Sept. 13, 1938. A. E. VIENS 2,129,799

LOOSE LEAF BINDER

Filed June 29, 1936

FIG. 1.

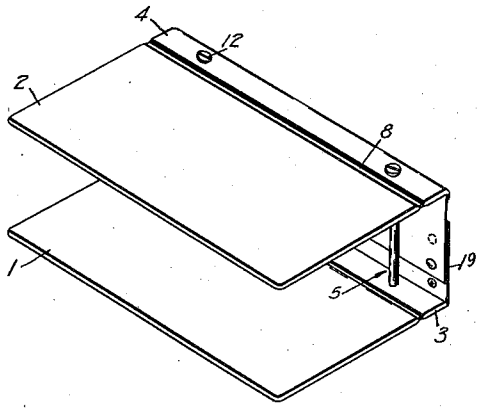


FIG. 2

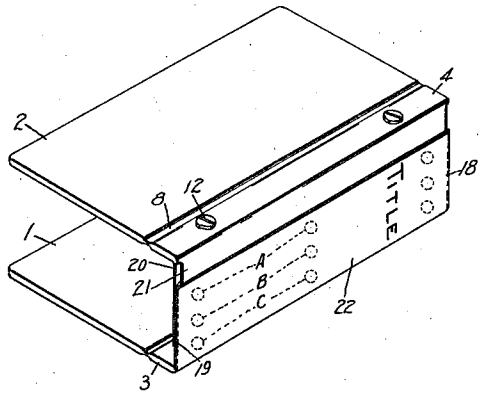


FIG. 3.

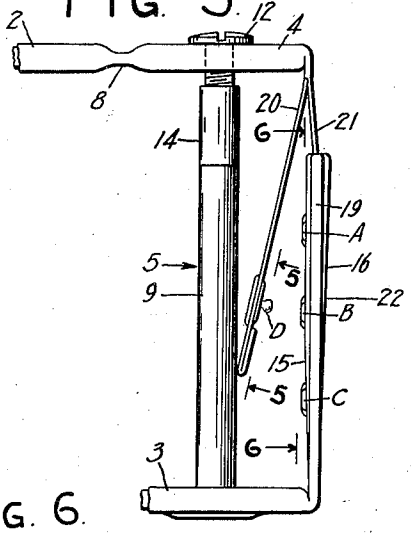


FIG. 4

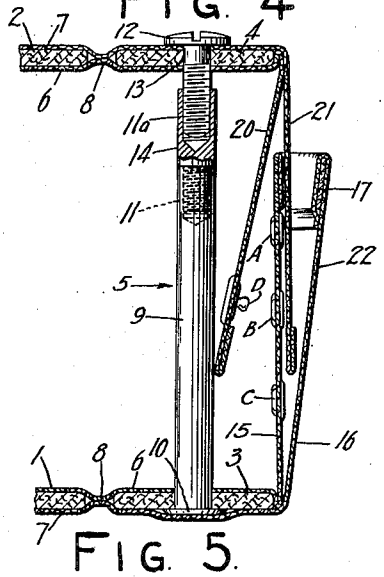


FIG. 6.

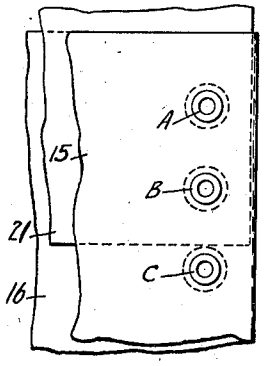


FIG. 5.

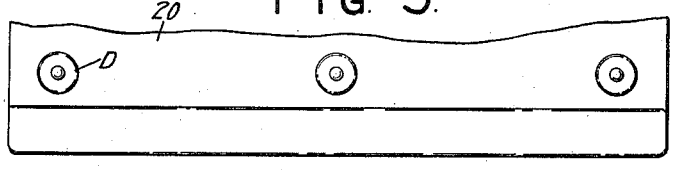
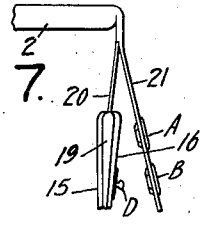


FIG. 7.



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LOOSE LEAF BINDER

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12 Claims. (Cl. 129—1)

My invention relates to loose leaf binders.

It has among its objects to provide an improved binder of this type having an extensible back structure and capable of holding loose leaf fillers of widely varying thickness while presenting a neat and attractive appearance at the back. A further object is to provide such an extensible binder having an improved flexible back. A still further object is to provide improved means for securing the extensible back in various adjusted positions. Another object is to provide such an extensible binder which results in a book of uniform thickness at the front and back regardless of the thickness of the filler. Other objects are to provide an extensible loose leaf binder which is inexpensive to manufacture, which has a title bearing back portion that is constantly visible during the growth of the book, and a binder which is extremely simple in construction and in the manner of adjusting the back for various thicknesses of filler. Other objects and advantages of my improved binder construction will, however, hereinafter more fully appear.

In the accompanying drawing I have shown for purposes of illustration two embodiments which my invention may assume in practice.

In this drawing,—

Figure 1 is a perspective view of my improved binder looking toward the inside of the back;

Fig. 2 is a similar perspective view looking toward the outside of the back;

Fig. 3 is a detail end view on an enlarged scale;

Fig. 4 is a sectional view similar to Fig. 3;

Fig. 5 is a detail on line 5—5 of Figure 3;

Fig. 6 is a detail on line 6—6 of Figure 3, and

Fig. 7 is a detail view showing a modified back construction.

As herein shown, the loose leaf binder embodying my invention has the usual front and back covers 1 and 2, including the parallel binder strips 3 and 4 disposed along the back edges thereof which carry the usual binding posts 5 for holding the loose leaf filler (not shown). Preferably the covers are formed of rigid fibre board covered with inner and outer layers of fabric 6 and 7 which form hinges 8 at the junction of each binder strip in a well known manner to permit opening of the book. The posts 5, two of which are shown herein, each include a main post member 9 which is inwardly extended through the binder strip of one of the covers, here the front cover 1, and has an external thin head 10 which is secured permanently in position by the outer layer of fabric 7 which is secured to the cover by adhesive and envelops the head 10. The member 9 has a screw threaded recess 11 at its upper end into which is adjustably threaded either a binder screw 12 which is adapted to be inserted through an aperture 13 in the back cover or a post extension 14 having a threaded recess 11a which similarly receives the screw 12. The post 9 can be lengthened by the use of additional extensions 14 to accommodate fillers of varying thickness, the binder illustrated having provision for using two such extensions.

In accordance with my invention, an improved extensible back structure is provided for connecting the covers 1 and 2 which is preferably flexible in nature and which presents a smooth non-bulging back for the binder in various extended positions thereof to accommodate fillers of widely different thickness. To this end, the inner and outer fabric layers 6 and 7 of the front cover 1 are extended well beyond the binder strip 3 to form inner and outer flaps 15 and 16 which are substantially coextensive with the members 9 of posts 5. As shown in Figure 4, the free edges of the flaps 15 and 16 are each provided with an inturned hem, a strip of stiffening material 17 also being provided in the hem of the flap 16 along its free edge. The flaps 15 and 16 are permanently secured together along their top and bottom edges 18 and 19, as shown in Figures 2 and 3, to provide, in effect, an envelope at the back of the binder of a width equal to the thickness of the binder when no extension 14 is used on the posts 5.

The back cover 2 is provided with similar inner and outer flaps 20 and 21. The outer flap 21 is slightly reduced in length, as indicated in Figure 2, to provide a tongue receivable between the flaps 15 and 16 of the front cover. The inner flap 20 overlies the inner surface of flap 15. It will thus be evident that as the posts 5 are extended to accommodate a thicker filler, the tongue 21 of the back cover telescopes in the envelope with the flap 20 adjustable relative to the envelope while continuing to overlap the same.

Improved means are also provided for securing the back in various adjusted positions corresponding to different lengths of the posts 5, three such positions being herein provided for, although it will be understood that more may be provided if desired. To this end the flap member 15 of the front cover is provided with sets of snap members A, B and C arranged in rows extending toward its free edge. Three of these sets are shown herein, representing three different positions of extension of the binder and located at

suitable points on said flap member to cooperate with the single snap members D, one of which is carried by the inner flap 20 of the back cover for each set of snap members on the envelope.

In the drawing, the binder is shown in the intermediate position in which the snap member D of the back cover flap cooperates with the middle snap member B of each set carried by the front cover, one extension 14 being provided on each post member 9. It will be evident that if it is desired to use a thinner filler the extension 14 is removed and the binding screws 12 then cooperate directly with the screw threaded portions 11 of the post members 9. In this position of the back structure, the snap members D would cooperate with the snap members C. However, if it were desired to accommodate a thicker filler, a second extension 14 would be screwed into that shown in Figure 4, and the snap members D would then cooperate with the snap members A. In any case it will be noted that the back of the book will remain substantially flat and that the title portion 22 remains visible, regardless of the degree of extension of the binder.

In Figure 7 I have shown a modified construction in which the inner flap member 20 of the back cover comprises the tongue and is received within the envelope formed by the flap members 15 and 16 of the front cover. Here it will also be noted that the sets of snap members A, B and C are carried on the inside of the flap 21 in position to cooperate with the single snap members D carried on the outer surface of the flap 16 adjacent the edge thereof. This construction, in which the cooperating snaps can be adjusted after the clamping screws 12 are in place, is desirable in some cases. It will be noted that in this modified construction the projecting snap members D are not visible in any position of adjustment of the binder and that the outer surface of flap 21 comprising the title portion of the back remains visible in all positions of adjustment.

In using my improved binder, the screws 12 are removed and the covers are opened up so as to lie flat with their inner faces up and with the posts 5 projecting upwardly. The loose leaves comprising the filler are then threaded over the posts 5. It will be noted that if it is desired to add sheets at the back of the book, as is usually the case, the sheets already in place on posts 5 need not be disturbed. When the sheets have reached the upper end of the post members 9 and it is desired to add more sheets, an extension 14 is screwed into the threaded end 11 of each of the post members 9 to accommodate additional sheets. If desired, one or more extensions may be added in a well known manner, the illustrative construction being limited, however, to the use of two extensions 14. When the required number of sheets has been threaded on the posts 5, the snap members D are engaged with the cooperating snap members A, B or C, corresponding to the length of the posts 5, and the clamping screws 12 are again screwed into the posts to secure the filler in place.

From the above description of my improvements, it will be evident that I have provided an extensible loose leaf binder having a flexible back including a title portion which is visible at all times throughout the growth of the book. Further, it will be noted that additional sheets can be added at the back of the book and the necessary adjustments made to expand the binder, without disturbing the sheets already in the binder. Also it will be evident that the expansion of the binder does not require tools or difficult operations, and that the construction is simple and inexpensive and presents a binder which is always attractive in appearance.

While I have in this application specifically described two embodiments which my invention may assume in practice, it will be understood that the invention may be modified and embodied in various other forms without departing from its spirit or the scope of the appended claims.

What I claim as new and desire to secure by Letters Patent is:—

1. An expansible binder having front and back covers, and a back connecting said covers comprising overlapping portions carried by said front and back covers respectively, cooperating fastening means for securing said overlapping portions in a plurality of spaced positions of said covers, and a portion carried by one of said covers and overlying said overlapping portions.

2. An expansible loose leaf binder having front and back covers, and a flexibly connected back connecting said covers comprising overlapping portions carried by said front and back covers respectively, cooperating snap fastening means for securing said overlapping portions releasably in a plurality of overlapping positions corresponding to different thicknesses of the loose leaf filler between said covers, and means carried by one of said covers overlying the fastening means on said overlapping portions.

3. An expansible binder having front and back covers, and a flexible back connecting said covers comprising overlapping flexible flap portions carried by the rear edges of said covers, one of said flap portions having a series of snap members arranged in a row from front to back thereof and the other having a snap member adapted to cooperate with a different snap member of said series in different spaced positions of said covers, and an external title carrying member carried by one of said covers and overlying said overlapping portions.

4. An expansible loose leaf binder having front and back covers, a back connecting said covers comprising overlapping portions carried by said front and back covers respectively, one of said overlapping portions comprising two layers of material, and means for securing said portions in a plurality of positions corresponding to different thicknesses of the loose leaf filler between said covers comprising cooperating fasteners carried on the confronting faces of said overlapping portions.

5. An expansible loose leaf binder having front and back covers, a back connecting said covers comprising telescoping portions carried by said front and back covers respectively, a flap carried by one of said covers and overlying said telescoping portions, and cooperating fastening means carried by said flap and one of said telescoping portions for securing said covers in a plurality of expanded positions thereof to accommodate loose leaf fillers of varying thickness.

6. An expansible loose leaf binder having front and back covers, a flexible back connecting said covers comprising an envelope carried by one of said covers opening toward the back and a pair of flaps carried by the other cover, one of which flaps is adapted to be received within said envelope and the other of which is adapted to overlap said envelope, and a plurality of cooperating fastening means carried by said envelope and overlapping flap adapted to cooperate selectively

to secure said back in any one of a plurality of expanded positions.

7. An expansible binder having front and back covers, a back connecting said covers comprising an envelope flexibly connected to one of said covers and opening toward the rear and a pair of flaps flexibly connected to the other cover, one of which flaps is adapted to telescope in said envelope and the other of which is adapted to overlap said envelope, and snap fastening means for securing said overlapping flap to said envelope in a plurality of spaced positions of said covers comprising a series of snap members secured to one flap in a row extending toward the back edge of the same and a cooperating snap member secured to the envelope and adapted to cooperate with a different snap member of said series in different spaced positions of said covers.

8. An expansible binder having front and back covers, and a back connecting said covers comprising overlapping flaps flexibly connected to the rear edge of said covers, means for securing said flaps releasably together in a plurality of expanded positions of said binder comprising a plurality of cooperating snap members carried on the confronting faces of said overlapping flaps and selectively engageable in different expanded positions of said binder, and means carried by one of said covers overlying the free end of the outer flap.

9. An expansible binder having front and back covers, a flexible back connecting said covers comprising an envelope carried by one of said covers and a pair of flaps carried by the other, one of which is adapted to telescope in said envelope and the other of which is adapted to overlap the inside face of said envelope, and cooperating means accessible from inside said covers for securing said overlapping flap to said envelope in a plurality of positions corresponding to different expanded positions of said covers.

10. An expansible binder having front and back covers, a flexible back connecting said covers comprising an envelope carried by one of said covers and a flap carried by the other cover adapted to telescope in said envelope, means for securing said covers in a plurality of expanded positions comprising a second flap carried by said other cover overlapping the inner face of said envelope and accessible from inside said covers, and a plurality of snap members carried by the confronting faces of said second flap and said envelope selectively cooperating in different expanded positions of said covers.

11. An expansible binder having front and back covers, a flexible back connecting said covers comprising an envelope carried by one of said covers and a flap carried by the other cover adapted to telescope in said envelope, means for securing said covers in a plurality of expanded positions comprising a second flap carried by said other cover overlapping the outer face of said envelope and accessible from outside said covers, and a plurality of snap members carried by said second flap and said envelope selectively cooperating in different expanded positions of said covers.

12. An expansible binder having front and back covers, and a flexible back connecting said covers comprising overlapping flexible portions carried by said front and back covers respectively and having cooperating fastening means on their overlapping confronting faces for connecting said covers in a plurality of expanded positions of said binder, a title portion carried by one of said covers overlying said overlapping cover portions, and stiffening means disposed along and inside the free edge of said title portion.

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