

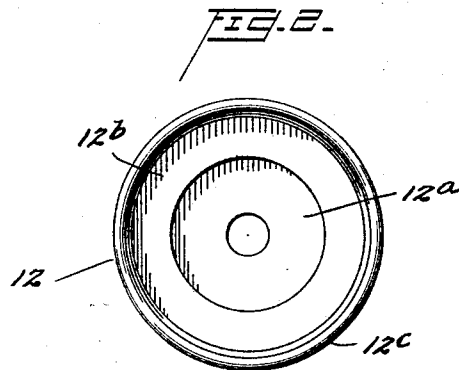
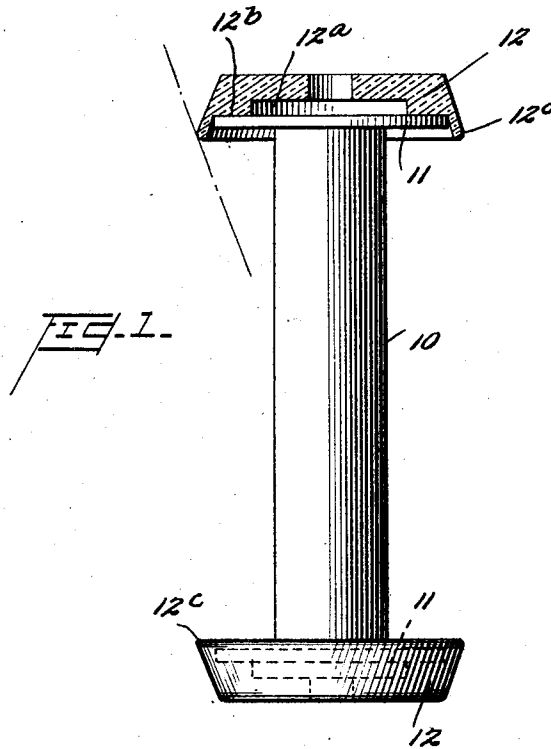
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BOBBIN OR SPOOL CAP

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BOBBIN OR SPOOL CAP

Application filed October 9, 1928. Serial No. 311,316.

This invention relates to bobbins or spools of the kind employed in textile machines, and it has special reference to the provision of a porcelain cap which is adapted to be applied to the ends of such bobbins.

As is well known with bobbins of this kind, the thread is drawn off in the general direction of the longitudinal axis of the bobbin so that it comes in contact with the flanges or heads on the ends of the bobbin. It has been found that as heretofore made, the heads or ends of the bobbins become more or less worn by the threads passing over and around the same, since the bobbins themselves remain stationary while the thread is being drawn therefrom. The result is that the heads or ends of the bobbin become roughened or worn by the thread, which results in catching or breaking the thread as it passes from the bobbin.

The present invention aims to provide a bobbin having a head of vitreous material, particularly porcelain, which is very smooth and non-resistant to wear, so that the thread can be drawn off the bobbin and around the head or end thereof without any danger of the thread being broken and without any danger of the head becoming worn.

Referring to the accompanying drawings which illustrate the invention;

Figure 1 is a longitudinal view partly in section showing my improved bobbin; and

Figure 2 is a plan view of the side of one of the caps hereinafter described.

Referring to the drawings in detail, 10 indicates the body portion of the bobbin, and to this body portion there are secured two head portions 11. The head portions 11 are preferably made flat, and may be secured to the body 10 by screws or in any other suitable manner.

The main feature of the invention consists in the use of caps indicated at 12 which are mounted on the heads 11 and secured thereto in any suitable manner. The caps 12 are frustro-conical in shape with the larger ends thereof extending inwardly, that is, toward the body portion 10, and the small ends thereof extending away from the body portion 10. The larger end of each cap 12 is hollowed out

to provide a recess 12a, and surrounding this recess the material of the cap is thickened and shaped to form a flat ledge 12b, which flat ledge is adapted to rest firmly on the outer flat face of the head 11. The thickened portion of the cap beneath the ledge 12b facilitates manufacture thereof in that it prevents warping of the caps particularly in burning. If desired, the heads 11 may be secured to said ledges by means of cement, or any other means, as before noted, may be employed for securing the caps in place. The larger end of each of said caps is also provided with an inwardly extending peripheral flange 12c. These flanges are arranged to surround the peripheries of the heads 11 and the flanges 12c extend inwardly somewhat beyond the inner faces of the heads 11. The extreme inner ends of the flanges 12c are rounded, as clearly appears from the drawing, to facilitate passage of the thread thereover, as indicated at T.

As before noted, the caps 12 are preferably made of porcelain, and the surfaces thereof, particularly the surfaces of the flanges 12c, permit the thread to be drawn thereover without any tendency to break the thread and with little or no wear upon the flanges of the caps. The provision of the recess in the interior of the cap serves to obviate any unevenness in the setting of the caps on the heads, because it limits the contact between the caps and the head to the relatively narrow ledges 12b. The smaller ends of the caps are preferably made flat, so that the bobbin will rest evenly on a flat surface.

Having thus described the invention, what is claimed as new and desired to be secured by Letters Patent is:

1. As an article of manufacture a cap for covering the heads of bobbins or the like, said cap being integrally formed of vitreous material and having on one side a recess, a ledge surrounding said recess and having a flat surface, the material of said cap around said recess being thickened to form said ledge, whereby warping of the cap during manufacture is prevented, and a flange surrounding said ledge.

2. As an article of manufacture a frustro-

conical cap for covering the ends of bobbins
or the like, said cap being integrally formed
of porcelain material having a circular recess
extending inwardly from the larger end or
5 side thereof, an annular ledge surrounding
said recess, the material of the cap around
said recess being thickened to form said
ledge, whereby warping of the cap during
manufacture is prevented, and an annular
10 flange surrounding said ledge.

In testimony whereof I hereunto affix my
signature.

JOHN R. MITCHELL.

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