No. 817,117. PATENTED APR. 3, 1906.

I. C. ISAACS.

BRUSH.

APPLICATION FILED FEB. 12, 1904.

Fig. 1.

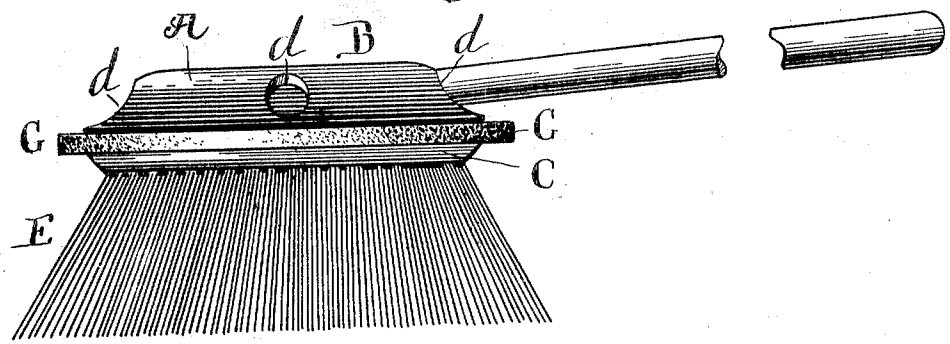


Fig. 2.

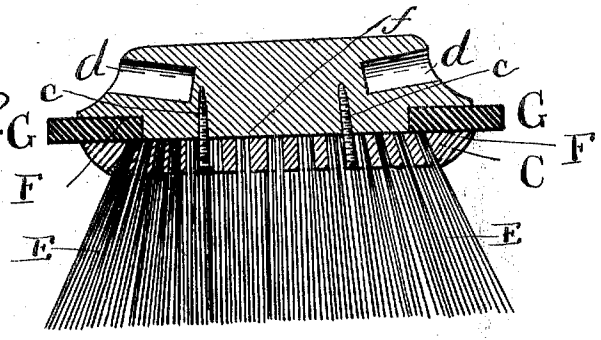
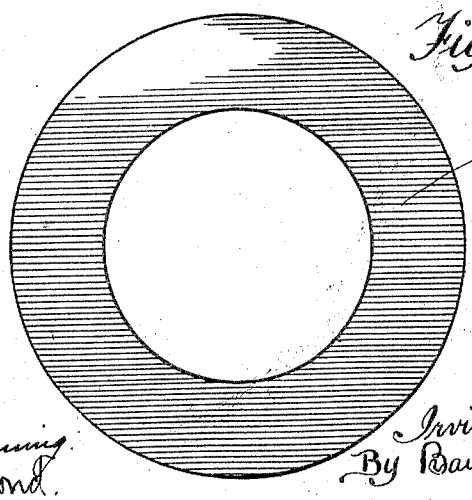


Fig. 3.



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UNITED STATES PATENT OFFICE.

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BRUSH.

No. 817,117. Specification of Letters Patent. Patented April 3, 1906.

Application filed February 12, 1904. Serial No. 193,257.

To all whom it may concern:

Be it known that I, IRVING C. ISAACS, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, have invented a certain new and useful Improvement in Brushes, of which the following is a specification.

The object of this invention is to produce a brush having a protective band or strip extending around its outer edge, which band or strip will be so inserted and held that it cannot possibly become loosened from the brush-head by usage and so clamped that it will be held in place when the parts are assembled without additional means for fastening.

A further object is to so arrange the parts that the rubber band can be easily and cheaply made and the parts composing the brush readily cut and assembled, so that the entire brush will be cheap in construction, neat in appearance, and strong and durable in use.

The invention consists in the features of construction of parts hereinafter described and claimed.

In the drawings illustrating the invention, Figure 1 is a side elevation of the entire brush as adapted for use in cleaning windows or cars; Fig. 2, a cross-sectional elevation of the brush head or body; Fig. 3, a face view of the protective ring employed to prevent the head of the brush from injuring the woodwork around the window.

The brush, as shown, is composed of a head A, preferably constructed of wood, which head consists of an upper plate B and a lower plate C, said plates being adapted to be held together by means of screws *c* or otherwise, and the upper plate is provided with a recess *d*, into which is inserted a handle D of suitable length to enable the brush to be used in cleaning windows or cars. The lower plate of the body or head is provided with a series of bristles E, and the body is composed of two plates in order to enable the bristles to be properly inserted and secured in place. The upper plate of the body or head is provided around its inner edge with a ledge F, which is contiguous with a circular boss *f*, adapted to contact the inner face of the lower plate of the head when the parts are assembled. Beneath the ledge F is located a ring G, preferably of rubber or other similar elastic material, and said ring is of an external diameter to project beyond the rim of the plates and afford an elastic surface for contact with the woodwork of the window-frame, and the ring is of an interior diameter to closely encircle the periphery of the boss *f* on the upper plate of the brush-head and of a thickness to lie flush with the face of the boss when the ring is in place. The lower plate of the brush-head is of substantially the same diameter as the upper plate, so that when the two parts are assembled a deep circumferential recess will be formed between the two plates, within which recess is the elastic ring hitherto described, and said ring will entirely fill the space between the two plates, which, however, will abut together on the boss of the upper plate, into which the screws uniting the parts are inserted, so that the contact between the two plates will not be against the elastic rubber, but against the solid and unyielding portions of the two sections of the head. This arrangement firmly secures the elastic ring in place and at the same time in no wise impairs the rigidity of the complete brush, which will be as strong and durable as one having a solid head. The arrangement is one which enables the rubber ring to be cut from a section of rubber pipe or tube of sufficient thickness and inserted into place around the boss before the parts are assembled, and the boss will afford a sufficient contacting surface for the rubber, so that as the parts are being assembled the rubber will not slip from its position and will not interfere with the assembling of the parts in any way. By making the recess of considerable depth it will be impossible to displace the protective band when the latter has been inserted, and by securing the parts together within their interior it will be impossible to impair the connection between the parts by reason of dents or injury to the periphery of the brush. By providing a ring of considerable width which is deeply embedded within the head of the brush the wear or injury to the periphery of the ring will not be sufficient to break through the ring and allow the same to be pulled from the brush, there being a sufficient proportion of the ring or band within the brush to prevent such injury.

What I regard as new, and desire to secure by Letters Patent, is—

A brush comprising a top plate having a solid circular boss formed integral therewith and on the bottom thereof and projecting downwardly therefrom, a ledge contiguous with the boss and surrounding the same, a rubber ring detachably and independently

mounted on the ledge adjacent the surrounding wall of the boss, so that its lower surface will be flush with the lower surface of said boss, and said ring having its peripheral edge projecting beyond the peripheral edge of said plate, a lower plate having bristles therein, arranged to contact flush with the lower surfaces of the boss and ring, and means for securing the two plates and ring together, substantially as specified.

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Witnesses:
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