Sept. 27, 1960 S. J. REPAICH 2,954,075

PIVOTING CORNER POST CONSTRUCTION

Filed July 11, 1958

Fig. 1.

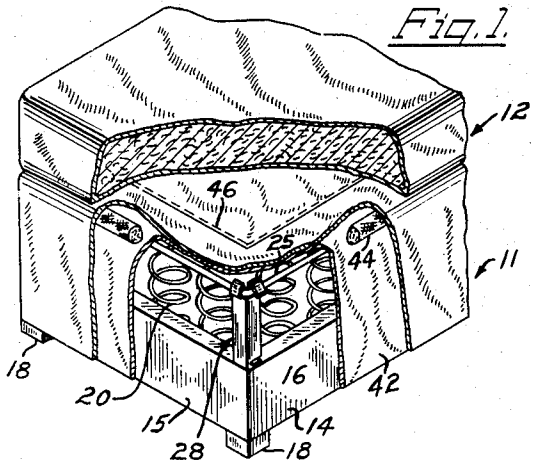
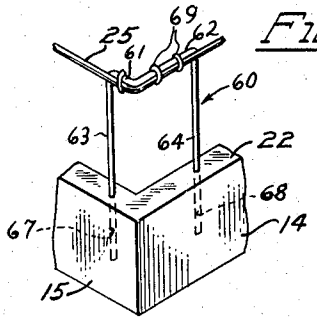


Fig. 8.



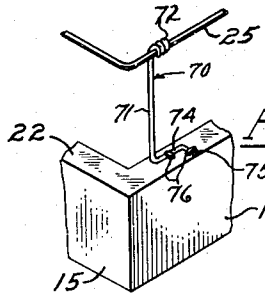


Fig. 9.

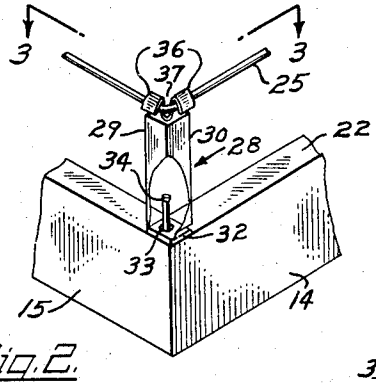


Fig. 2.

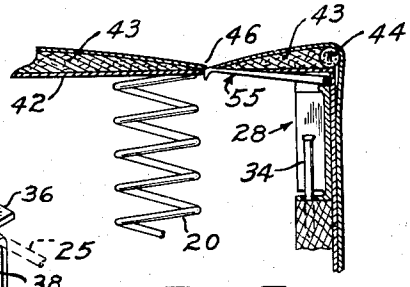


Fig. 6.

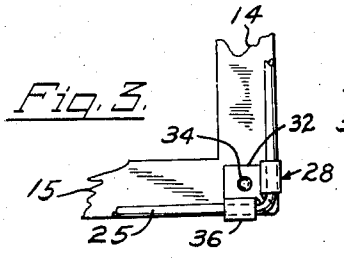


Fig. 3.

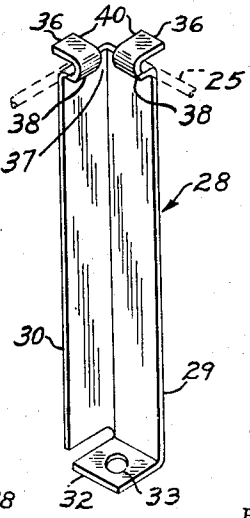


Fig. 4.

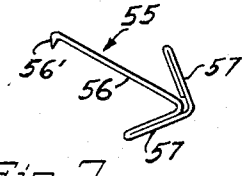


Fig. 7.

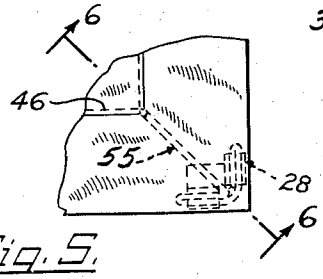


Fig. 5.

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2,954,075

Patented Sept. 27, 1960

2,954,075

PIVOTING CORNER POST CONSTRUCTION

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Filed July 11, 1958, Ser. No. 748,015

10 Claims. (Cl. 155—179)

This invention has to do with upholstered furniture and particularly with the construction of seats and backs for chairs, sofas and the like.

In conventional upholstered spring seat construction coil springs are mounted on a supporting webbing, frame, or other means within the area bounded by the seat frame with the springs extending considerably above the upper edge of the frame and being tied together by wire or the like. A wire border or edge frame member extends around the perimeter of the springs at the level of the tops of the springs, being secured to the outermost springs.

With the type of construction heretofore commonly used, it is extremely difficult to secure uniformity of product, particularly with sectional-type pieces embodying two, freestanding front corners. Consequently, in making up sectional sofas, it is necessary to very carefully match the pieces in order to have uniform height of the seats at the corners, as otherwise the sofas would not be merchantable.

An object of the invention is to provide a novel corner post construction for upholstered seats or backs of the type embodying conventional springs and an upper border or edge, wire which provides an inherent means at the corner of the seat (or back) for controlling the height of the seat, thereby making for uniformity of construction.

Another object is to provide a novel corner post for incorporation into an upholstered seat which is adapted to be tiltably mounted on the seat frame in a manner to allow the upholstery material to move with the springs when the seat is occupied.

A further object is to provide a novel corner post which can be readily secured relatively loosely to the seat frame by a single nail which embodies means at its upper end for readily attaching the same to the wire frame member extending around the springs.

A still further object is to provide a novel upholstery construction embodying a corner post and, in conjunction therewith, a novel hook for securing the fabric to the post at a point diagonally inward of the seat corner.

Another object is to provide a simple, inexpensive easy-to-use post or post means of the type indicated.

These and other objects will be apparent from the drawing and the following description.

Referring to the drawing:

Fig. 1 is a fragmentary perspective view of an upholstered seat embodying coil springs in which the upholstery has been broken away at several places to expose the interior construction which embodies the invention;

Fig. 2 is a perspective view of the preferred form of post of the invention shown mounted at the corner of a seat frame and joined to the wire frame which extends around the perimeter of the coil springs;

Fig. 3 is a fragmentary plan view on line 3—3 of Fig. 2;

Fig. 4 is a perspective view of the post, on a larger scale;

Fig. 5 is a plan view of the corner of a seat in which a novel hook member is used in conjunction with the post;

Fig. 6 is an enlarged fragmentary sectional view on line 6—6 of Fig. 5;

Fig. 7 is a perspective view of a hook member used in conjunction with the post in certain types of construction;

Fig. 8 is a fragmentary perspective view similar to Fig. 2 showing another form of post construction; and

Fig. 9 is a view similar to Fig. 8 but showing still another form of post construction.

More particularly describing the invention, numeral 11 designates generally an upholstered seat member which may be part of a sectional sofa or part of a chair. This is shown as provided with a removable seat cushion 12. The upholstered seat comprises a base or seat frame 14 which is shown as rectangular being made up of a front rail 15, a side rail 16 and corresponding elements at the other two sides, not shown. The frame is shown provided with foot portions 18 adapted to rest upon the floor.

Within the area bounded by the frame are a plurality of coil springs 20 of conventional type used in seat construction. These are normally supported on a webbing or other means attached to the bottom or adjacent the bottom of the seat frame. The springs extend to a height considerably above the upper edge 22 of the seat frame and are tied together to hold them in laterally spaced relation. Around the perimeter of the area containing the springs is a border or edge wire frame member 25 to which the outer rows of springs are secured or tied. This construction, so far described, is conventional and the details thereof have not been shown for this reason. It is to be understood that other conventional types of springs may be used in place of the coil springs and that the post construction to be described is also applicable to them.

In order to control the height of the seat at the forward corners thereof, I provide a post, designated generally by numeral 28. This extends between the upper edge 22 of the frame and the wire frame member 25. In the particular form shown, the post is formed of sheet metal and comprises an elongated main section consisting of two angularly disposed sections 29 and 30 which are shown extending at right angles to each other. If desired, these sections may be made to extend at a greater or lesser angle so as to coincide with the angle of the corner of the frame on which the post is mounted. At its lower end, the section 29 is formed with an inturned tab to form a base 32 which is normal to the general longitudinal axis of the post. The base is apertured at 33 to receive a nail 34 which is used for loosely securing the post to the corner of the frame 14 as best shown in Fig. 2.

At its upper end, the post is formed to provide a pair of outwardly extending ears 36 which are formed as continuations of the sections 29 and 30, but being somewhat narrower so as to leave a space 37 therebetween. The ears include a curved portion 38 which extends inwardly, then upwardly and outwardly to join with a flat outer end portion 40. The post is secured to the wire frame 25 of the spring construction at the corner thereof as best shown in Figs. 1 and 2, with the wire spring being received in curved portion 38 and under the ears at 36, the latter being bent down over the wire to secure it. The wire frame member is supported on the upper edge portion of the post.

With the construction described, it will be apparent that the corner of the wire frame 25 is spaced above the seat frame 14 by the height of the post thereby making for uniform construction. The post is free to tilt in

response to movement of the frame **25**, caused by a person sitting on the seat or other weight imposed on the seat. In this connection, referring to Figs. 1 and 5, the springs are ordinarily covered with a layer of burlap or the like designated **42**, and this extends over the spring and down over the wire frame **25** and is secured to or beneath the frame **14**. Padding **43** is disposed over the fabric **42** and a padding roll **44** is usually provided around the margin to provide height in this region. In some cases, a row of stitching **46** is provided some distance back from the margin. Thus, it will be seen that when the fabric layers are initially applied, they may be stretched tightly and secured without likelihood of pulling down **25**, to an out-of-proper-shaped position, since the corner post serves to support the wire frame at the desired height at the corner. Also, it will be apparent, that when weight is imposed upon the seat, the post **28** is free to pivot on the nail **34** as may be required to accommodate for pulling of the fabric one way or the other.

Another feature of the invention which is particularly useful in assemblying a construction wherein the sides of the seat are exposed to view and not enclosed by an arm rest or the like, as shown in Figs. 5, 6 and 7, is the provision of a hook member **55** designed to properly locate and tightly secure the fabric upholstery at a point in the region of the seam or stitching **46** diagonally inward from the post. The hook comprises a main body **56**, a hooked end **56'** and a head comprising two end portions **57** which are disposed in a common plane substantially at right angles one to the other with the body portion **56** bisecting the angle. In use, the member is placed about the post as shown in Fig. 6 and hooked into the burlap fabric **42** to provide a securing means between the fabric at such point and the post thereby serving to assist in maintaining the fabric in proper position during assembly.

While I have shown the post **28** in conjunction with a seat having coil springs it should be understood that the post is equally useful in constructions embodying other types of springs surrounded by a border or edge wire and irrespective of whether the construction is the seat or the back of the article.

In Fig. 8 I show a modified type of post designated generally by **60** and comprising a relatively stiff wire member bent to form an upper portion consisting of angularly disposed sections **61** and **62** and legs **63** and **64**. The latter are mounted in bore holes **67** and **68** in the base frame **14**. The upper portion of member **60** is secured to the border or edge wire **25** of the spring construction by wires **69** wrapped around the parts.

In Fig. 9 I show still another form of post, designated **70**, consisting of a wire having a main section **71** and an upper portion **72** which has been coiled around the spring frame wire **25**. The lower end of the post comprises a foot or base section **74** extending normal to the main section. This may terminate in a toe **75**. The base is secured to the base frame **14** by staples **76**.

It will be apparent that the wire-type posts or supports shown in Figs. 8 and 9 also serve to support the edge or border wire frame **25** of the spring assembly and yet permit some lateral shifting thereof under loading of the seat in the manner previously described in connection with the form of post shown in Figs. 1 to 6.

While I have shown and described preferred forms of my invention I contemplate that various changes and modifications can be made therein without departing from the scope of the invention as set forth in the claims which follow. By way of example, the post means shown in Fig. 8 may be formed at its lower ends with foot portions to be attached to the base in a manner similar to the form shown in Fig. 9, or the latter may have a straight lower end for reception in a bore hole in the frame.

I claim:

1. In an upholstered spring construction, a frame defining an open, spring-receiving area therewithin, said frame having a corner portion, a group of springs in said area extending beyond the plane of an edge of said frame, support means for said springs carried by said frame, a border wire frame member extending around the perimeter of the group of springs in a plane spaced beyond the plane of said edge of said frame, means securing the outermost springs of the group to said wire frame member, a post mounted on said frame at the corner portion thereof and extending to said wire frame member, said wire frame member being attached to said post, and means mounting said post on said frame to permit tilting movement of the post relative to the frame.

2. A construction as set forth in claim 1 in which said post comprises a metal body formed to provide an apertured base at one end and in which the means securing said post to said frame comprises a nail mounted in said frame and extending through said apertured base.

3. A construction as set forth in claim 1 in which said wire frame member has a corner portion disposed in registration with the corner portion of said frame and in which said post is provided with a pair of laterally extending ears at its upper end bent around the corner portion of said wire frame member.

4. In an upholstered spring seat construction, a seat frame defining an open, spring-receceiving area therewithin, said frame having a corner portion, springs in said area extending to a height above said frame, support means for said springs carried by said frame, a border wire frame member extending around the perimeter of said springs at a level with the tops thereof, means securing the outermost of said springs to said wire frame member, an upright post mounted on said frame at the corner portion thereof extending to said wire frame member, said wire frame member being attached to said post, and means mounting said post on said frame to permit tilting movement of the post relative to the frame.

5. In an upholstered spring seat construction, a seat frame defining an open spring-receiving area therewithin, said frame having a corner portion, springs in said area extending to a height above said frame, support means for said springs carried by said frame, a border wire frame member extending around the perimeter of the springs at a level with the tops thereof, means securing the outermost of said springs to said wire frame member, an upright post mounted on said frame at said corner and extending to said wire, said wire being attached to said post, means securing said post to the frame to permit tilting of the post, a fabric sheet overlying said springs and extending down around the springs and frame, inclosing the same, and a hook member connected to the upper end of said post at its outer end and being hooked into said fabric sheet at a region spaced diagonally inward from the post.

6. A construction as set forth in claim 5 in which said fabric is covered with padding and with a covering fabric over the padding.

7. A corner post comprising a body of sheet metal formed to provide an elongated main portion comprising two sections joined by a longitudinally extending bent portion, said sections being disposed at less than 180° with respect to each other, one of said sections having an apertured extension at one end extending normal to the longitudinal axis of the post and inwardly of the section within the angle formed by said sections, each of said sections having an ear portion extending therefrom at the other end of said post, each ear portion being generally of U-shape and opening outwardly and with the base of the U disposed inwardly of the adjacent section.

8. In an upholstered spring construction, a frame defining an open, spring-receiving area therewithin, said frame having a corner portion, a group of springs in

said area extending beyond the plane of an edge of said frame, support means for said springs carried by said frame, a border wire frame member extending around the perimeter of the group of springs in a plane spaced beyond the plane of said edge of said frame, means securing the outermost springs of the group to said wire frame member, a post mounted on said frame at the corner portion thereof and extending to said wire frame member, said wire frame member being attached to said post, and means mounting said post on said frame to permit tilting movement of the post relative to the frame, said post comprising a length of relatively stiff wire.

9. A construction as set forth in claim 8 in which said post has a lower end portion mounted in a bore hole in said frame.

10. A construction as set forth in claim 8 in which the length of wire forming the post is bent to form an upper portion for attachment to said wire frame member and to form a pair of laterally spaced legs.

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