July 6, 1937. N. H. BRAY 2,086,062

VENTILATED HANDLE

Filed Sept. 16, 1935

FIG. 1.

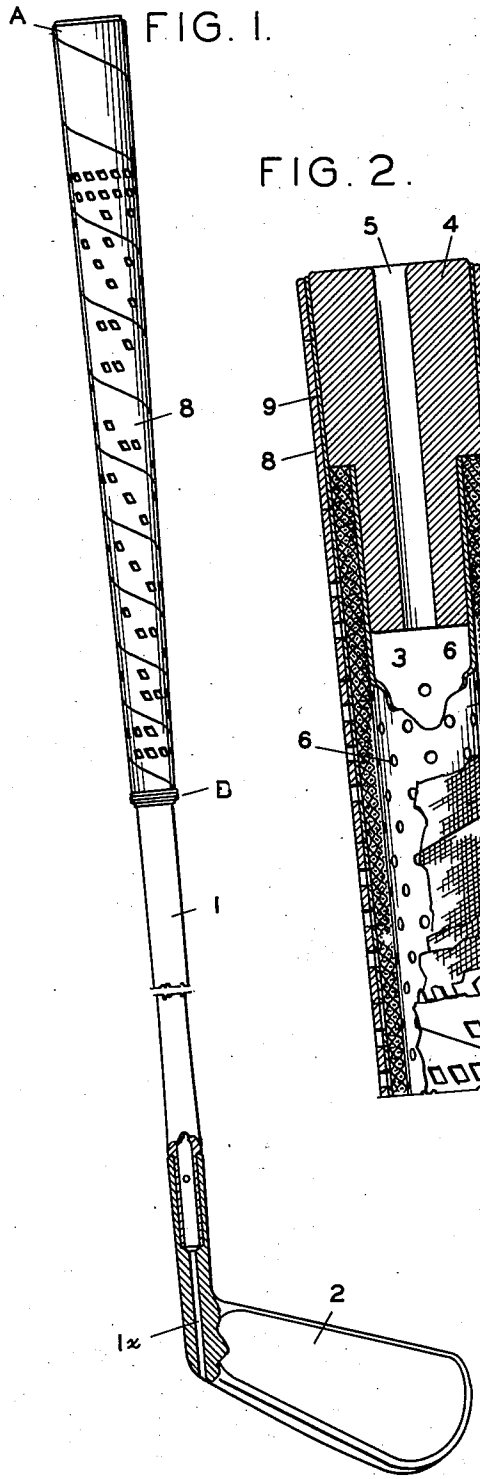


FIG. 2.

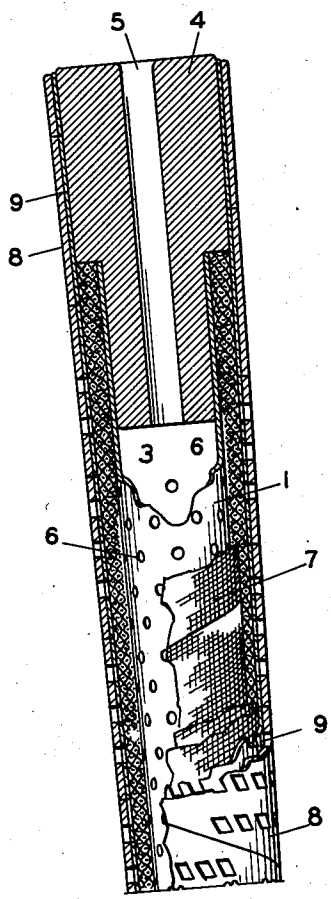


FIG. 3.

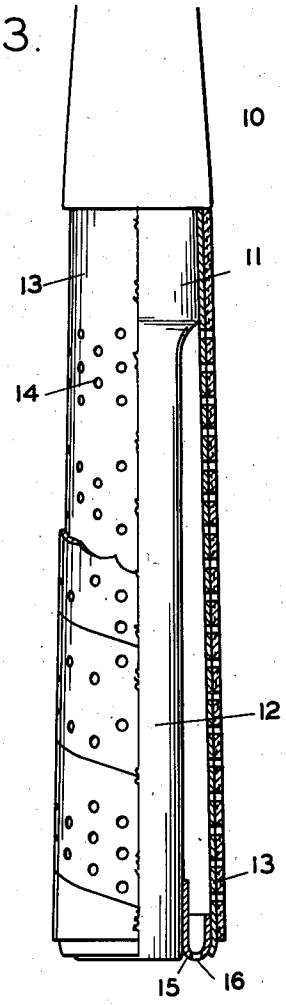
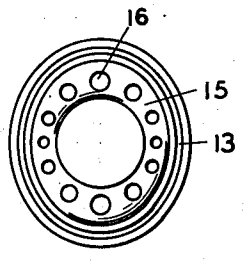


FIG. 4.



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VENTILATED HANDLE

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3 Claims. (Cl. 273—81)

This invention relates to improvements in ventilated handles and more particularly to ventilated hand grips for golf clubs.

An object of the invention is to prevent the accumulation of excessive perspiration on the hand grips of manual implements and the like.

Another object is to precondition such gripping surfaces to prevent the causing of undue perspiration.

Another object is to cause the rapid evaporation of moisture from the gripping area to lower the temperature and aid the adjustment of the hand to the grip, and insure the proper frictional coefficient at the moment of applying muscular force to the grip.

Another object is to adhere to the conventional size, shape and "feel" of a golf club in the application of this invention thereto.

Other objects and advantages will appear as the description progresses.

In this specification and the accompanying drawing the invention will be disclosed in its preferred form. It is to be understood however that it is not limited to this form because it may be embodied in other forms within the purview of the claims following the description.

In the one sheet of drawings:

Fig. 1 is an elevation of the shaft of a golf club having its hand grip portion constructed in accordance with this invention.

Fig. 2 is an enlarged detail of the same showing the upper end thereof in fragmentary longitudinal section.

Fig. 3 is a modified form of the invention as applied to tool handles, showing a fragmentary longitudinal section of a hammer handle.

Fig. 4 is an end view of the same.

In detail the construction shown in the drawing, referring first to Fig. 2, comprises the conventional golf club steel shaft 1. These shafts are tubular and are tapered in graduated section to the lower end which is fixed in the head 2 in the approved manner.

This invention consists primarily in the modification of the outer and larger end of the shaft to accomplish the objects of the invention. The hollow plug 3 is driven into the open end of the shaft 1 with the larger head 4 protruding. The center hole 5 leaves the hollow shaft 1 open to the atmosphere.

The handle portion of the shaft is provided with lateral perforations 6. These are overlaid by a porous layer 7 such as spiral strips of wire mesh or other suitable material to permit free air circulation therethrough.

The perforated leather strip 8 overlies and adheres to the similarly perforated adhesive tape 9. The leather strip 8 and the tape 9 are wound spirally around the shaft end to complete the grip for the hand of the player. The adhesive tape 9 securely attaches the strip 8 to the layer 7. The last wrapping is securely fixed to the head 4 at A and wound with twine at its lower end at B.

This laminated form of porous or perforated material forming the grip portion of the handle permits free circulation of air between the atmosphere and the hollow center of the tubular shaft 1. With ordinary skill the present grip can be built up and still preserve the same "feel" as the conventional grip as applied to wooden or steel shafts.

When successfully played the game of golf requires a nicety of mental and muscular coordination. In most players the concentrated demand upon the nervous system is apt to cause undue sweating of the hands. This causes a slimy accumulation on the grip making it difficult to obtain the necessary friction for the purpose, without a muscular tension which will interfere with the free swing of the club so necessary in developing the maximum of skill.

In applying this invention to wooden golf clubs or tool handles the modification shown in Fig. 4 is suggestive. The handle 10 is reduced to form the shoulder portion 11, and further reduced to form the stem 12. The tubular shell 13 of sheet steel, fiber or the like is perforated as at 14 and shaped to give the desired hand grip. The larger outer end is closed by the thimble 15, snugly fitting the stem 12 and flanged back upon itself and clinched within the end of the sleeve 13.

The perforations 16 in the thimble 15 provide for circulation of air therethrough into the interior of the handle.

The sleeve 13 is enclosed within a layer composed of a strip of perforated leather or the like cemented or otherwise fixed thereto. There is a free circulation of air through the perforations 14 and 15 around the stem 12.

The swing of the golf club and the tool handle assures the displacement of any air impounded in the interior of the respective grip portions thereof. This displacement of air can be increased in the case of the steel shaft 1, by an opening, as at 1x, through the body of the head 2, see Fig. 1.

Having thus described this invention, what is

claimed and desired to secure by Letters Patent is:

1. A hollow perforated handle for implements; a layer of wire mesh overlying said perforate handle; and a perforated grip portion enclosing said layer of wire mesh.

2. A tubular shaft for golf clubs having a perforated handle portion; a plug in the outer end of said shaft having a hole longitudinally therethrough and a head of greater diameter than said shaft; a reticulate layer wound upon said perforated handle portion of the shaft; a perforated adhesive tape overlying said reticulate layer; and a perforated strip wound upon and overlying said adhesive tape.

3. A tubular shaft for golf clubs having a perforated handle portion; a plug in the outer end of said shaft having a hole longitudinally therethrough, and a head of greater diameter than said shaft; a reticulate layer wound upon said perforated handle portion of the shaft to a diameter equal to that of the plug head; a perforate adhesive tape overlying said reticulate layer and said plug head; and a perforate strip wound upon and entirely overlying said adhesive tape.

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