

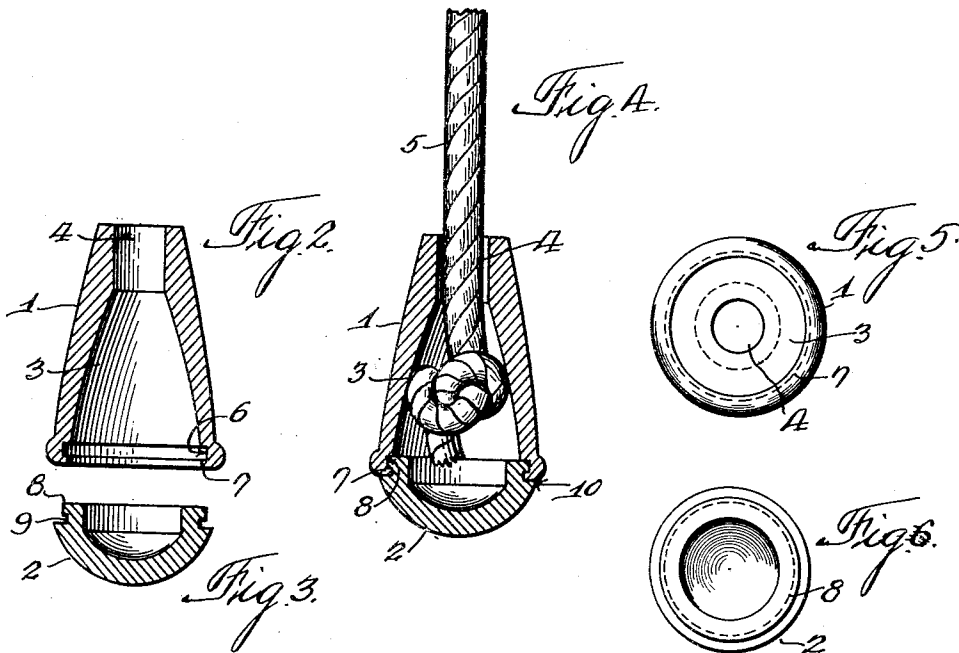
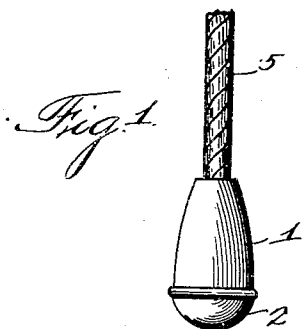
June 27, 1939.

J. A. GITS ET AL

2,164,206

PULL KNOB

Filed April 14, 1937



Inventor
Joseph A. Gits:
Jules P. Gits:
By: Amos, Thibault, Olsen & Muelken
Attys.

UNITED STATES PATENT OFFICE

2,164,206

PULL KNOB

Joseph A. Gits and Jules P. Gits, Chicago, Ill.

Application April 14, 1937, Serial No. 136,713

2 Claims. (Cl. 16-122)

This invention relates to certain improvements in tassels or pull knobs, and more particularly, to devices of this type that are used, for example, at the end of pull cords of Venetian blinds or the like.

An object of the invention is to provide broadly a pull knob that may be molded of cellulose acetate or materials of equivalent properties, and which is, therefore, simple, inexpensive to manufacture and more efficient for its purpose.

A further object of the invention is to provide a pull knob having a cap and a body portion molded of cellulose acetate, as described, which is sufficiently springy in character so as to obtain a simple snap action arrangement in detachably securing the cap to the body portion.

By providing the cap with a snap action in its attachable relation to the body portion, the cap may be easily removed for repairing the cord and may be manufactured at a lower cost in connection with the body portion than devices of the prior art. Moreover, molding the device permits the use of cellulose acetate material which is somewhat resilient and will not soil by handling and will eliminate many operations in the manufacture that were heretofore necessary.

Specifically, it is an object of the invention to provide a pull knob of the aforesaid type that is so molded as to have an inner recess disposed within the body portion and to have an embossed ring on the cap, adapted to cooperate with the recess thereby providing a simple form of snap attachment which eliminates screw threading and like connections of the prior art and provides a more efficient form of pull knob at a greatly lower cost.

Further objects and advantages of the invention will be apparent from the following description taken in connection with the accompanying drawing which forms a part hereof.

In the drawing:

Figure 1 is an elevational view of a pull knob embodying the invention;

Fig. 2 is a cross-sectional view of the body portion;

Fig. 3 is a similar view of the cap;

Fig. 4 is a similar view but with the cap attached to the body portion;

Fig. 5 is a view looking at the open end of the body portion; and

Fig. 6 is a view of the open end of the cap.

A preferred embodiment of the invention illustrated in the drawing is preferably molded of cellulose acetate or other suitable material. Within certain limits cellulose acetate is slightly

springy in character, will not soil when handled and may be made in different colors to readily adapt the pull knob to different color combinations of the interior decoration. The pull knob comprises a body portion 1 and a cap 2. Body portion 1 has a cavity 3 opened at one end and communicating with a hole or passage 4 at the other end through which cord 5 is adapted to extend, as shown in Fig. 4, and be knotted so that this knot will remain in the cavity and prevent the end of the cord from being pulled through hole 4. The shape of body portion 1 and cap 2 may be varied according to the design of pull knob desired. As shown, the wall of body 1 increases in diameter but decreases in thickness as it reaches the lower end so as to be of greater thickness and non-yielding in character along its upper portion adjacent the end at the cord opening 4 and of less thickness but slightly yielding in character at the lower end where receiving cap 2. It will be noted, however, that different tapers and curves may be readily given to this type of construction without added cost and without departing from the scope of the invention.

An annular recess 6 may be formed in the inner wall of body portion 1 adjacent the open end of cavity 3. Forming recess 6 in the body portion 1, as shown, results in an annular shoulder 7 that is of slightly smaller diameter than a shoulder 8 on cap 2. A recess 9 of a width equal to shoulder 7 is formed in cap 2. Shoulder 8 is in the nature of an embossed ring that is adapted to fit into recess 6. Shoulder 8 is of a diameter equal to the diameter of recess 6. Consequently, shoulder 8 may be sprung into engagement with recess 6 by applying slight pressure against cap 2. Cap 2 secures itself, therefore, to body portion 1 by a snap action and will remain in position until removed by springing shoulder 8 out of engagement with recess 6.

To remove cap 2, it is only necessary to insert a sharp pointed instrument at any point along the peripheral line of separation as indicated at 10 in Fig. 4 and force this pointed instrument inwardly until shoulder 7 of body portion 1 is sprung sufficiently to release shoulder 8 from its engagement in recess 6.

By providing an undercut cavity in the nature of a recess 6 in body portion 1 near its outer edge and an embossed ring in the nature of shoulder 8 on cap 2, these parts may be made to readily interlock by a snap action arrangement. Their removal may be very easily accomplished by the use of a sharp pointed instrument, as above de-

scribed. Molding a pull knob permits obtaining various shapes or designs in accordance with requirements of installation and use. Inasmuch as these pull knobs are adapted to be gripped by the hands to adjust blinds, etc., it is apparent that they may be readily soiled. By employing cellulose acetate, or like material, pull knobs embodying the invention will not soil, and therefore, do not require refinishing.

Without further elaboration, the foregoing will so fully explain the gist of our invention that others may, by applying current knowledge, readily adopt the same for use under varying conditions of service without eliminating certain features, which may properly be said to constitute the essential items of novelty involved, which items are intended to be defined and secured to us by the following claims.

We claim:

1. In a device of the class described, in combination, a pull knob of molded material which is adapted to be used at the end of a cord by having the cord tied thereto, said pull knob comprising a substantially elongated body provided with a cavity that is open at its lower end and a hole at its upper end through which the cord extends and is knotted so as to position the knot in said cavity, and a cap for fitting said body portion by a snap action engagement at said lower open end, said hole being of small cross section relative to said cavity, said cavity increasing in cross section as it approaches its said lower open end, the wall of said body increasing in diameter but decreasing in thickness as it reaches said lower open end so as to be of substantial thickness and non-yielding in character

along its upper portion adjacent said cord hole and of less thickness but slightly yielding in character where receiving said cap, said wall having a tapering curved outer surface that terminates in an annular bead of larger diameter than said cap whereby to prevent accidental removal of said cap by preventing the same from being effectively gripped when said body portion is gripped about its outer curved surface to exert a pull upon the cord.

2. In a device of the class described, in combination, a pull knob of molded material adapted to be used at the end of a cord by having the cord tied thereto, said knob comprising an elongated body formed with a cavity that is open at the lower end of said body and with a hole at its upper end through which the cord extends and is adapted to be knotted so as to position the knot in the cavity, a cap cooperating with said lower end of the body by a snap engagement, said body being of the smallest diameter at said upper end and tapering outwardly with a curved outer surface to provide increased diameter at said lower end, the wall of said body being of a greater thickness and non-yielding in character adjacent said upper end and of less thickness but slightly yielding in character at said lower end where receiving said cap, and an annular bead on said body at said lower end, said cap having a spherical outer surface of a diameter preventing effective gripping engagement thereof capable of displacing the same when said body portion is gripped about its said curved outer surface to exert a downward pull upon the cord.

JOSEPH A. GITS.
JULES P. GITS.