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West et al.

[11] **3,804,484**

[45] **Apr. 16, 1974**

[54] **SLIDABLE DRAWER CONSTRUCTION**

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[52] **U.S. Cl.** **312/347**

[51] **Int. Cl.** **A47b 88/00**

[58] **Field of Search** ..... 312/346, 347, 350, 343, 312/344, 341 R

[56] **References Cited**

UNITED STATES PATENTS

3,201,187	8/1965	Reiss et al.	312/346
3,328,107	6/1967	Gutner	312/347
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Primary Examiner—James C. Mitchell

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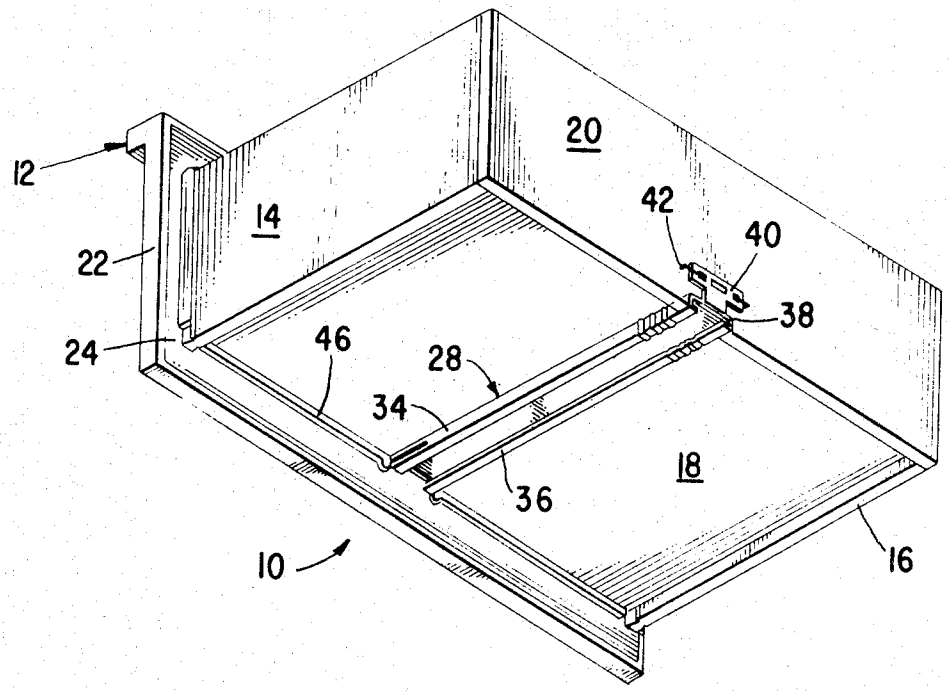
[57] **ABSTRACT**

A drawer for an article of furniture having a two-piece plastic front including a decorative front surface and a rear surface secured thereto. A hollow is located between the surfaces substantially between the ends of the drawer and a slot in communication with the hollow is formed in the rear surface in a plane with and slightly below the drawer bottom. A slide member is disposed on the underside of the bottom and includes a lug on the leading end and a tab on the trailing end. The lug is bent downwardly relative to the bottom engaging surface of the slide and is inserted into the slot with the bent leading end in the hollow. The tab end is secured to the drawer back.

4 Claims, 5 Drawing Figures



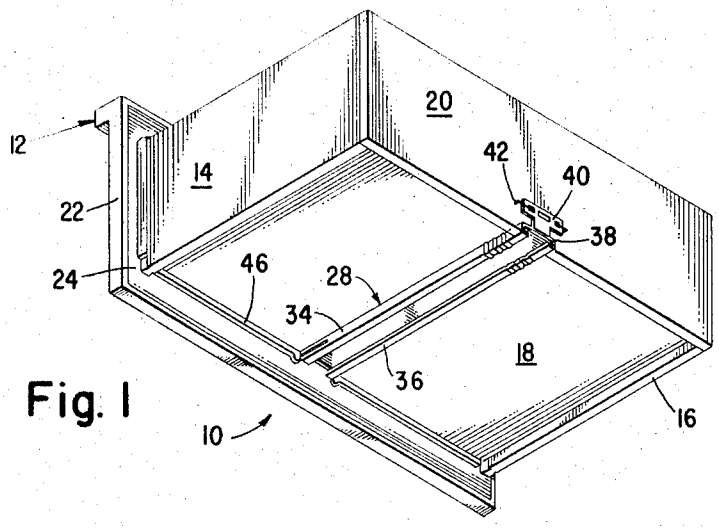


Fig. 1

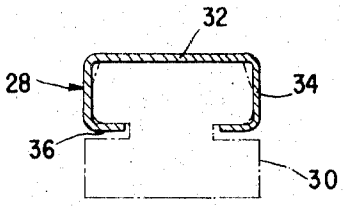


Fig. 2

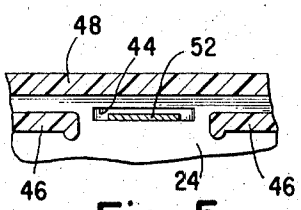


Fig. 5

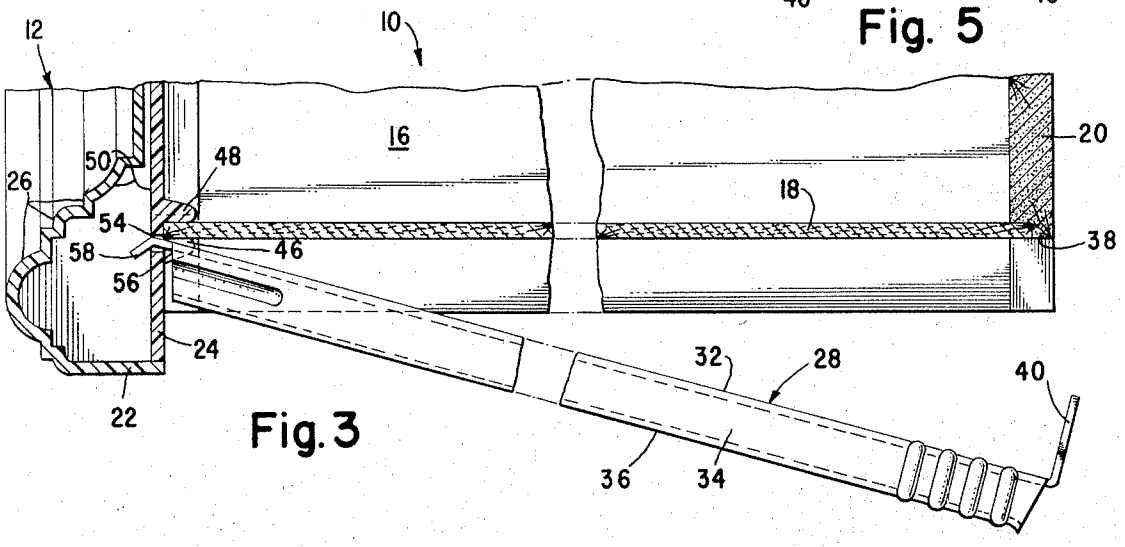


Fig. 3

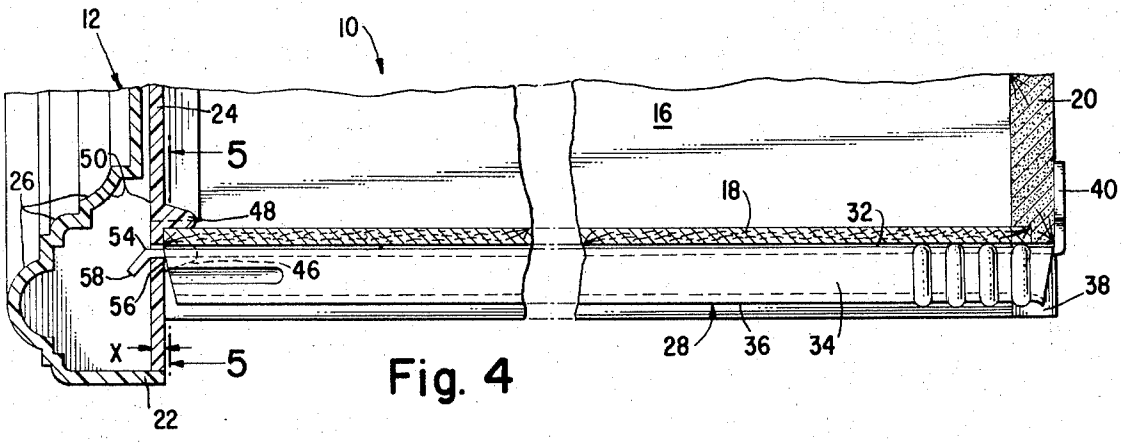


Fig. 4

SLIDABLE DRAWER CONSTRUCTION

BACKGROUND OF THE INVENTION

This invention relates to a drawer for an article of furniture and more particularly to the construction of a slidable drawer and the assembly of a slide member thereto.

The recent use of synthetic plastics for furniture and in particular for drawer fronts has been substantial because of the capability of providing a decorative ornamentation at a low cost. However, for a drawer to slide smoothly in an article of furniture, such as a dresser or the like, metallic slides such as those described in U.S. Pat. Nos. 3,365,261 and 3,328,107 operating on guides in the furniture are preferred. The slides are attached to the front and rear walls of the drawer generally because the bottom is very thin and because the securing means may be detrimental to the sliding operation. When drawers are comprised of wooden fronts, a tab or lug on the slide can be stapled to the wood front as disclosed in the aforesaid patents. However, with a plastic front the means of securing these metallic slides has presented problems because plastics do not readily take a staple or the like.

SUMMARY OF THE INVENTION

It is therefore a primary object of this invention to provide a method for securing a slide member to a drawer having a plastic front, and a drawer of such construction.

Another object of this invention is to provide a slidable drawer having a plastic front to which a conventional slide member having a minimum amount of modification may be assembled.

These objects and others are obtained by providing a slot in the rear surface of the drawer front and a hollow between the front and rear surfaces in communication with the slot for receiving a lug bent on an otherwise conventional slide member.

BRIEF DESCRIPTION OF THE DRAWING

These and other objects and advantages of the invention will be more readily apparent from the following description taken in connection with the accompanying drawings, in which:

FIG. **1** is a perspective view of a slidable drawer assembled according to the present invention;

FIG. **2** illustrates an enlarged cross-sectional view of the slide positioned on a guide (shown in phantom) of an article of furniture;

FIG. **3** is a cross-sectional view taken substantially along the center line of the slide and drawer shown in FIG. **1**, but with the slide in an intermediate position during the assembling process;

FIG. **4** is a cross-section similar to FIG. **3**, but with the slide member in the final assembled position; and

FIG. **5** is a cross-sectional view taken substantially along line **5—5** of FIG. **4**.

DESCRIPTION OF THE PREFERRED EMBODIMENT

Referring now to FIG. **1**, a drawer **10** is illustrated comprising a front wall **12**, a pair of wooden sidewalls **14** and **16**, a hardboard bottom **18** and a particle board rear wall **20**. The front, as best illustrated in FIGS. **3** and **4**, comprises a front panel **22**, and a back panel **24** secured together by conventional means, such as gluing, bonding or any other method of providing a permanent type of bond. The front and rear panels comprise a synthetic plastic material which may be polystyrene or another such material which may be injection molded to provide a strong permanent article. The front panel **22** may comprise an aesthetically decorative front surface having an undulating ornamentation such as illustrated at **26** in FIG. **3**.

Fixed to the underside of the drawer is a channel shaped slide member **28** adapted to slide on a cooperating guide member **30** mounted in the drawer receiving opening of an article of furniture. The preferred guide member is similar to that described in U.S. Pat. No. 3,365,261, and includes a channel defining generally horizontal upper wall **32** and pair of integral vertical sidewalls **34** having inwardly turned flanges **36**. The walls **32** and **34** and the flanges **36** cooperate with complimentary surfaces of the guide as shown in FIG. **2**. A portion of the rear wall is cut out as at **38** so that the channel portion can extend therethrough. An upwardly turned tab **40** is formed on the rear end of the slide and is secured to the rear face of the rear wall **20** by conventional means which preferably may be a staple **42**.

To secure the slide to the plastic front wall **12**, the present invention provides a cut-out or slot **44**, best seen in FIG. **5**, in the back panel **24** substantially between the sides **14** and **16**, and vertically disposed at and below the junction of the underside of the bottom **18** with the panel **22**. The bottom **18**, as described in copending U.S. Pat. application Ser. No. **316,204** assigned to the common assignee herewith, is joined to the panel **24** in a rabbet formed between ribs **46** and **48** which are formed integral with the back panel. The slot may be machined in the panel, but preferably the panel **24** is molded with slot therein. The slot leads to a cavity or a hollow **50**, which in the preferred embodiment is merely a space between the panels **22** and **24**. The forward end of the slide **28** is formed, by machining or stamping or other conventional methods, with a lug **52**. The lug **52** is bent downwardly as at **54** relative to the surface **32** to form an acute angle in the lower surface of the lug. In the preferred embodiment where the front **12** comprises panels **22** and **24**, the bend should be located such that the distance from the leading edge **56** of the slide **28** to the bend **54** is substantially equal to the thickness x of the rear panel **24** at the location of the slot **44**.

To secure the slide **28** to the drawer, the leading edge **58** of the lug **52** is inserted into the slot **44**. The slide is then at a steep angle to the drawer bottom **18**. Thereafter the slide is turned upwardly and pushed toward the panel **24**, this being shown in FIG. **3**. The slide is continued to be turned upwardly and pushed toward the panel **24** so that the entire lug is within the slot and with the bend in the hollow. It should be clear that the length of the slide from the shoulder **56** to the tab **40** is equal to the length of the drawer from the rear panel **24** to the back **20**. Thus in this position, as shown in FIG. **4**, the leading edge **56** of the slide **28** abuts the back surface of the rear panel **24** and the tab **40** extends upwardly along the back wall **20**. It should be understood that the downward bend provides a tighter fit and prevents the leg from being inadvertently pulled out of the hollow. Therefore, a workman may thereaf-

ter easily insert a staple **42** into the tab **40** to permanently lock the slide in place.

It should thus be clear that not only is a simple and rapid assembly provided but a tight fitting slide to drawer construction. Numerous alterations of the structure disclosed herein will suggest themselves to those skilled in the art. However, it is to be understood that the present disclosure relates to a preferred embodiment of the invention which is for purposes of illustration only and not to be construed as a limitation of the invention. All such modifications which do not depart from the spirit of the invention are intended to be included within the scope of the appended claims.

Having thus set forth the nature of the invention, what is claimed herein is:

1. A drawer for an article of furniture comprising a pair of spaced sides, a bottom, a back attached to rear portions of said sides and bottom, a synthetic plastic front attached to forward portions of said sides and bottoms, said front having a hollow formed in at least a portion thereof between the forward and rear surfaces,

means defining a slot in the rear surface communicating with said hollow and disposed substantially at and below the intersection of the bottom, an elongated slide member disposed on the underside of said bottom adapted to slidably cooperate with the article of furniture, means for securing one end of said slide to said back, and an integral lug formed on the other end of said slide extending through said slot, said lug being bent out of the plane of elongation in the hollow to secure the slide to said front.

2. A drawer as recited in claim **1** wherein said front comprises a front panel and a rear panel, and means for securing said rear panel to said front panel with said hollow formed therebetween.

3. A drawer as recited in claim **2** wherein said slide abuts the rear panel, and the bend in said lug is located at a distance from the abutment equal to the thickness of the rear panel.

4. A drawer as recited in claim **1** wherein said lug is bent downwardly relative to said bottom.

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