Dec. 26, 1933. R. O. PERKINS 1,940,767

SEWING MACHINE ATTACHMENT FOR STAMPING AND HAMMERING SHEET METAL AND THE LIKE

Filed Aug. 23, 1932

FIG. 1

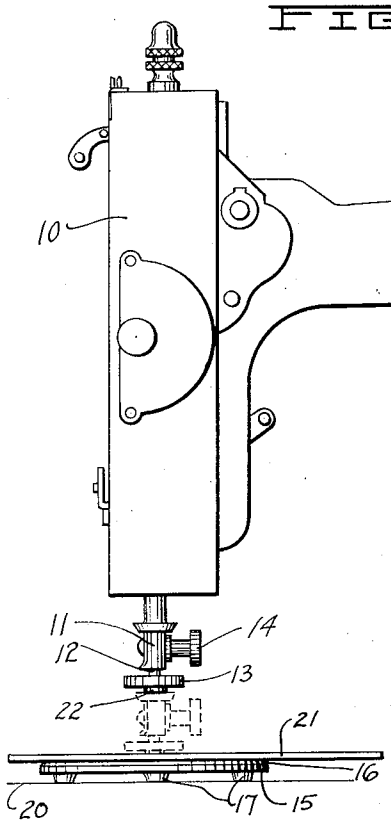


FIG. 5

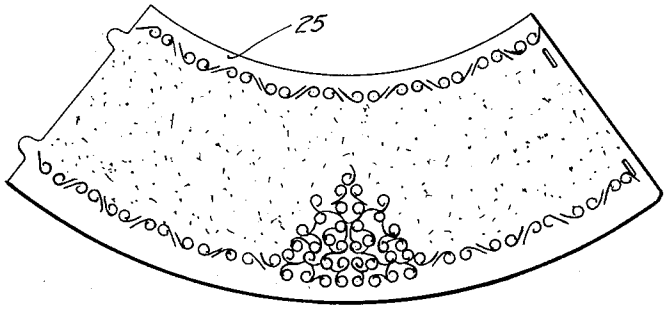


FIG. 2

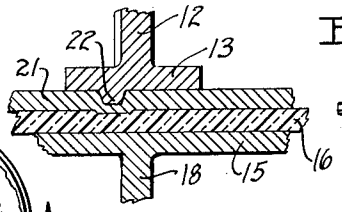


FIG. 8

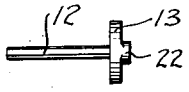
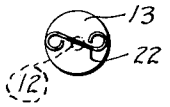


FIG. 7



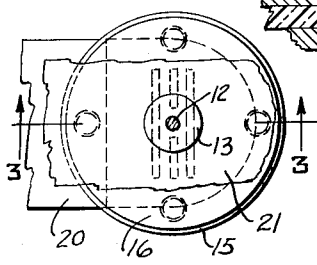
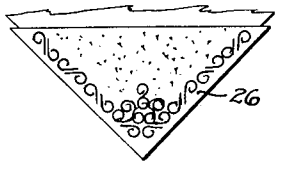


FIG. 4

FIG. 6



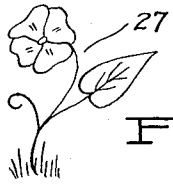
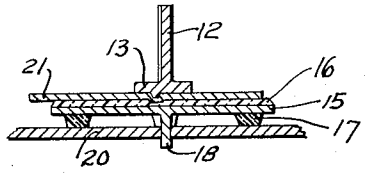


FIG. 9

FIG. 3



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SEWING MACHINE ATTACHMENT FOR STAMPING AND HAMMERING SHEET METAL AND THE LIKE

Ralph O. Perkins, Cleveland, Ohio

Application August 23, 1932. Serial No. 630,067

1 Claim. (Cl. 101—3)

My invention pertains to an attachment for a standard sewing machine, providing a new and novel means for hammering, embossing or penetrating sheet metal or other material for use in the decorative arts.

One of the objects of the invention is that with this attachment every home that possesses a sewing machine may ply the art of hammering embossing and piercing brass or copper sheets of metal, without in any manner disarranging the sewing machine and without danger of damaging the machine. This work of hammering, embossing and piercing brass or copper when done in the home is usually performed by hand and is not always accurate or neat.

Other objects may be noted from the following specification and the accompanying drawing, in which:

Figure 1 is a front elevation of part of a sewing machine head with a die and disk in stamping position. Fig. 2 is a plan view of the disk. Fig. 3 is a sectional view taken on lines 3—3 of Fig. 2, showing the die pressing into the metal. Fig. 4 is an enlarged fragment of Fig. 3. Fig. 5 is a pattern of a pierced and hammered lamp shade. Fig. 6 is a view showing treatment of a desk pad end. Fig. 7 is an end view of a die. Fig. 8 is a side elevation of a die. Fig. 9 is a design made up of a series of dies.

Referring to the drawing: a sewing machine head 10 has a needle holder or bar 11 within which is mounted the stem 12 of a die 13 in operating position, and held rigid by an adjusting screw 14. A metal disk 15 upon which a rubber pad 16 is adhesively fixed, has on its underside a plurality of rubber feet 17 also fixed in like manner to the metal disk 15. A pin 18 projects downwardly from the center of said disk 15 and is inserted in the usual needle hole in the sewing machine throat plate 20 and thus holds the disk 15 in place.

In operation, the piece of metal 21 to be stamped or hammered is superimposed on the soft rubber pad 16 and as the sewing machine is set in motion by the operator the die 13 stamps or pierces the pattern desired upon the metal 21 as it is fed by the operator. The die 13 may have a design 22 of various configurations projecting outwardly from the surface of said die 13 to a uniform height.

Any number of patterns may be made by utilizing the different dies in different ways as shown by a lamp shade 25 in Fig. 5, a metal corner 26 in Fig. 6, and a flower design 27 in Fig. 9.

The work on the machine may be done more speedily, more accurately, with the imprint on the metal more uniform in design and depth.

The purpose of the rubber 16 is to cushion the stroke of the die member 12 and to permit the sheet 21 to be impressed or deformed with the design in relief on its under side. Although intended particularly for relief and intaglio work on soft metal sheets it is capable of use on parchment, cardboard or other material, for the rapid production of ornamental designs according to the skill or wishes of the operator, and the ease with which the device may be applied to an ordinary sewing machine makes it particularly useful for home work. Instead of a die with a particular design, it may have only a blunt end for the tracing of lines or the production of so-called "hammered" work in various forms.

I claim:

Means for converting a sewing machine into a die stamping machine, comprising a die secured to the needle bar of the machine, and a base member consisting of a metal plate having rubber feet mounted on the throat plate of the machine and having a depending pin fitting in said throat plate, and a soft rubber face plate secured upon said base plate and cooperating with the die to permit impressions thereby on sheet material between the die and said face plate.

RALPH O. PERKINS.