRITER TYPE CLEANER

Filed Aug. 16, 1939

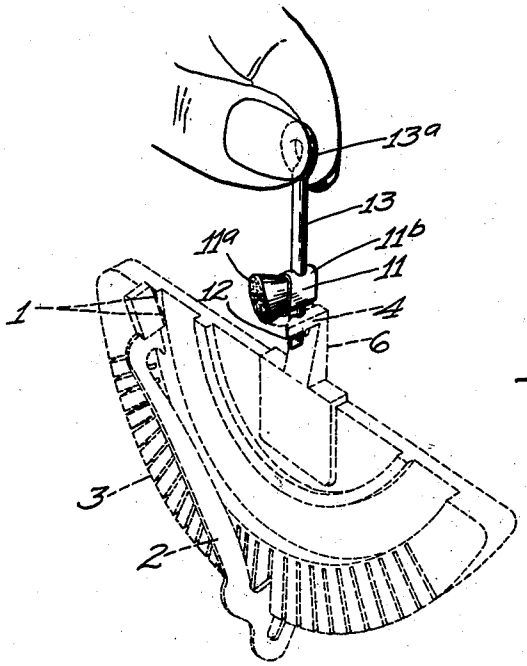


FIG. 1.

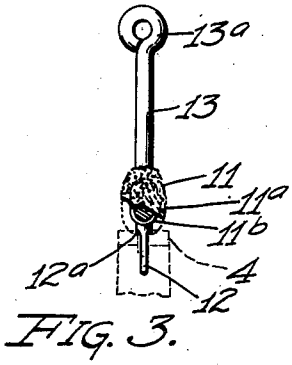
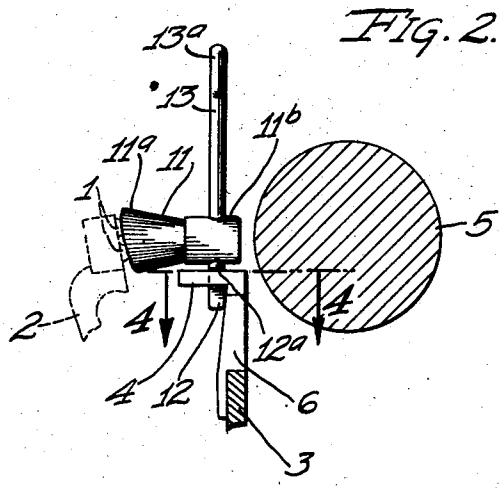


FIG. 3.

FIG. 2.



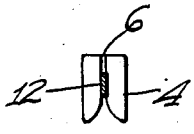


FIG. 4.

Inventor

R. B. FOSTER.

By

William E. Hall

Attorney

Patented Feb. 25, 1941 2,232,680

UNITED STATES PATENT OFFICE

2,232,680

STANDARD TYPEWRITER TYPE CLEANER

Robert B. Foster, Los Angeles, Calif., assignor to John B. Smiley, Los Angeles, Calif.

Application August 16, 1939, Serial No. 290,424

3 Claims. (Cl. 197—184)

My present invention relates to a standard typewriter type cleaning means.

One of the principal objects of this invention is to provide a type cleaner of this class which may be placed in a convenient position on a typewriter so as to be struck by the type carried by the type arms for easily and quickly cleaning the type on all of the arms, which may be done by merely playing or striking the keys as in ordinary typewriting operation.

Another important object of this invention is to provide a cleaner of this class which may be easily and quickly placed in the desired position on the typewriter, guided or supported in such position by necessary portions on the typewriter and manually held in such position while cleaning the type.

Another object of this invention is to provide means of this class for cleaning type without disturbing any portion of the typewriter or any of the papers or work therein.

A very important object of this invention also is the provision of means whereby the whole of the type, or all of the type, on an arm strikes the cleaning element squarely and substantially digs out from all recesses and corners of the type the accumulated ink, wax, gummy matter, or the like.

A further object of this invention is to provide a cleaner of this class which may be easily held in position by two fingers of one hand, and without soiling the fingers in any way, while the keys are struck with the fingers of the other hand.

A still further object of this invention is to provide a cleaner of this class which is very simple and economical of construction, and which will not readily deteriorate or get out of order.

With these and other objects in view as will appear hereinafter, I have devised a typewriter type cleaner having certain novel features of construction, combination, and arrangement of parts and portions, so as to fit in standard makes of typewriters, and to accommodate itself to various parts thereof, as will be hereinafter described in detail, and particularly set forth in the appended claims, reference being had to the accompanying drawing, and to the characters of reference thereon, which form a part of this application, in which:

Fig. 1 is a perspective view of my typewriter type cleaner shown removably positioned on one form of type guide of a typewriter and in position to clean the type of the type supporting arm or bar, all elements other than the cleaner being shown by dotted lines;

Fig. 2 is a side elevational view thereof showing the type guide fragmentarily and by solid lines, but showing the type arm by dotted lines shifted into its upper or cleaning position;

Fig. 3 is a front view thereof showing a portion of my cleaner broken away and in section to facilitate the illustration, and showing the type guide by dotted lines; and,

Fig. 4 is a sectional view taken through 4—4 of Fig. 2 showing the guiding portion of the cleaner in the form of the type guide illustrated, of the typewriter.

The standard typewriter carries the type, designated 1, at the ends of bars or arms 2 which are pivoted at one end and supported on a segment 3. At the central portion of the latter is a type arm guide 4, consisting of spaced guide members. At the inner end of the guide is the usual platen 5, between which and the arm guide the work or papers are placed. The support 6, for the guide members, forms a shoulder below the guide members in front of the platen, which permits the seating of my type cleaner.

My type cleaner, in one form of construction, consists of a cleaning element 11, having a handle or holder 13 and a guide 12, and as such is separate from and may be freely manipulated independently of any part of the typewriter.

The cleaning element shown consists of relatively stiff bristles 11a which are fastened at one end in a laterally elongated ferrule 11b.

It will be noted that the cleaning element may be made of various materials for digging out or absorbing the accumulated ink, wax, gummy or other matter from the recesses, corners or on the type in general.

At the lower side of cleaning element, or, as shown, at the rear portion of the narrow lower side of the ferrule 11b, is the guide 12, which extends downwardly therefrom. This guide is flat and is of such thickness as to slide easily between the members of the type guide to prevent the cleaning element from twisting and rocking. That is, the cross-section of the guiding tongue 12 is elongated in a direction parallel to the longitudinal extent of the cleaning element, or the bristles thereof. At the opposite sides of the upper end of the guiding tongue 12 are preferably square shoulders 12a to facilitate holding the device in an upright position.

At the corresponding position but at the opposite side of the cleaning element, or the ferrule thereof, is provided the handle or holder 13. As

shown, it is a straight shank and is an elongation of the guide 12. The end of this holder is bent into an eye 13a for fastening the device to the typewriter so that it is available at all times. This eye also provides a flattened portion which may be gripped between the thumb and index finger of one hand and readily placed in the proper position on and within the guide 4.

When the device is placed on the arm guide 4 with the guiding tongue 12 between the spaced members of the guide 4, and a key (not shown) of the typewriter struck, the type 1 of the corresponding type arm or bar 2 will strike the bristles or other medium of the cleaning element 11, but the shoulder on the support 6 will engage the guiding tongue 12 and prevent the device from striking the platen or from disturbing any work thereon.

The front face of the cleaning element is elongated so as simultaneously to clean both or all type on each arm 2. The surface is also inclined so as to assume the inclination of the face of the type of the arm 2 at the striking point. The face of the bristles or cleaning element is preferably rounded or arranged on slightly different angles so as to accommodate the different outwardly and inwardly positioned letters or characters on the usual type arms or bars at the striking point.

In the usual typewriter, the type arms are pivoted at their lower ends near the peripheral portion of the segment 3, and the free ends of the arms, provided with the type 1, enter the guide 4 and strike the platen 5 at substantially one position. The lateral extent of this position increases outwardly from the platen by means of the arcuate movement of the arms from their positions of rest toward the platen. It will, therefore, be noted that the depth of the cleaning element from front to rear is reduced to a minimum so as to permit the cleaning element to be made as narrow as possible. In other words, the purpose intended is to reduce the size of the face of the element 11 to a point commensurate with appropriate operation.

Though I have shown and described a particular construction of my device, and a particular relation thereof to standard typewriters, I do not wish to be limited to the same, nor to any specific materials from which it may be made, but desire to include in the scope of my invention the construction, combination, and arrangement substantially as set forth in the appended claims.

I claim:

1. A typewriter type cleaner, comprising a cleaning element having a cleaning face, a handle extending therefrom, and a flat guide extending from one side thereof, the cross-section of the guide being elongated in a direction perpendicular to the cleaning face.

2. A typewriter type cleaner, comprising a cleaning element having a cleaning face, a handle extending therefrom, and a guide extending from one side thereof, the cross-section of the guide being elongated in a direction perpendicular to the cleaning face.

3. A typewriter type cleaner, comprising a cleaning element having a cleaning face, an opposite rear face, a handle extending therefrom, and a guide extending from one side thereof, the cross-section of the guide being elongated in a direction perpendicular to the cleaning face and spaced forwardly of said rear face.

ROBERT B. FOSTER.