May 15, 1945. T. I. RESS 2,375,872

FOOT ADJUSTMENT FOR CABINETS

Filed Sept. 4, 1943

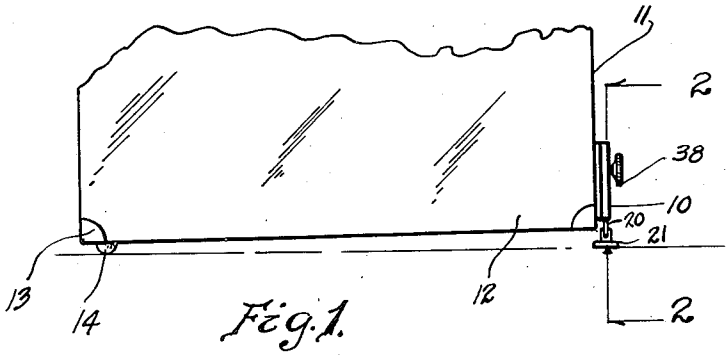


Fig. 1.

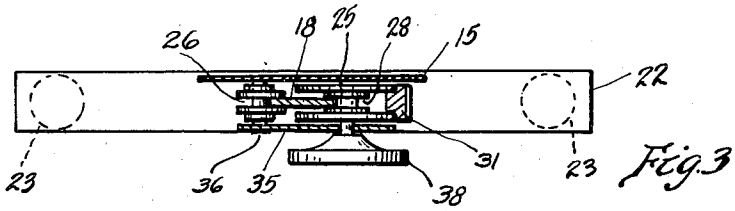


Fig. 3

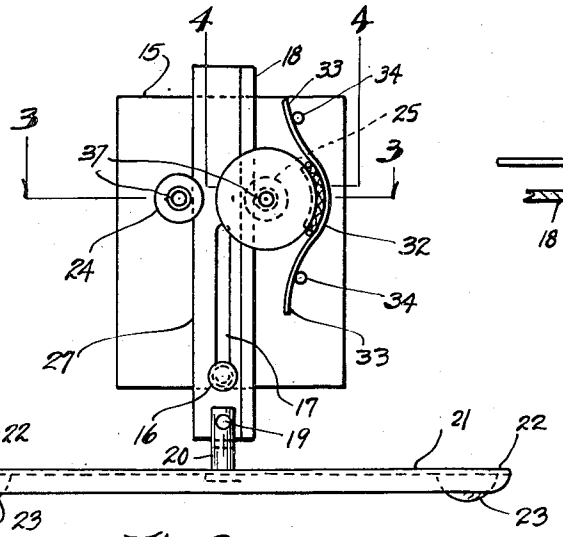


Fig. 2

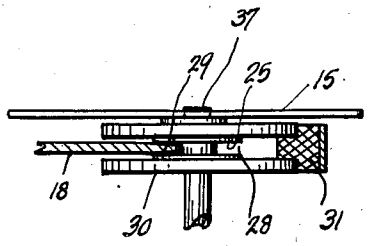


Fig. 4

INVENTOR.
Thomas I. Ress
BY
Thomas E. Meeks
His Attorney

Patented May 15, 1945 2,375,872

UNITED STATES PATENT OFFICE

2,375,872

FOOT ADJUSTMENT FOR CABINETS

Thomas I. Ress, Chicago, Ill., assignor to De Vry Corporation, Chicago, Ill., a corporation of Illinois

Application September 4, 1943, Serial No. 501,250

4 Claims. (Cl. 45—139)

This invention relates to certain new and useful improvements in a cabinet support and more particularly to foot adjustment for cabinets of various descriptions and has for its principal object the provision of an improved structure of this character which will be highly efficient in use and economical in manufacture.

I am aware of the fact that there are now in use adjustable cabinet feet designed and arranged to elevate or render level the cabinet body. My experience with these well known structures has demonstrated that they possess many undesirable features. Among such is that of requiring the use of two hands to adjust the foot. Again, sudden shock to the cabinet or excessive weight thereon will cause the foot to operate in a manner such as allows the cabinet to strike its supporting surface, a table or the like, with an impact such as results in damage to the cabinet and its contents.

It is therefore one of the objects of this invention to provide a foot rest which requires but one hand in its operation; one which is so designed as to resist sudden shock or excessive weight and one in which the foot rest becomes more effective in its function of supporting the cabinet commensurate with the degree of shock or weight imposed thereon.

A still further and important object of this invention resides in the simplicity of adjustment of the foot rest.

Other objects will appear hereinafter,

The invention consists in the novel combination and arrangement of parts to be hereinafter described and claimed.

The invention will be best understood by reference to the accompanying drawing showing the preferred form of construction, and in which:

Fig. 1 is a fragmentary side elevational view of a cabinet showing my improved foot adjustment associated therewith;

Fig. 2 is a sectional detail view of the foot adjustment taken substantially on line 2—2 of Fig. 1;

Fig. 3 is a sectional detail view of the same taken substantially on line 3—3 of Fig. 2; and

Fig. 4 is a fragmentary detail view taken substantially on line 4—4 of Fig. 2.

In the conception of my invention I have preferably associated the same with a moving picture projection cabinet. With such a cabinet it becomes frequently necessary to elevate the forward or projection end to properly focus the light beam upon the screen. Such cabinets require the foot to be firm in an adjusted position so as to prevent sudden and unexpected dropping of the cabinet with consequent results to the delicate parts therein. While as I have stated I have associated my invention with the particular cabinet described, it is to be understood that I am not so limited in the use of the invention.

To carry out the many salient objects of the invention I provide when necessary a housing 10 within which the foot adjusting mechanism is confined. This housing is usually attached to the front wall 11 of the cabinet 12. The cabinet 12 at its rear corner portions 13 may be provided with the usual rubber or other cushion foot 14.

While I have shown for the purpose of illustration the housing 10, it is to be understood that this housing may be a part of the front wall 11 such for example in the form of a hollow or recess (not shown).

My improved foot adjustment includes a mounting plate 15 generally secured within the housing 10 in any conventional manner.

Connected to this plate 15 is a head bearing screw 16, the shank of which works in an elongated slot 17 formed in a flat plate 18. The lower end of the plate 18 is pivotally connected as at 19 to a post 20. This post 20 is carried by the foot 21 in the form of an elongated plate having at opposite ends 22 feet (buttons) 23 made of rubber or other cushioning material.

Mounted upon the plate 15 in spaced relation with respect to each other are guide and latching rollers 24 and 25 of the groove type.

In the groove 26 of the roller 24 operates the flat edge 27 of the flat plate 18. In the groove 28 slides the tapered edge 29 of the plate 18.

The roller 25 is preferably formed to operate with a brake wheel 30 carried by the plate 15. Operating against the edge of this wheel 30 is a brake shoe 31. This brake shoe is held in operative position by a leaf spring 32 having its opposite ends 33 engaging pins 34 carried by the plate 15.

A cover plate 35 is positioned in spaced relation with respect to the mounting plate 15 and is supported in such position by the ends of the shafts 37 of the rollers 24 and 25 and the ends of the pins 34.

To complete the invention I provide a hand wheel 38 on the shaft 37 of the roller 25 whereby upon rotation of this hand wheel with the consequent result of the operative engagement between the walls of the grooves of the roller 25 and the tapered edge 29, the foot plate 21 may be adjusted to the required or desired position.

As the brake shoe 31 is constantly bearing

on the brake wheel 30 the foot will be held in the position to which it is adjusted.

Any sudden jar or shock or excess weight imposed upon or transmitted to the cabinet or the plate 15 will not effect the adjusted position of the foot plate 21. This results from the fact that the tapered edge 29 of the plate 18 moves at a tangent to the rotation of the roller 25 and brake wheel 30 with the result that a binding takes place between the tapered edge 29 and the contact walls of the roller 25 and thereby resists movement of the plate 18 relative to the roller 25 by such sudden or unexpected jar or shock or excess weight.

The simplicity of the invention and its usefulness is obvious from the foregoing.

While I have illustrated and described the preferred form of construction for carrying my invention into effect, this is capable of variation and modification without departing from the spirit of the invention. I, therefore, do not wish to be limited to the precise details of construction set forth, but desire to avail myself of such variations and modifications as come within the scope of the appended claims.

Having thus described my invention, what I claim as new and desire to protect by Letters Patent is:

1. A foot for a cabinet or the like comprising a mounting member, spaced grooved rollers having walls on the mounting member, a brake wheel formed integrally with one of said rollers, a brake shoe for the wheel, means for supporting said brake shoe from the mounting plate and for urging said shoe into braking action with respect to the wheel, a foot plate, an upright member carried by the plate and operable between the rollers, means providing slidable connection between said upright member and said mounting member, said upright member having a tapered edge portion operatively engaging the walls of the groove of the roller formed integrally with the brake wheel, and a hand wheel for rotating the brake wheel.

2. A foot for a cabinet or the like comprising a mounting member, spaced grooved rollers having walls on the member, a brake wheel formed integrally with one of said rollers, a brake shoe for the wheel, means for supporting said brake shoe from the mounting plate and for urging the brake shoe into braking action with said wheel, a foot plate, an upright member carried by the foot plate and operable between the rollers, means providing slidable connection between the upright member and said mounting member, said upright member having a tapered edge portion operatively engaging the walls of the groove of the roller formed integrally with the brake wheel, a hand wheel for rotating said brake wheel, and a pivotal connection between the upright member and the foot plate.

3. A foot plate for a cabinet or the like comprising a mounting member, spaced grooved rollers having walls on the member, a brake wheel formed integrally with one of said rollers, a brake shoe for the wheel, means for mounting the brake shoe from the mounting member and for urging the brake shoe into braking action with respect to the wheel, a foot plate, an upright member carried by the foot plate and operable between the rollers, said upright member having a tapered edge portion operatively engaging the walls of the groove of the roller formed integrally with the brake wheel, a hand wheel for rotating the brake wheel, means for connecting the hand wheel to the brake wheel, and a slot and pin connection between the mounting member and the upright member.

4. A foot for a cabinet or the like comprising a mounting member, spaced grooved rollers having walls on the member, a brake wheel having connection with one of said grooved rollers, a brake shoe for the wheel, means supporting the brake shoe from the mounting member and for urging the brake shoe into braking action with the wheel, a foot plate, an upright member carried by the plate and having a tapered edge portion operatively engaging the walls of the groove of the roller having connection with the brake wheel, a hand wheel for rotating the brake wheel, means connecting the hand wheel to the brake wheel, a pivotal connection between the foot plate and the upright member, and a slot and pin connection between the upright member and the mounting member.

THOMAS I. RESS.