April 28, 1942.

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FOOT AND LEG REST

Filed Jan. 29, 1940

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This invention relates to furniture and more particularly to a foot and leg rest, it being one object of the invention to provide a device of this character of such construction that a person's feet and legs may be comfortably supported thereon.

Another object of the invention is to provide a foot and leg rest wherein the leg and foot supporting portion is pivoted to a base in such a manner that after a person's legs and feet are rested on the support, it may be easily tilted to an angle which will eliminate leg strain, it being obvious that if a person is sitting in a rocking chair the foot supporting portion may have rocking movement imparted to it as the chair is rocked and thus maintain the desired angular relation to the chair and continue to comfortably support the legs and feet of the person.

Another object of the invention is to so mount the leg and foot supporting member that while it may be tilted angularly to adjusted positions, sufficient frictional binding will exist to prevent undesired tilting and thus allow the supporting member to be held in an angularly adjusted position without uncomfortable strain on a person's legs.

Another object of the invention is to form the base of the device that a brace extending transversely between side members of said base may also serve as a shelf upon which books and the like may be placed.

Another object of the invention is to provide the leg supporting member or platform with a covering so mounted that while it will be firmly held in place and lie flat on the platform, it may be easily detached when cleaning or replacement thereof is necessary.

The invention is illustrated in the accompanying drawings, wherein:

Fig. 1 is a side elevation of the improved leg and foot rest showing the platform or leg support in tilted position.

Fig. 2 is a similar view showing the platform in horizontal position.

Fig. 3 is a sectional view taken vertically through the device.

Fig. 4 is a view taken on the line 4—4 of Fig. 3.

Fig. 5 is a fragmentary sectional view on an enlarged scale, taken horizontally on the line 5—5 of Fig. 3.

Fig. 6 is a top plan view of one end portion of the platform.

Fig. 7 is a fragmentary sectional view on an enlarged scale, taken on the line 7—7 of Fig. 6.

Fig. 8 is a side elevation showing the foot and leg support formed of tubing.

Fig. 9 is a top plan view thereof.

Fig. 10 is a transverse sectional view taken on the line 10—10 of Fig. 8.

Fig. 11 is a fragmentary sectional view on an enlarged scale, taken vertically through one side of the support along the line 11—11 of Fig. 8.

The improved leg and foot rest has a base indicated in general by the numeral 1 and a platform 2 which is pivotally mounted over the base and tiltable from the horizontal position of Fig. 2 to an inclined position, as shown in Fig. 1, it being understood that the platform may be disposed at any desired angle between the horizontal position and the inclined position of Fig. 1.

The base 1 has side members of vertical up-rights 3 which, in the forms shown through Figs. 1 to 7, are preferably formed of wood of suitable thickness, but may be formed of metal or any other suitable material. These upright supports have lower portions formed with downwardly diverging legs 4 having flat edge faces 5 at their lower ends for resting flat upon a floor. Rear edges 6 of the upright side members 3 are concavely arcuate and their forward edge faces extend downwardly at a forward incline to provide sloping abutments serving a purpose to be hereinafter set forth. A panel 8, which may also be formed of wood, extends transversely between the side members 3 with its ends seated in channels or grooves 9 formed in inner side faces of the side members. This panel constitutes a transverse brace for the base and, in addition, serves as a shelf upon which books, magazines or other articles may be placed when not in use. An upstanding strip 9 extends along the front edge of the panel 8 and serves as a guard rail to prevent articles from slipping off the front of the panel. It will thus be seen that the base is so formed that it is very strong and not liable to become distorted and elements forming the same are not liable to work loose.

The platform 2, which may be of wood, metal or other suitable material, has side bars 10 between rear ends of which extends a thick end bar 11. This end bar constitutes a hand grip by means of which the device may be easily lifted and carried from place to place and, since the outer surface of the cross bar is rounded, as shown in Figs. 3 and 7, and its under face 12 is flat and extends diagonally, the end bar may be firmly grasped without sharp corners cutting into a person's hand. Forward portions of the side bars 10 extend upwardly at a forward in-
clines to provide upstanding arms 13 between which an end panel or foot board 14 is mounted for engagement by a person's feet when the feet and legs are resting on the platform, as indicated by dotted lines in Fig. 3. A sheet of rubber 15 which serves as a shield, is provided upon this end panel for engagement by the feet and serves to prevent the panel from becoming scratched when the device is in use. Upper edges of the side bars 10 are curved longitudinally or upwardly bowed, and inner side faces of these side bars are formed with grooves or channels 16 which are similarly curved longitudinally and receive the side edge portions of a flooring sheet or panel 17. This panel 17 has its rear end engaged in a channel or groove 18 formed in the end bar 11 and its front end seated in a transversely extending groove or channel 19 formed in the foot board 14. It will thus be seen that the panel 17 is firmly mounted in the frame of the platform. Grooves 20 are formed across the upper face of the panel 17 in such spaced relation to each other longitudinally thereof that the panel may be readily bowed longitudinally when applied to the frame. A sheet 21 is provided as a carpet or covering for the platform and consists of a strip of carpet 22 and a backing 23 formed of felt or the like which has direct contact with the panel 17. Snap fastener sockets 24 are secured through the sheet 21 at rear corners thereof and companion sockets 25 are mounted at rear corners of the panel 17 for engagement by the sockets in order to securely but detachably hold the sheet in place. Since the sheet is only secured at its rear end and is free to move at its front end, it may have sufficient movement on the panel to cause it to rest all times rest flat on the panel and provide a smooth surface for a person's legs to rest upon. If desired, a cushion may be substituted for the carpet or upholstery applied to the panel.

In order to mount the platform for tilting movement from the horizontal position of Fig. 2, to an inclined position such as shown in Fig. 1, there have been provided hinge plates 26 secured against inner side faces of the side bars 10 by screws 27. These plates project downwardly from the side bars when viewed toward their lower ends, openings being formed adjacent their lower ends to receive bolts 28 which pass through the side members of the base and constitute pivots for the hinge plates. The bolts also pass through brackets 29 which extend transversely of upper ends of the side walls 3 of the base 1 and are secured by screws 30. The metal strips from which the brackets are formed are yielded so that binding action may take place when the wing nuts 31 of the bolts are tightened and in order that a good binding action may take place when the nuts are tightened, there have been provided washers 32 and 33, the washers 32 being disposed between the hinge plates and the brackets and the washers 33 being located between the brackets and the wing nuts. The bolts are so located with respect to the rounded forward corners 34 of upper ends of the side elements or members 3 and the upper edges and front edges of the side members are in such angular relation to each other that when the platform is swung about the bolts it may rest flat upon the upper edge faces of the side members 3 or be disposed at an inclined parallel to the front edge faces of these side members. Cushioning buttons 35 are applied to the front edge faces of the side members to engage the side bars 10 when the platform is in forwardly tilted position.

When this foot and leg rest is in use, it is set upon the floor in front of a chair and a person occupying the chair will rest his legs upon the platform with his feet in engagement with the foot board 14. The platform may be disposed horizontally, as shown in Fig. 2, or, if it may be tilted forwardly to an inclined position such as shown in Fig. 1, or at any desired angle between these two positions. By properly adjusting the nuts 31, frictional binding may be exerted to firmly hold the platform in adjusted position, or the nuts may be so adjusted that while the platform will have a tendency to remain in a set position, it may easily be tilted about the bolts during rocking movement of a chair. The platform will thus accommodate itself to movements of a person's legs and be at a comfortable angle.

In Figs. 8 through 11, there has been illustrated a modified construction wherein the base and platform or deck are formed of tubing. The tubing from which the base is formed has its intermediate portion bent to form a rear cross bar 36 and side bars 42 by elle weaving the tubing being then bent to form uprights or side members 38 which extend upwardly at a rearward incline, as shown in Fig. 8, and terminate in rearwardly extending arms 39, the uprights 38 taking the place of the forward ends of the uprights 3 and the arms 39 taking the place of the upper ends of the uprights 3.

The frame of a platform or deck 40 is also formed of tubing and comprises side bars 42 and a rear cross bar 36 which may be connected at its ends to the side bars 42 by elle weaving the tubing by bending a tube of the proper length to form the cross bar and the side bars. It will be understood that the base may also have its rear bar and its side bars formed of separate tube sections connected by elbows. The forward portions of the side bars 42 are bent to form arms 44 extending upwardly at a forward incline and corresponding to the arms 13 of the platform 10. These tubular arms 44 are bent slightly at their front ends and closed by ornamental knobs 45 held in place by their shanks 46 being inserted into the arms, as shown in Fig. 9. An upholstered body 47 of the platform or deck 40 is shown in Figs. 8 and 10 as resting loosely upon the side bars 42 and cross bar 41 and prevented from lateral or rearward displacement with respect to these frame elements by shaping its edges to provide a cross-sectional quarter-round contour adapting the body 47 to seat upon and engage the frame elements. The upholstered body has its forward portion extending beyond the arms 44 to provide a foot board and prevent forward longitudinal displacement of the platform body. If desired, the body 47 may be secured to the bar 41 and bars 42 in any suitable manner.

The deck or platform 40 is to be pivotally mounted and, in order to accomplish this, there have been provided hinge plates 48 which are of triangular shape and firmly secured at their upper ends to outer sides of the bars 42 by rivets 49 and have their lower ends pivoted to the uprights of the base by pins 50. The hinge plates 48 have been shown closer to the front end of the deck than they are to the rear end thereof to cause the deck or platform to have a tendency to normally assume the horizontal position shown in full lines in Fig. 8, but permit tilting movement to the inclined position indicated by dotted lines in this figure. When the deck or
platform is in the horizontal position, its side bars 42 rest on the arms 39 of the side members of the base and when it is tilted, its tilting movement is limited by engagement with the uprights 38 of the base. It will also be obvious that the hinge plates may be secured against inner side portions of the side bars 42 instead of against outer side portions thereof, in which case their lower ends will be pivotally connected to inner side portions of the uprights of the base.

It is to be understood that the base and the uprights are not limited to the tubular or wooden construction specifically illustrated and described, as other materials may be used. It is also to be understood that selected types of upholstery may be employed or other forms of pads substituted in place of the carpet 22 and the backing 23, the upholstery or padding being entirely omitted if so desired and the less and feet resting directly on the platform or upon a cushion placed thereon by the person using the device.

Having thus described the invention, what is claimed is:

1. In a foot and leg rest: a base having side members and a brace member extending between the side members and constituting a shelf; a platform having a leg supporting portion and a foot supporting member at the front end thereof and extending at an angle thereeto, the said side members having upper surfaces to support the platform in a horizontal position over the base, and having front surfaces for supporting the platform in a relatively steeply downwardly inclined position; hinge members carried by said platform, said hinge members being disposed at opposite sides of said platform and intermediate its ends and being pivotally connected to the side members of said base on an axis adjacent said upper surfaces to mount the platform for tilting movement from a horizontal position over the base at rest upon said upper surfaces of said side members to a downwardly inclined position in front of the base at rest against the front surfaces of said side members of said base; and forward and rearward floor engaging means on said base disposed to prevent overbalancing of said base forwardly and backwardly respectively by the weight of a user sustained by said platform.

2. In a foot and leg rest: a base having upright side members and a shelf mounted between the side members to brace the same and provided with an upstanding ledge along its front edge; a platform, the said side members having upper surfaces to support the platform in horizontal position over the base and front surfaces for supporting the platform in a relatively steeply downwardly inclined position; hinge members disposed at opposite sides of said platform, intermediate its ends, said hinge members being pivotally connected to the side members of said base on an axis adjacent said upper surfaces and mounting the platform for tilting movement from a horizontal position over the base at rest upon said upper surfaces of said side members to a downwardly inclined position in front of the base at rest against the front surfaces of said side members of the base; and forward and rearward floor engaging means on said base disposed to prevent overbalancing of said base forwardly and backwardly respectively by the weight of a user sustained by said platform.

3. In a foot and leg rest: a base having rigidly associated upright side members formed with upper surfaces and front surfaces extending downwardly therefrom at a relatively steep forward incline; a platform having side bars and a rear cross bar, forward portions of the side bars extending upwardly at an angle to the remaining portions of said side bars, a panel mounted between the rear portions of said side bars with its rear end terminating at the cross bar, and a foot board mounted between the upwardly extending forward portions of said side bars; hinge members carried by said side bars disposed intermediate the ends of said side bars and depending therefrom and pivoted to the side members of said base on an axis substantially in the plane of said upper surfaces of said base to mount the platform for tilting movement from a horizontal position disposing the side bars of the platform at rest upon the upper surfaces of the side members of the base to a downwardly inclined position in front of the base with the side bars of the platform abutting and at rest upon said front surfaces of the side members of the base; and forward and rearward floor engaging means on said base disposed to prevent overbalancing of said base forwardly or backwardly respectively by the weight of a user sustained by said platform.

4. In a foot and leg rest: a base having rigidly associated upright side members; a platform having side bars spaced toad each other a distance adapting them to bear against edge faces of the side members; hinge plates secured against inner faces of the side bars and projecting downwardly therefrom against inner side faces of the side members; brackets secured against inner side faces of the side members; base overbalancing lower portions of said hinge plates; bolts extending through the side members and the hinge plates and brackets and constituting hinge pins; washers upon said bolts at opposite sides of said brackets; and securing nuts threaded upon said bolts and when tightened applying pressure to the brackets to flex the same toward the hinge plates and create frictional binding for resisting tilting movement of the platform.

5. In a foot and leg rest: comprising: a base having side bars and uprights extending upwardly from the side bars and provided with horizontal arms at their upper ends; a platform; and hinge members carried by said platform and pivoted to said uprights and mounting the platform for tilting movement from a horizontal position at rest.
upon said arms to a tilted position in front of the uprights.

7. A foot and leg rest, comprising: a base having a rear cross bar and side bars extending forwardly therefrom and bent to form supports extending upwardly at a rearward incline from the front ends of the side bars and terminating in rearwardly extending arms at their upper ends; a platform; hinge members secured at opposite sides of said platform and extending downwardly therefrom; and pins pivotally connecting lower ends of said hinge members with said uprights at front ends of said arms and serving to mount the platform for tilting movement from a horizontal position at rest upon said arms to a tilted position against front portions of the uprights.

8. A foot and leg rest, comprising: a base having upright side members disposed at a rearward incline and provided with rearwardly extending arms at their upper ends; a platform having a frame formed with a rear bar and side bars extending forwardly therefrom and bent upwardly adjacent their front ends to form side bars for the foot rest; and hinge plates secured against the side bars of said frame and extending downwardly therefrom with their lower ends pivoted to the arms of said uprights.

9. A foot and leg rest, comprising: a base formed of tubular material bent laterally to provide a rear cross bar and side bars extending forwardly therefrom and bent upwardly to form upright, rearwardly inclined, side members terminating in rearwardly extending arms; a platform having a frame formed of tubular material having a rear cross bar and side bars extending forwardly therefrom and bent in spaced relation to their front ends to form upwardly extending, forwardly inclined, side bars for the foot board of the platform; terminal members carried by and closing upper ends of the last mentioned side bars; and hinge plates carried by the side bars of the platform frame and extending downwardly therefrom with their lower ends pivoted to the arms at upper ends of the uprights of said base.

10. A foot and leg rest, comprising: a base; a foot and leg supporting platform pivotally mounted intermediate the ends of said platform on said base on a transverse axis adjacent the top of said base; means on said base for limiting the pivotal movement of said platform in a direction characterized by the downward movement of the rear end thereof at a position in which said platform is substantially horizontal; means on said base for limiting movement of said platform in the opposite direction at a position in which said platform is relatively steeply inclined forwardly and downwardly, whereby the forward end of said platform in the last mentioned position is at a level substantially lower than the level of said horizontal position; and forward and downwardly engaging means on said base disposed to prevent overbalancing of said platform forwardly or backwardly respectively by the weight of a user sustained by said platform.

11. A foot and leg rest, comprising: a base having a substantially horizontal supporting surface and another supporting surface having a relatively steeply inclined portion extending forwardly downward from the front end of said horizontal surface; a foot and leg supporting platform transversely hinged to said base intermediate the ends of said platform and adjacent the front end of said horizontal surface, and adapted to be supported in a horizontal position by said horizontal surface and in an inclined position by said inclined surface; friction means for inhibiting pivotal movement of said platform on said base; and forward and downwardly engaging means on said base disposed to prevent overbalancing of said base forwardly or backwardly respectively by the weight of a user sustained by said platform.

12. A foot and leg rest, comprising: a base having a substantially horizontal supporting surface and another supporting surface having a relatively steeply inclined portion extending forwardly downward from the front end of said horizontal surface; a foot and leg supporting platform transversely hinged to said base intermediate the ends of said platform and adjacent the front end of said horizontal surface, and adapted to be supported in a horizontal position by said horizontal surface and in an inclined position by said inclined surface; friction means for inhibiting pivotal movement of said platform on said base; and forward and downwardly engaging means on said base disposed to prevent overbalancing of said base forwardly or backwardly respectively by the weight of a user sustained by said platform.

13. A foot and leg rest, comprising: a base; a foot and leg supporting platform transversely pivotally mounted on said base on an axis rearwardly remote from the front end of said platform; means on said base for supporting said platform in a forwardly and downwardly relatively steeply inclined position; means for supporting said platform on said base in a substantially horizontal position; the said axis being immediately below the foot and leg supporting upper face of said platform and so positioned with respect to the ends of said platform that the center of gravity of said platform is behind said axis when said platform is in horizontal position and forward of said axis when said platform is in inclined position; and forward and downwardly engaging means on said base disposed to prevent overbalancing of said base forwardly or backwardly respectively by the weight of a user sustained by said platform.

14. A foot and leg rest, comprising: a base; a foot and leg supporting platform transversely pivotally mounted on said base and on an axis intermediate the ends of said platform; means on said base for supporting said platform in a forwardly and downwardly relatively steeply inclined position; means for supporting said platform on said base in a more nearly horizontal extreme position; and forward and downwardly engaging means on said base disposed to prevent overbalancing of said base forwardly or backwardly respectively by the weight of a user sustained by said platform.

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