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J. H. BRINKER ET AL

2,498,243

FOLDING TYPEWRITER PLATFORM FOR PEDESTAL DESKS

Filed March 27, 1947

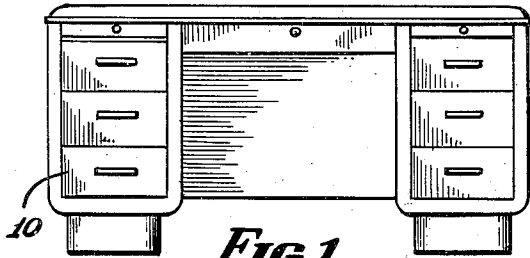


FIG. 1.

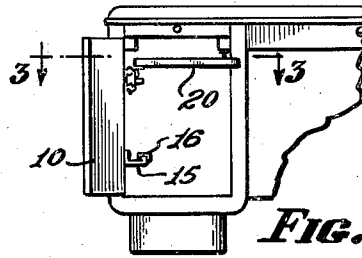


FIG. 2.

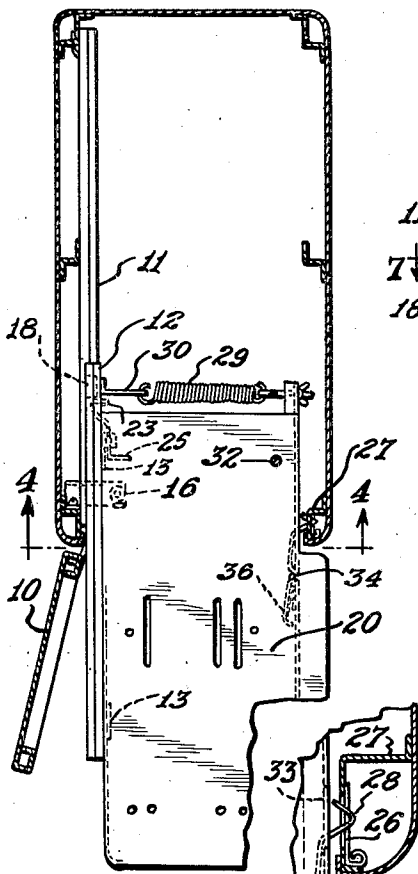


FIG. 3.

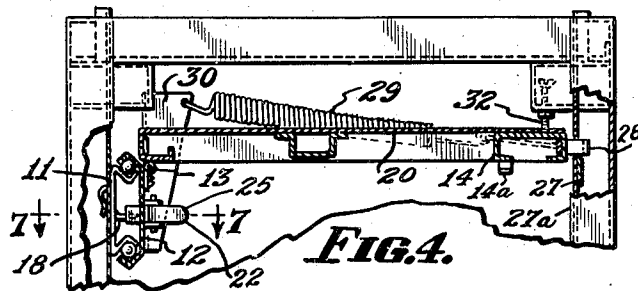


FIG. 4.

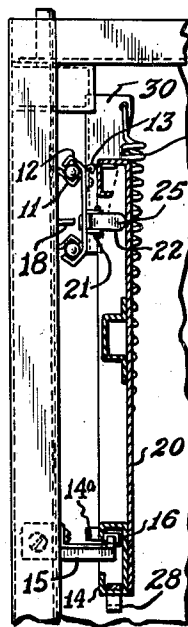


FIG. 5.

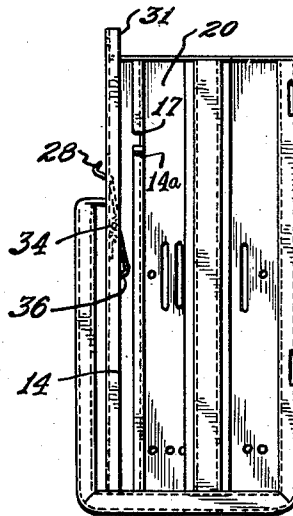


FIG. 6.

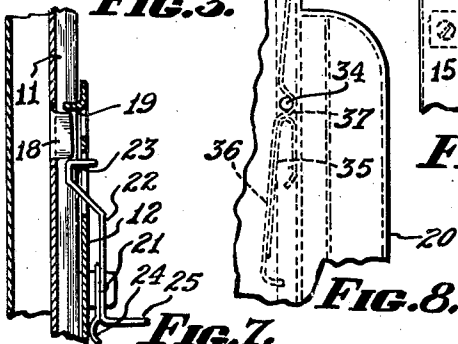


FIG. 7.

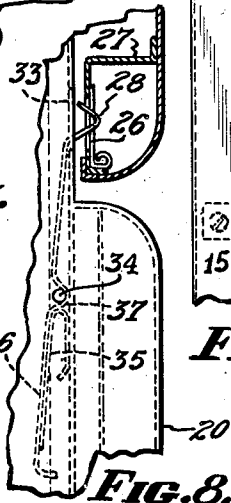


FIG. 8.

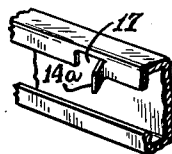


FIG. 9.

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FOLDING TYPEWRITER PLATFORM
FOR PEDESTAL DESKS

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3 Claims. (Cl. 312-29)

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This invention relates to a folding typewriter platform for pedestal desks and may be considered as an improvement on the structure disclosed and claimed in the Link patent, No. 2,289,664, dated July 14, 1942. In that patent there is disclosed a structure in which a typewriter platform is provided in a pedestal type desk in which there is a track mounted on an inside wall of the pedestal and a runner is mounted for in and out movement on said track. The typewriter shelf is hinged to said runner so that when not in use the shelf occupies a vertical position within the pedestal. Means are provided whereby the shelf must be fully withdrawn before it can be raised to its working position and means are provided whereby it must be fully lowered to its vertical position before it can be pushed into the pedestal. Latching means for latching the shelf in its working position are also shown.

It is an object of our present invention to provide certain improvements over this structure of said patent and particularly in the latching means for holding the shelf in its working position and in the means for insuring that the shelf is returned to its vertical position before it can be pushed into the pedestal.

It is another object of our invention to provide a latch having releasing means so disposed that when the shelf is normally grasped with the hand in order to lower it, the fingers will naturally come into a position to actuate the latch to release it. It is a still further object of our invention to provide a latch which is concealed from view so that it cannot accidentally be actuated to cause the shelf to drop.

These and other objects of our invention, which will be pointed out in more detail hereinafter, or which will be apparent to one skilled in the art upon reading these specifications, we accomplish by that certain construction and arrangement of parts of which we shall now describe an exemplary embodiment.

Reference is made to the drawings forming a part hereof and in which:

Fig. 1 is a front elevational view of a desk to which our invention may be applied.

Fig. 2 is a partial front elevational view of the same with the pedestal door open and showing the shelf in its working position.

Fig. 3 is a cross sectional view on an enlarged scale taken on the line 3-3 of Fig. 2.

Fig. 4 is a fragmentary cross sectional view on a still larger scale taken on the line 4-4 of Fig. 3.

Fig. 5 is a view similar to Fig. 4 but showing the shelf in its vertical position.

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Fig. 6 is a bottom view of the shelf itself.

Fig. 7 is a fragmentary cross sectional view taken on the line 7-7 of Fig. 4.

Fig. 8 is a fragmentary view on a greatly enlarged scale of the latch mechanism, shown in Fig. 3.

Fig. 9 is a fragmentary perspective view of a portion of the channel.

The desk to which our invention is applied may be a pedestal desk, such as is shown in Fig. 1, in which the typewriter shelf is arranged in the left hand pedestal. The left hand pedestal, instead of containing drawers is provided with a door 10, which extends the full height of the pedestal compartment. A track 11 is mounted on the inside of the pedestal compartment adjacent the top thereof, and a runner 12 is arranged to ride on the track 11. The specific runner construction is fully disclosed in the above mentioned Link patent and will therefore not be discussed further.

The shelf 20 is hinged as at 13 to the runner 12 and has along its edge, opposite the hinged edge, the channel 14. Mounted on the inside of the pedestal compartment is a bracket 15 carrying a roller 16, which when the shelf is in the position shown in Fig. 5, rides on the inside of the channel 14. The channel 14 has a cut out portion, indicated at 17 in Fig. 6, of sufficient width to pass the roller 16, and the cut out portion 17 is so located with reference to the roller 16 that the shelf 11 can only be raised when the shelf has been fully withdrawn. The foregoing structure is described in considerable detail in the Link patent to which reference has been made.

The abutment 18 is provided on the track 11 and as shown, it may simply be struck out from the material of the track. Likewise, an abutment 19 is provided on the runner 12, which abutment 19 may also be struck out from the material of the runner. The engagement of the abutments 18 and 19 determines the limit of withdrawal of the shelf from the pedestal.

In order to insure that the shelf is lowered to its vertical position with the roller 16 in position in the channel 14 before the shelf can be pushed into the pedestal, the arrangement best shown in Figs. 4, 5, and 7 is provided. Pivoted at 21 on the runner 12 is a latch member, indicated generally at 22. The member 22 has a latching portion 23 which is so disposed that it can engage the other side of the abutment 18 when the shelf is fully withdrawn and the abutments 18 and 19 are engaged (see Fig. 7). A leaf spring 24, bearing against the latch member 22 on the arm op-

posite the member 23, tends to urge the latching portion 23 into latching position, which is the position seen in Fig. 7. The end of the latch member 22, opposite the latching portion 23, has an extension 25 disposed substantially at right angles to the runner 12. The extension 25 is of such length that it will be abutted by the shelf 20 when the latter is lowered to its vertical position. As the member 25 is depressed by the shelf, rocking the member 22 in a clockwise direction, as seen in Fig. 7, the latching portion 23 is moved out of engagement with the abutment 18. A piece of the material from the cut-out portion 17 is bent outwardly to form the lip 14a as best seen in Fig. 9. The lip 14a serves to guide the roller 16 into the aperture 17, and cooperates with the mechanism just described to prevent pushing the shelf into the pedestal, until the roller 16 is properly positioned within the channel 14. The length of the member 25 is such that the portion 23 does not clear the abutment 18, until the roller 16 has engaged the lip 14a. In this way movement of the shelf into the pedestal is prevented by coaction of the members 13 and 23, until the shelf is brought to the position of Fig. 5, whereupon the latching portion 23 is lifted so that the shelf may be pushed into the pedestal. Of course, as soon as the shelf is started into the pedestal, it can no longer be raised, because of the coaction between the roller 16 and the channel 14.

In said Link patent latching means were provided for latching the shelf in its working position, and the actuating means for the latch were disposed on top of the shelf where it was possible that the latch could be actuated accidentally. According to our present invention, this latch is disposed under the shelf 20. As best seen in Fig. 8, an aperture 26 is provided in the pedestal corner brace member 27 and the latch has an engaging portion 23 adapted to engage in the aperture 26 to hold the shelf in its working position. It may be mentioned at this point that a heavy spring 29 extends between the plate 30, which is fastened to or is integral with the runner 12 and an extension 31 of the channel 14. This spring tends to counterbalance the weight of the shelf and typewriter, to assist in raising the typewriter shelf to its working position, and to prevent the shelf from dropping too abruptly when the latch is released. An adjustable stop 32 is provided, as shown in Fig. 4, to limit the upward movement of the shelf and by adjustment of the abutment 32, the fit of the member 23 in the aperture 26 can be made as snug as desired, so that when the shelf is in its working position, there will be no play or rattle between the parts.

Returning to the latch member, we dispose it within the channel 14 with the portion 23 projecting through the cut out 33 in the wall of the channel 14. The latch itself is simply a long strip of metal pivoted near its center at 34 and having the simple spring 35 disposed between the manual portion of the latch 36 and the wall of the channel 14. As clearly shown in Fig. 8, the latch may have its center portion deformed to provide the notch 37 which accommodates the pin 34.

This latch may easily be assembled as follows: the latch member itself is slipped into the channel with its nose 23 extending through the aperture 33 and with the spring 35 under the arm 36. The pin 34 is then pushed through appropriate holes in the channel 14 and the assembly is completed. The latch member cannot come out laterally be-

cause of the inter-engagement of the notch 37 and the pin 34, which also holds the latch against longitudinal movement. The latch is confined vertically by the walls of the channel 14.

In raising the shelf the action of the latch is automatic in that, as the shelf approaches the position of Fig. 4, the nose 28 thereof will touch the corner brace member 27 in the region indicated at 27a in Fig. 4 and as the shelf is brought to its working position, the surface of the member 27 acts as a cam surface depressing the latch, until the position of Fig. 4 is reached when the latch springs into latching position under the influence of the spring 35.

When it is desired to lower the shelf, the shelf may be grasped with the right hand, palm up, with the fingers extending up into the channel 14 where they normally engage the manual portion 36. As soon as the latch is free, the shelf tends to drop, but the drop is restrained by the tension of the spring 29 and the operator can manually lower the shelf to the position of Fig. 5 without danger.

It will be clear that various modifications may be made in our specific structure without departing from the spirit of the invention and we therefore do not intend to limit ourselves, except as set forth in the claims which follow.

Having now fully described our invention what we claim as new and desire to secure by Letters Patent is:

1. In a pedestal typewriter desk structure in which there is a track mounted on an inside wall of said pedestal and a runner is mounted for movement longitudinally of said track, there being a typewriter shelf hingedly secured to said runner, and a channel shaped track extending substantially the full length of the edge of said shelf opposite said hinged edge, and in which there is a roller mounted on said wall in a position to engage in said channel shaped track when said shelf is in a substantially vertical position, and in which there is a cutout portion in said track, said roller being so disposed with respect to said cut out portion that it may pass therethrough only when said shelf is in its fully withdrawn position; an abutment on said track and a latch on said runner so located that it is in a position to engage said abutment when said shelf is in its fully withdrawn position, means tending to urge said latch to engaging position when said shelf is lifted, so that said shelf cannot be pushed in, said shelf when brought to the vertical position rendering said last mentioned means inoperative so that the shelf may then be pushed in.

2. The structure of claim 1, in which said latch is pivoted between its ends so as to be rockable about a vertical axis, spring means tending to rock said latch to a position in which one end thereof is in latching position, and a projection on the other end of said latch of such length as to be engaged by said shelf at a point substantially where said roller is passing through said cut out portion.

3. The structure of claim 1 in which there is also an abutment on said runner, and in which contact between said abutment on said runner and said abutment on said track determines the limit of forward movement of said runner with respect to said track.

4. In a pedestal typewriter desk structure in which there is a typewriter shelf mounted in said pedestal for sliding movement into and out of said pedestal in a vertical position, said shelf

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being raisable when fully withdrawn from said pedestal to a horizontal working position, said shelf having a channel underneath its free side; an aperture in said pedestal on the user's side thereof, a latch member disposed within said channel and having a manually engageable portion, and having a latching portion extending through said channel for engaging in said aperture to hold said shelf in working position, the manually engageable portion of said latch being disposed in said channel in a position to be contacted by the fingers when said shelf is grasped normally by the hands with the fingers under the shelf and entering said channel.

5. The structure of claim 4, in which said latch is constituted of a strip of metal and is provided with a substantially semicircular notch at about its center, said strip being formed at one end to provide a latching portion, the other end constituting a manually engageable member.

6. The structure of claim 5, in which said latch is assembled to said partially closed channel by means of a pin passing through parallel walls of said channel, said latch being disposed with said semicircular notch passing between said pin and a wall of said channel whereby

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said pin and notch cooperate to form a pivot for said latch.

7. The structure of claim 6, in which a spring is provided between said manually engageable member and said last mentioned channel wall, to urge said latch to latching position.

8. The structure of claim 1 in which there is a lip extending outwardly from the forward edge of said cut out portion, so as to be engaged by said roller just before said roller enters said track, to prevent pushing in the shelf while said latch is being rendered inoperative.

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REFERENCES CITED

The following references are of record in the file of this patent:

UNITED STATES PATENTS

Number	Name	Date
1,028,767	Mooney	June 4, 1912
1,304,991	Kuehl	May 27, 1919
2,277,703	Kennedy	Mar. 31, 1942
2,289,664	Link	July 14, 1942