United States Patent

[11] 3,626,871

[72] Inventor Washington Oliver McClendon
2632 High Tower Ct., Atlanta, Ga. 30318

[21] Appl. No. 822,169
[22] Filed May 6, 1969
[45] Patented Dec. 14, 1971

[54] **COLLAPSIBLE POLE SEAT**
6 Claims, 4 Drawing Figs.

[52] U.S. Cl. 108/151, 108/94, 108/128, 108/103
[51] Int. Cl. A47b 57/06
[50] Field of Search 108/149–153, 128, 103, 90–100; 148/157–161, 22; 211/144

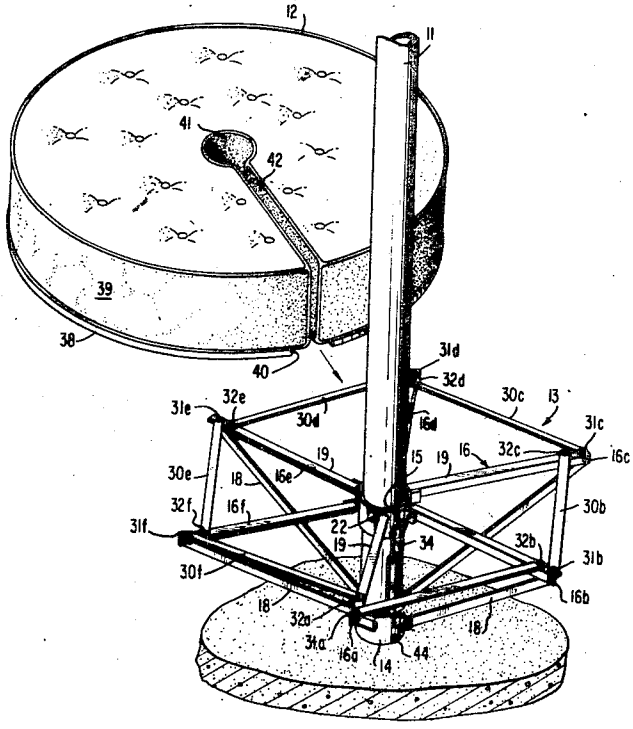
[56] **References Cited**

UNITED STATES PATENTS

517,929	4/1894	March	108/128 X
945,848	1/1910	MacMinn	108/94
1,571,129	1/1926	Luckhoff	108/128 X
2,039,805	5/1936	Knight	108/128 X
2,785,735	3/1957	Banks	108/128
2,951,593	9/1960	Lake	108/103 X
3,038,690	6/1962	Alexiou	108/128 X

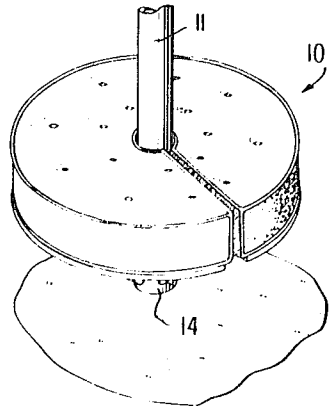
Primary Examiner—Francis K. Zugel
Assistant Examiner—Glenn O. Finch
Attorney—Jones & Thomas

ABSTRACT: A platform or seat assembly for placement about a pole or post comprising a substantially annular platform positionable with its center opening surrounding the pole, and a framework positionable beneath the platform and around the pole for supporting the platform. The framework comprises a plurality of foldable support leg assemblies connected at their top and bottom ends to collars surrounding the pole. The collars are movable toward each other along the length of the pole to fold the upper legs of each leg assembly out to a horizontal position where they are in the proper positions for supporting the platform. When the collars are moved away from each other, the legs of the leg assemblies are retracted to a position closely adjacent the pole.



2 Sheets-Sheet 1

FIG. 1



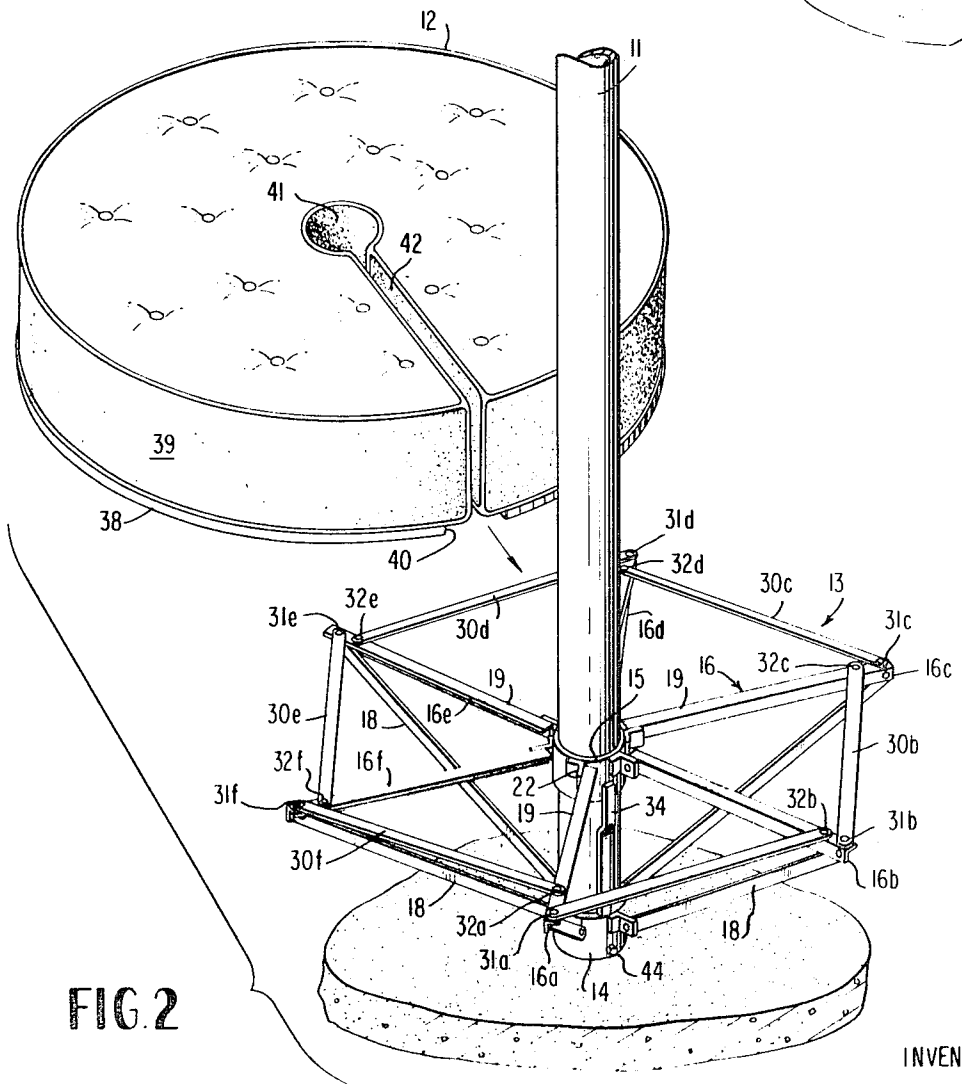


FIG. 2

INVENTOR

W. OLIVER MC CLENDON

BY Jones & Thomas

ATTORNEYS

FIG. 3

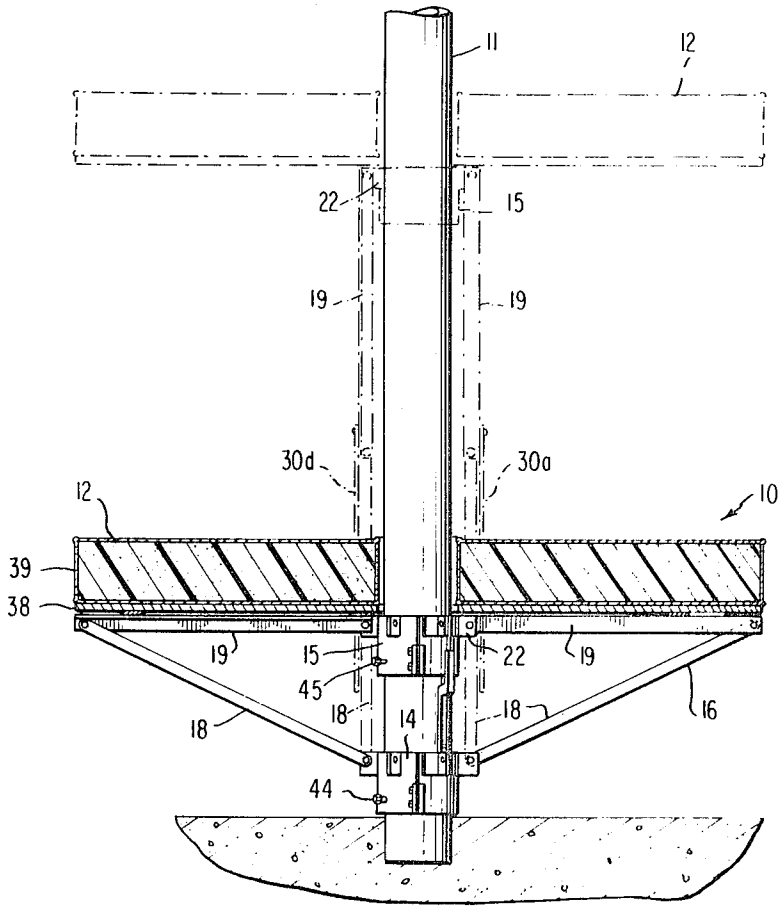
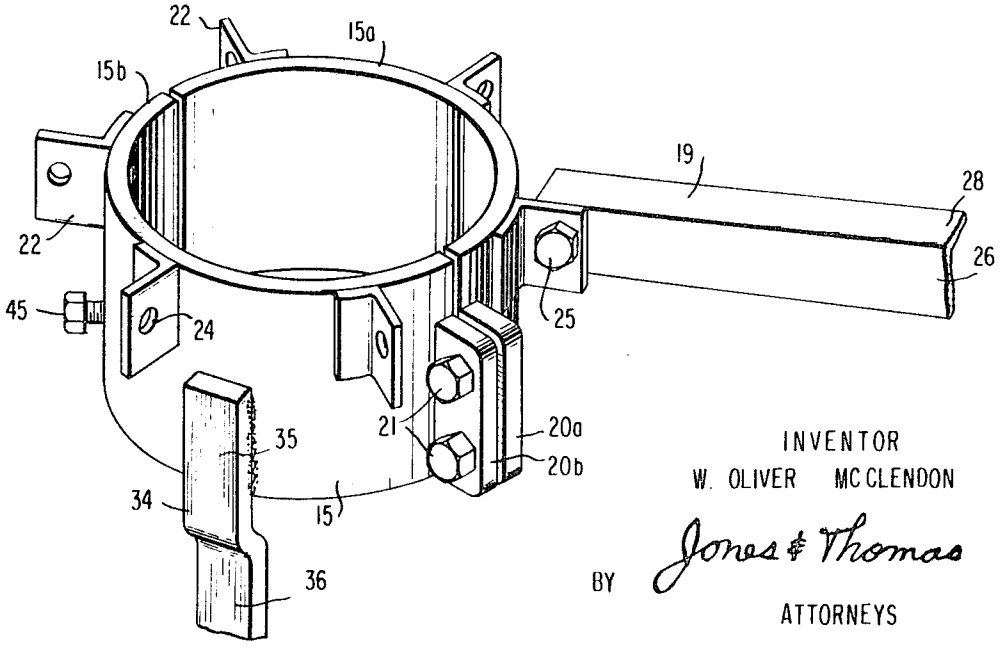


FIG. 4



INVENTOR
W. OLIVER MC CLENDON

BY Jones & Thomas

ATTORNEYS

COLLAPSIBLE POLE SEAT

BACKGROUND OF THE INVENTION

The support posts or poles in the basement of a typical house are often inconveniently located for the placement of furniture, or the like. While these support poles are quite necessary to the structure of the dwelling, it has been difficult to decorate, camouflage, or use the support members for most practical purposes. While some furniture elements or wall structures can be permanently built around a support pole, these structures usually encumber the space in the room so that the space is unusable for some purposes, as when a large open space is needed for games, parties, or the like.

While various portable seats have been developed for connection to trees, or the like, these structures are not satisfactory from a utility and decorative standpoint when applied to a support pole of a dwelling. The previously known portable seats are commonly used for the purpose of hunting deer or for picking fruit from a tree, or the like. The seats must be removed from the tree or supporting object for storage and cannot be practically used in a dwelling.

SUMMARY OF THE INVENTION

Briefly described, the present invention comprises a seat or working platform for connection to a support pole of a house or dwelling. The assembly comprises an annular cushion which defines a slot from its center opening to its edge and which is insertable about the pole. A collapsible framework is positioned below the cushion to support the cushion in a horizontal plane. The framework is retractable to a position closely adjacent the supporting pole for storage purposes, so that the framework does not encumber the area about the supporting pole. The cushion can be removed from about the pole or can be elevated up toward the ceiling of the room where it is out of the way.

Thus, it is an object of this invention to provide a pole seat which is stable enough to support people in a seated position, and which can be conveniently stored.

Another object of this invention is to provide a seat or work surface placeable about a support pole of a building which includes a plurality of normally horizontally extending arms extending radially outwardly from the pole for supporting a seat surface, the arms being foldable in a downward direction adjacent the pole for storage purposes.

Another object of this invention is to provide a space saving seat or work surface for a basement or the like which is adapted to be attached to a support pole, and which is adjustable to various heights with respect to the support pole for different uses.

Another object of this invention is to provide a pole seat which can be conveniently and expediently connected to a support pole, and which can be conveniently and expediently stored in an elevated and retracted position.

Other objects, features and advantages of the present invention will become apparent upon reading the following specification, when taken in conjunction with the accompanying drawing.

BRIEF DESCRIPTION OF THE DRAWING

FIG. 1 is a perspective view of the pole seat.

FIG. 2 is an exploded perspective view of the pole seat.

FIG. 3 is a side elevational view, partially a cross section, of the pole seat, with the full lines showing the pole seat in a useable position and with the dashed lines showing the pole seat in its stored position.

FIG. 4 is a detail showing of a collar of the framework of the pole seat.

DESCRIPTION OF THE PREFERRED EMBODIMENT

Referring now in more detail to the drawing, in which like numerals indicate like parts throughout the several views, FIG. 1 shows pole seat 10 which is connectable to a support pole or post 11. As is best shown in FIG. 2, pole seat 10 comprises annular platform 12 and framework 13. Framework 13 comprises a pair of spaced collars 14 and 15 which surround pole 11 and which are movable along the length of the pole. A plurality of foldable leg assemblies 16 are connected to collars 14 and 15. Each leg assembly 16 comprises a lower leg 18 and an upper leg 19. Each of the lower legs 18 are connected at their lower ends to lower collar 14 and at their upper ends to the outward or lower ends of upper legs 19. Upper legs 19 are connected at their upper or inner ends to upper collar 15. As is shown in FIG. 4, collars 14 and 15 are substantially identical in construction and comprise mating halves 15*a* and 15*b* which are connectable together in a cylindrical arrangement about pole 11. The lower edges of the mating halves 15*a* and 15*b* include matching connecting tabs 20*a* and 20*b* which include aligned apertures for receiving connecting bolts 21. A plurality of L-shaped framework support tabs 22 are positioned at the upper edge of the collar, with one leg of each L-shaped tab connected to the surface of the collar and with the other leg extending radially outwardly from the collar. Each of the outwardly extending legs defines an aperture 24, and the upper or inner end of each upper leg 19 is connected to a tab 22 by means of a bolt 25 extending through the opening 24 of a tab and the aligned opening (not shown) of the upper leg 19. The lower ends of lower legs 18 are connected to collar 14 in a similar manner. Upper legs 19 are L-shaped in cross section and include downwardly extending flange 26 and laterally extending flange 28. Lower legs 18 are substantially flat, but can be formed of L-shaped cross-sectional configuration, if desired.

As is best shown in FIG. 2, each foldable leg assembly 16 is circumferentially spaced about collars 14 and 15 and pole 11. In order to maintain the proper spacing of leg assemblies 16, straps 30 are connected between adjacent ones of the leg assemblies. For instance, strap 30*a* is connected between leg assemblies 16*a* and 16*b*, strap 30*b* is connected between leg assemblies 16*b* and 16*c*, strap 30*c* is connected between leg assemblies 16*c* and 16*d*, etc. Straps 30*a*–30*f* can be fabricated of a rigid material, such as metal, or of a flexible material, such as woven fabric. Each strap is pivotally connected at one of its ends to an upper leg 19 of a leg assembly and is connectable to the upper leg 19 of an adjacent leg assembly 16. For instance, strap 30*a* is pivotally connected to the upper leg 19 of leg assembly 16*a* by means of brad 31*a*, and the extended end of strap 30*a* defines an opening which is positioned over brad 32*b*. Similarly, strap 30*b* is pivotally connected to the upper leg 19 of leg assembly 16*b* by means of pin 31*b* and is connected to the upper leg 19 of leg assembly 16*c* by pin 32*c*. Pins 31*a*–31 and 32*a*–32*f* are all connected to the laterally extending flanges 28 of upper legs 19. If straps 30*a*–30*f* are all rigid metal straps, they function to support annular platform 12 as well as to space leg assemblies 16*a*–16*f* equally about pole 11.

In order to properly space upper collar 15 from lower collar 14, spacer brace 34 is connected to upper collar 15 and extends in a downward direction toward lower collar 14. Spacer brace 34 comprises upper leg portion 35 which is welded to upper collar 15 and offset lower leg portion 36 which projects down toward lower collar 14 and engages the upper edge of lower collar 14. This prevents upper collar 15 from moving beyond a prescribed limit toward lower collar 14.

As is best shown in FIG. 2, annular platform 12 comprises a substantially rigid section or layer 38 and a cushion or flexible layer 39. Layer 38 can be fabricated of virtually any material, including wood or any conventional synthetic, while cushion layer 39 will normally be fabricated of a soft material, such as foam rubber. Rigid layer 38 defines slot 40 extending from the edge of annular platform 12 toward center opening 41. Slot 40 and center opening 41 are slightly larger than the diameter of pole 11, and center opening 41 is smaller than the distance between opposed outer edges of L-shaped framework support tabs 22 of upper collar 15 (FIG. 4). Cushion layer 39 also includes slot 42 which is aligned with slot 40 of rigid layer 38. Slot 42 of cushion layer 39 can be of smaller width than the diameter of pole 11.

Annular platform 12 is inserted about pole 11 by passing pole 11 through slots 40 and 42. The slot 42 of cushion layer 39 is flexible enough to give way to allow the passage of pole 11 toward center opening 41. When annular platform 12 is in its position about pole 11 as shown in FIG. 1, it will normally rest on upper legs 19 of leg assemblies 16*a*–16*f*, on the upper edge of upper collar 15 and its L-shaped framework support tabs 22, and on connecting straps 30*a*–30*f*. Annular platform 12 will usually be placed on framework 13 with its rigid layer 38 placed adjacent framework 13 so that the cushion layer 39 is presented in an upward facing relationship. This allows annular platform 12 to function as a seat. When pole seat 10 is to be used for a working table, annular platform 12 will be removed from pole 11 and inverted and placed about pole 11 to present rigid layer 38 in an upward facing relationship. This provides a hard working surface.

When it is desirable to remove pole seat 10 from the vicinity of pole 11 to provide an unencumbered area about the pole, annular platform 12 and upper collar 15 can be lifted in an upward direction about pole 11, to move annular platform 12 toward the ceiling of the room and out of the way of any person walking adjacent pole 11. As upper collar 15 is moved in an upward direction, leg assemblies 16*a*–16*f* tend to fold inwardly toward pole 11 to a vertical position until they are juxtaposed pole 11, as shown in the dashed lines of FIG. 3. If straps 30*a*–30*f* are flexible fabric straps, they will tend to droop between leg assemblies 16*a*–16*f*, without hindering the folding movement of the leg assemblies; however, if straps 30*a*–30 are inflexible metal straps, they must be disconnected from connecting pins 32*a*–32*f* prior to the upward movement of upper collar 15. As upper legs 19 move from a horizontal position toward a vertical position, the inflexible straps 30*a*–30 will tend to pivot about their pivot pins 31*a*–31*f* toward a vertical position, until they finally assume the vertical position as shown in FIG. 3. Thus, these straps will also be relocated into a position juxtaposed pole 11. Since annular platform 12 is lifted up out of the way around pole 11 when in its stored condition, it will be unlikely that annular platform 12 will be loaded with any significant weight, Thus, upper collar 15 and its L-shaped framework support tabs 22 will be sufficient to maintain annular platform 12 in the dashed line position of FIG. 3, without the additional support provided by leg assembly 16.

In the event that it is desirable to lift annular platform 12 to an elevation higher than that shown by the dashed line position of FIG. 3, upper and lower collars 14 and 15 can both be further moved in an upward direction about pole 11 and locked in place on the pole by means of setscrews 44 and 45. Also, annular platform 12 can be removed from pole 11 and stored in a separate location, if desired, while framework 13 can be left folded adjacent pole 11. In order to insure that framework 13 remains in its stored or vertical position, a flexible strap can be extended about the knee joints or connections between lower and upper legs 18 and 19 of leg assembly 16 to prevent the leg assemblies from folding away from pole 11. Furthermore, setscrew 45 of upper collar 15 can be urged into engagement with pole 11 to hold collar 15 in its upper position, which eliminates the necessity of the flexible strap extending about the vertically extending leg assemblies 16.

When pole seat 10 is positioned at seat level as shown in FIG. 1, framework 13 is such that it is substantially invisible to a person standing adjacent pole seat 10 since the lower legs 18 of leg assembly 16 extend inwardly toward lower collar 14. The area beneath annular platform 12 is substantially unencumbered with supporting legs, or the like, so that annular platform 12 appears to be suspended from pole 11. This presents a pleasing appearance and adds to the decor of the room. Furthermore, when annular platform 12 is to be used as a work table, the assembly can be elevated to any desirable height along the pole and fastened in place by tightening setscrews 44 and 45. A person seated adjacent annular platform 12 and facing pole 11 will not have a multitude of downwardly extending supporting legs encumber his position adjacent pole seat 10 since lower legs 18 extend inwardly toward lower collar 14.

In addition to the arrangement shown in the drawing, various doughnut-shaped cushions and other equipment can be used in connection with pole seat 10 to further enhance the decor of the arrangement.

While this invention has been described in detail with particular reference to preferred embodiments thereof, it will be understood that variation and modifications can be effected within the spirit and scope of the invention as described hereinbefore and as defined in the appended claims.

I claim:

1. A platform assembly connectable to an upright post to form a horizontal surface, said platform assembly comprising a framework including upper and lower collar members positionable about the post, a plurality of support leg assemblies each comprising a lower leg member connected at one of its ends to said lower collar member and an upper leg member connected at one of its ends to its lower leg member and connected at its other end to said upper collar member, said lower leg members normally extending in an upwardly and outwardly sloped direction from said lower collar member, and said upper leg members normally extending radially outwardly from said upper collar member in an approximately common horizontal plane, support means connected to said upper collar member and arranged to space said upper collar member a distance from said lower collar member to maintain said upper leg members in an approximately common horizontal plane, and a platform member defining a central opening positionable about the post and sized and shaped to rest on said upper leg members.

2. The invention of claim 1 wherein said upper-collar member is movable along the length of the post, and said upper and lower leg members are foldably connected to each other and to said upper and lower collar members whereby said upper collar member is movable in an upward direction along the post and all of said upper and lower leg members are foldable to substantially vertical positions adjacent the post.

3. The invention of claim 1 wherein said upper and lower collar members are movable along the length of the post and connectable to the post at various different positions to change the height of the common horizontal plane of said upper leg members.

4. The invention of claim 1 and further including a plurality of strap members each connected at one of its ends to a support leg assembly and connectable at its other end to an adjacent support leg assembly, said strap members normally extending in an approximately common horizontal plane at the perimeter of said framework.

5. The invention of claim 1 wherein said platform member comprises a substantially rigid board member extending substantially throughout said platform member, said board member defining a central opening of a size larger than the post and a slot extending from its central opening to its edge, and a layer of cushion material juxtaposed at least one side of said board member, said cushion material defining a slot of less width than the slot of said board member and positioned in registration with the slot of said board member.

6. The platform assembly of claim 1 and wherein said support means connected to said upper collar member comprises a rigid spacer brace extending in a downward direction from said upper collar member and arranged to abut said lower collar member.

* * * * *