United States Patent [19]

Giulie

[11] **3,801,175**

[45] **Apr. 2, 1974**

[54] **HANGER AND BINDER UNIT**

[76] Inventor: **Joseph D. Giulie,** 1015 Corporation Way, Palo Alto, Calif. 94303

[22] Filed: **Sept. 21, 1972**

[21] Appl. No.: **291,090**

[52] **U.S. Cl.** **312/184**
[51] **Int. Cl.** **A47b 63/00,** B42f 15/00
[58] **Field of Search** 312/184; 211/46; 248/257

[56] **References Cited**

UNITED STATES PATENTS

795,101	7/1905	Campbell	248/257
1,001,254	8/1911	Daum	248/257
1,026,652	5/1912	Bradley	248/257

FOREIGN PATENTS OR APPLICATIONS

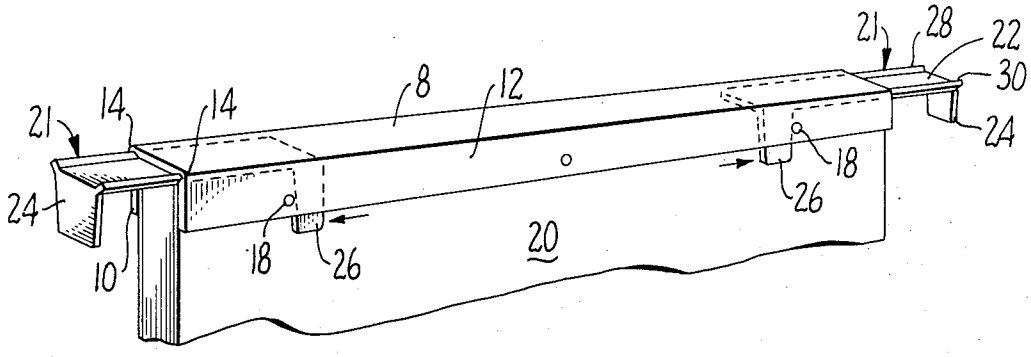
1,107,427	3/1968	Great Britain	312/184

Primary Examiner—Paul R. Gilliam
Attorney, Agent, or Firm—Robert G. Slick

[57] **ABSTRACT**

A combination hanger and binder unit is provided wherein a sheaf of paper or the like can be bound together in a neat, permanent binder and wherein hangers are provided at the spine of the binder so that if one desires, the bound volume can be hung in an ordinary file drawer. The hangers can easily be added to existing plastic bindings and when not in use retract so that they do not interfere with normal use or storage of the volume.

2 Claims, 5 Drawing Figures



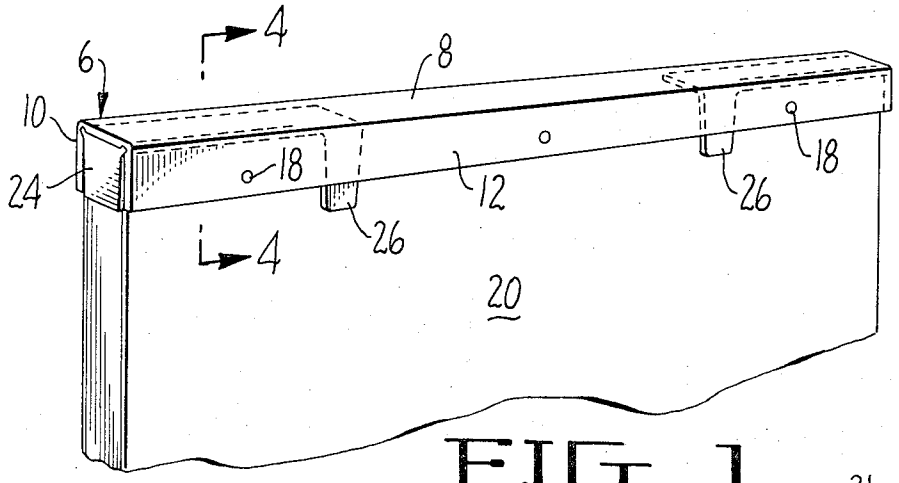


FIG. 1.

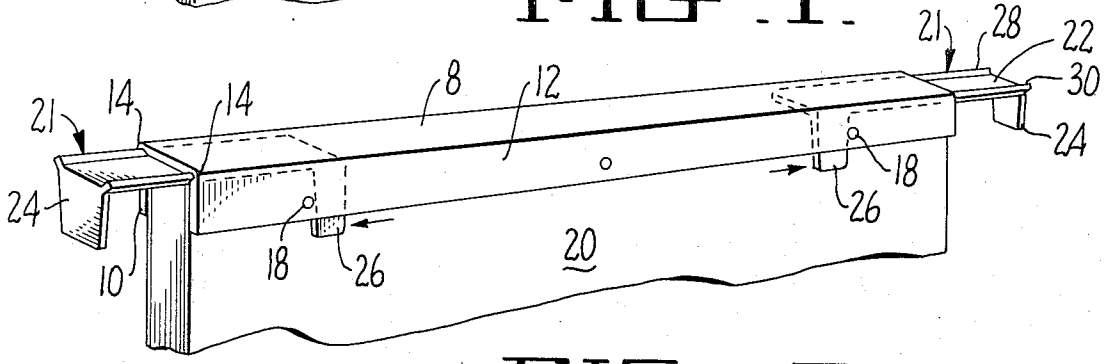


FIG. 2.

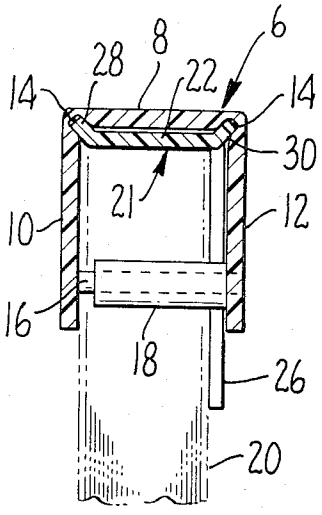


FIG. 4.

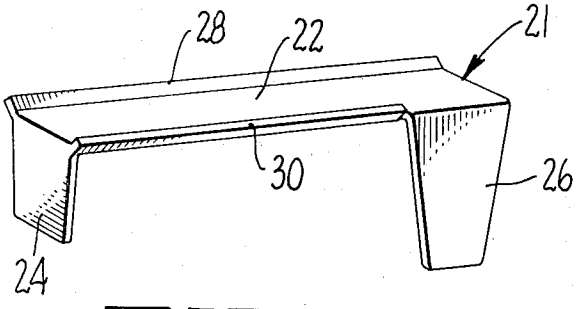


FIG. 3.

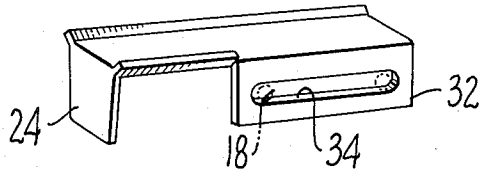


FIG. 5.

HANGER AND BINDER UNIT

SUMMARY OF THE INVENTION

It is known to provide plastic binders for reports, catalogs and the like which can be easily applied to a sheaf of papers to provide a neat volume. Such plastic binders are well known in the art and are sometimes sold under the tradename of Poly Binders.

In accordance with the present invention, a simple addition is provided for such binders which consists of a pair of hook-like members which can be extended from the ends of the spine of the binder so that such bound volumes can easily be hung in an ordinary file drawer. When not in use, the hangers of the present invention can be easily retracted so that they do not interfere with the ordinary use of the volume nor do they increase its size.

In accordance with one embodiment of the invention the hanger member has bent-up ridges on each side thereof which ride in the hinge creases of the binder to strengthen it and make it stiffer. They also act as a guide for the hanger unit.

Preferably the hanger of the present invention includes a depending grip member which lies flush with the volume and which enables one to easily push the hanger out. The grip member also serves as a stop to prevent the hanger from coming completely out of the binder.

Various other features of the invention will be brought out in a detailed description which follows:

BRIEF DESCRIPTION OF THE DRAWINGS

FIG. 1 is a perspective view of the edge portion of a binder unit embodying the present invention wherein the hanger units are retracted.

FIG. 2 is a perspective view similar to FIG. 1 showing the hanger units extended.

FIG. 3 is an enlarged perspective view of a hanger unit which can be added to a conventional plastic binder.

FIG. 4 is an enlarged section on the line 4—4 of FIG. 1.

FIG. 5 is a perspective view of another form of hanger unit.

DESCRIPTION OF THE PREFERRED EMBODIMENTS

Plastic bindings, sometimes sold under the tradename Poly Binders, are well known to those skilled in the art and will thus be described only briefly. The binding unit includes a plastic backing member generally designated **6** which consists of a spine **8** to which are connected two side members **10** and **12.** At the junction of the spine with each of the side members the plastic is recessed as at **14** so that the spine and the two side members are of relatively heavy plastic and are connected to each other by relatively thin sections at the recesses **14,** forming a living hinge between three members. Although these have been described as three members it will be understood that normally such binding members are formed from a single piece of plastic. The side member **10** has male fittings **16** formed thereon while the side member **12** has mating female fasteners **18** formed thereon. In usual practice there are three such fastening members although more or less could be employed. To use the binder, one takes a pre-

punched sheaf of papers **20,** places it over the members **18** and then pushes the members **16** into engagement therewith. Normally, friction between the members **16** and **18** is sufficient to hold the volume together and the binding members can be readily disengaged for reuse, adding more pages or the like. The structure thus far described is known to those skilled in the art and does not form a part of the present invention.

In accordance with the present invention, a hanger unit for binders of the type described is provided which can be retracted so that it does not interfere with the use of the volume yet enables the volume to be hung in an ordinary file cabinet merely by extending the hangers. Each of the hanger units, as is best seen in FIG. **3,** is generally designated **21** and consists of a single piece of plastic which is formed with a back member **22** having a first tab **24** formed at one end thereof and forming a bent-over continuation of the back **22** and a second tab **26** which extends downwardly from one side and near the opposite end of the back **22.** Extending upwardly at an angle of about 45° from back member **22** are the edge members **28** and **30.**

The hanger unit is installed in the binder as shown with the back member **22** against the spine **8** while the tab **24** lies normally between the side members **10** and **12** and the second tab **26** extends beyond the edge of one of the side members **10** or **12.** The edge members **28** and **30** ride in the grooves **14** so that the hanger unit of the present invention not only provides a hanging means but also strengthens and stiffens the binder itself. Tab **26** normally extends downwardly beyond the edge member **12,** as is best seen in FIGS. **1** and **2,** so that it can easily be grasped by the finger and pushed from the position shown in FIG. **1** to the position shown in FIG. **2** to extend the hanger unit. At the same time, as the hanger unit is pushed outwardly, tab **26** engages one of the fastening pins **18** so that it will not pull completely out of the binder. At the opposite end of the binder a similar pull-out unit is provided but since this is a mirror image of the pull-out unit described, it is not described in detail.

In FIG. **5** there is shown an alternate embodiment of the hanger member and the tab **26** is replaced by a relatively long tab **32** having an elongated slot **34** therein, the slot fitting over the pin **18** and providing a captive hanger unit which is limited in its movement in both directions. Also, this illustrates the fact that it is not necessary for the tab **26** to extend below the sides of the binder unit but one can extend and retract the hanger **21** merely by pulling or pushing on tab **24.**

Many variations of the structures described will be obvious to those skilled in the art. For instance, Tab **24** may be eliminated in some applications.

I claim:

1. A combined hanger and binder unit for a sheaf of papers wherein the binder unit comprises a plastic member having a spine adapted to lie along one side of a sheaf of paper and side members extending from said spine on each side thereof and at right angles thereto and extending over the edges of said sheaf of papers with holding pins extending from one side member to the other and through holes in said sheaf of papers, holding them in bound relationship and grooves extending the length of said binder unit between said spine and each of said side members, said side member extending a short distance beyond the edges of the sheaf of papers, wherein the improvement comprises a

sliding member having a flat portion lying between the edge of said sheaf of papers and said spine and having edge members extending outwardly from said flat portion at angles of about 45°, said edge members riding in said grooves, single thin end tab on said sliding member, said tab normally lying between said edge members, said sliding member being slideably moveable from a first position wherein said tab lies between said end members and does not extend substantially beyond the edge of said sheaf of papers and a second position wherein said hanger is slid outwardly whereby the bound volume can be hung over the edge of a file drawer or the like.

2. The structure of claim **1** wherein the hanger has a side tab extending along one of the side members, said side tab being adapted to engage one of said pins when the tab is extended to prevent the hanger from being pulled completely out of the hanger, said side tab extending beyond the edge of one of said side members whereby the tab can be engaged by a finger to extend the hanger.

* * * * *