June 2, 1936. E. S. BRADFORD, JR 2,043,031

SCOURING DEVICE

Filed Nov. 20, 1935

Fig. 1

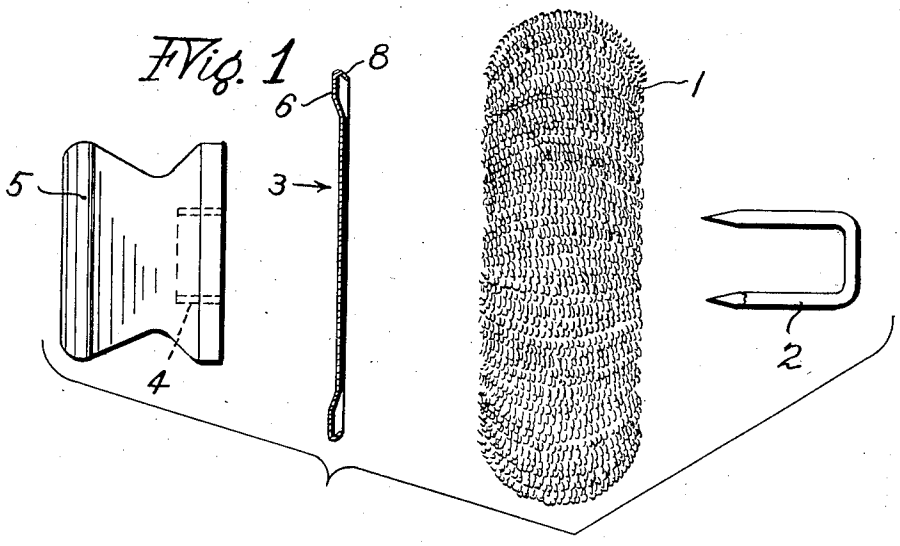


Fig. 3

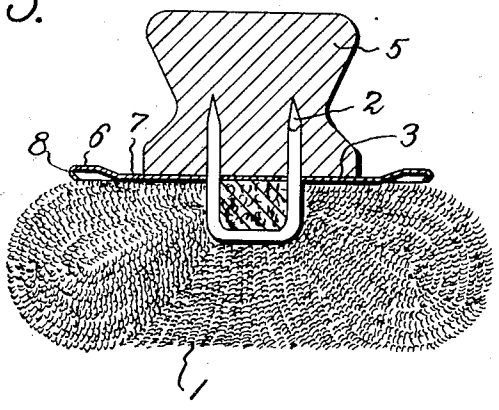
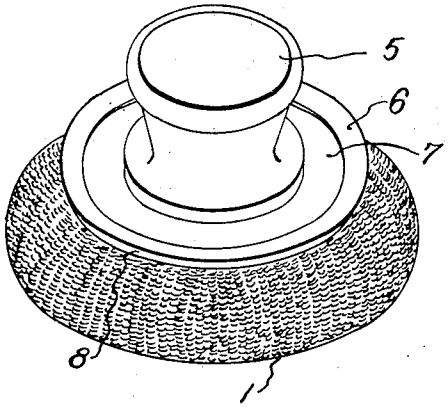


Fig. 2



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SCOURING DEVICE

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1 Claim. (Cl. 15—209)

This invention relates to an improvement in coiled wire cleaning tools such as are used in kitchens for cleaning pots and pans.

The improvement can be best understood from a description of the specific form which I have developed and actually used commercially.

Referring to the drawing,

Fig. 1 is a view showing the separate elements which when joined together make up the tool, some of the elements being shown in section;

Fig. 2 is a perspective view of the tool made of the elements of Fig. 1; and

Fig. 3 is an assembly view in section through the handle, the shield plate, and showing the staple in position to hold the pad of coils of cleaning wire.

I make up the pad 1 of cleaning wire by winding a skein from a single or double strand of flattened and closely coiled filament wire. When the skein is large enough to make the desired pad form, I squeeze the central portion of the skein between the legs of a staple 2, drive the staple through a stiff shield plate 3 made of metal or hard rubber, for example, into a circular groove 4 of the wooden handle or knob 5. The staple legs are wider in diameter than the width of groove 4 so they are held in place by a driving fit. The skein of wire material making the pad 1 puffs out like a powder puff and makes the cleaning pad.

There are a good many ways to make the wire strand forming the material of the pad and the form of the pad other than in a skein bunch as illustrated herein. It may be made of a flattened wire strand with closely spaced small coils all along its length and this strand alone or with others wound to skein or other bunch forms. Sometimes it is desirable to have a flattened wire carrier element for the coils. The pad might be made of steel wool material, but I prefer a non-rusting coppery filament metal. In any event, the pad is characterized by being made of metal having coils and presenting a great number of rather sharp abrasive edges. These are useful for cleaning but hard on the hands of the user.

A mass of cleaning wire such as makes up my pad 1 has a tendency to bunch up, consolidate, and not stay puffed out in the desired and most usable form.

For this reason, as well as to provide a shield for the user's fingers, I have provided in the combination a special element seen in the form of the stiff plate or disk 3.

This disk 3 may be made of light, stiff metal or thin composition material, as rubber that is hard enough to avoid any substantial bending. The shield is to be stiff enough so it does not substantially bend in use. It may be thin enough for the staple to drive through it. The outer edge of the plate or disk is preferably made with a slightly raised shelf 6 so that the annular space 7 around the bottom of the knob is slightly depressed and of a width suitable for the user's fingertips. The user holding the knob may press downwardly with the fingertips against the disk plate or shield 3 and work the tool with any rubbing motion, while the shelf 6 gives just enough of a flanged edge portion to help keep the fingertips from moving outwardly in the work.

The outer edge of the shelf has an inturned edge 8 all around. Then when the pad is moved back and forth with a hard pressing, short sweeping motion, the edge 8 digs into the resilient pad 1 and keeps it centered by a special pressure all around the circumference of the edge 8. This gives a positive movement to the outer portion of the pad. It is a distinct help in prolonging the life of the pad because unless the grip provided by edge 8 functions, the pull of the pad is practically all against the staple, and such action has caused the pad to get badly out of shape. It tends to slide too far first to one side and then the other side of the staple. But by providing the circular grip of edge 8 the pad is held in circular form from close to the outer edge of the pad. In addition, the cross-sectional shape of the metal shield tends to squash the pad outwardly, giving a circular bulge at the very outside portion. Thus, the outer circumferential portion of the pad can be puffed out and held out to clean well in corners.

Other advantages of the particular form of tool could be mentioned. But enough has been said to point out the peculiar utility of the specific combination improvement in the tool.

Having disclosed the nature of my invention and pointed out the preferred way of constructing it, I claim:

A pot cleaner comprising in combination a circular pad of bunched cleaning wire of highly resilient character, a circular disk of stiff metal mounted on top and concentrically of said pad, a knob handle mounted centrally above said disk, fastening means extending through the central portion of said pad, said disk and into said knob to hold the parts together, the meeting faces of the pad and disk and knob all being held in perfectly flat relation, said disk extending flatwise beyond the edge of the knob and then being bent

into a slightly raised shelf at the outer margin, the edge of said disk being bent slightly downwardly and inwardly to about the plane of the flat engaged face of the upper side of the pad, said circular pad extending beyond the circumference of said disk, all constructed and arranged for the cleaning wire of the pad to be resiliently bunched entirely below the under plane of the disk in puffed out condition held only by the central fastening means but when pressed downwardly by the knob to be squashed out widely by the stiff flat disk, and when rubbed against the work held in circular condition by the downturned edge of the disk.

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