June 27, 1939. S. H. GARNER 2,164,060

FINGER RING BLANK AND METHOD OF MAKING SAME

Filed Aug. 22, 1935

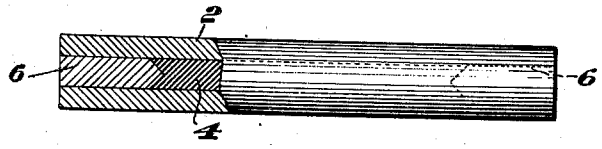



Fig. 1

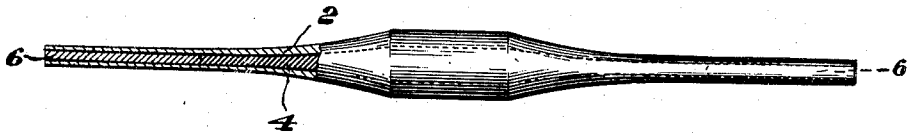



Fig. 2

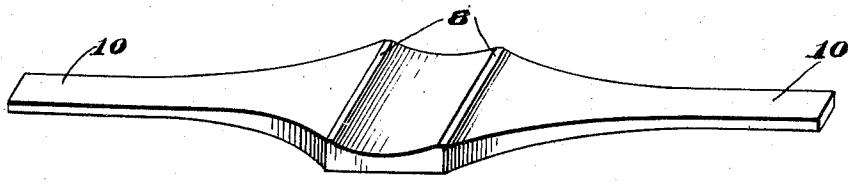



Fig. 3

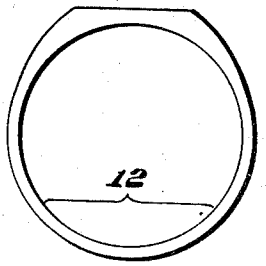



Fig. 4

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## FINGER RING BLANK AND METHOD OF MAKING SAME

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6 Claims. (Cl. 29—160.6)

This invention relates to an improved method for making composite finger ring blanks and the product thereof, and has for its object to provide a ring taper and blank having an integral or one-piece rolled exterior of precious metal, such as gold or silver, which an interior of silver, semi-precious, or base metal, and without the necessity for piecing or joining the same by seaming or soldering with resultant relatively high labor and scrap costs. The invention is especially useful in the manufacture of school, class and fraternal rings wherein it is desired to achieve at moderate cost a ring of excellent appearance and wearing qualities presenting a rolled gold exterior and silver interior and wherein, despite any normal wear, particularly at the inside of the hand, the ring always presents or exposes a gold surface.

In the drawing, which illustrates the preferred practice of the invention—

Fig. 1 represents a solid though composite cylinder or wire blank of two different metals as made ready for the subsequent tapering operation;

Fig. 2 illustrates the taper, partly in cross-section, made from the composite cylinder of Fig. 1;

Fig. 3 shows the taper of Fig. 2 after having been struck in a suitable die and ready for bending into ring form; and

Fig. 4 shows the struck blank of Fig. 3 as having been made into ring form with its ends soldered together in the usual manner.

Referring to the drawing illustrating the preferred practice, the figures of which are somewhat enlarged and in which like numerals represent like parts—

Fig. 1 shows a solid cylindrical member having a one-piece, and preferably seamless, rolled metal exterior layer portion 2 of precious metal, gold for example, rolled on to and firmly or integrally affixed to a central or core portion (preferably solid though it may be tubular) of less expensive metal, for example, silver, the ends of the core which cylinder are preferably filled with solid gold rods or plugs 6 which may be and preferably are soldered therein or the ends may be simply filled in with gold solder. It is contemplated that the exterior layer portion 2 may be either rolled solid gold or rolled gold plate. Following the making of the solid composite cylinder of Fig. 1 the same is tapered by a hammering or other process to the form shown in Fig. 2 and wherein the ends are merely reduced in diameter by a tapering process as well known in the art.

Following the tapering, the product or taper of Fig. 2 is struck in a die, the form, size and shape of which die are predetermined and preferably so related to the size of the taper that the taper when struck in the die completely fills the same without any excess flash or pins so that a substantially flat ring blank presenting an integral one-piece smooth exterior as shown in Fig. 3 is produced with the shoulders 8 and finger band portions 10, the terminal ends of which are solid gold, though, of course, the shoulders may be omitted.

The ring blank of Fig. 3 is then ready to be bent into finished form, as shown in Fig. 4, wherein the shoulders 8 and curved portion therebetween form the base of the ring and the terminal ends of the finger band portions 10 of the flat blank produced from the taper are attached together by some means, for example as by soldering. As will be appreciated from the above, since a substantial portion of the ends of the taper as shown in Fig. 2 present solid gold ends—the same being true of the flat blank of Fig. 3 as just described—with the result that the ring shown in Fig. 4 has for a substantial portion of its length (the finished finger band portion 12 which comes at the inside of the hand) a cross-section wholly of gold so that, as before mentioned, despite any amount of hard localized wear, the ring always exposes at such portion a gold surface. Moreover, since the balance of the ring includes a relatively heavy exterior layer of rolled gold, such exterior layer, because of the lesser wear to which it normally is subjected as compared with the portion 12, provides a durable satisfactory ring product, despite the relatively large amount of cheaper metal contained therein. A further advantage of the ring blanks of this invention is that in utilizing the blanks in the making of the rings to a run of different sizes the pieces cut from the terminals of the finger band portions of the blank are at once usable as gold and need not be sold to a refiner as mixed or low-grade scrap which would be the case if such terminals included a different metal.

Having described my invention what I wish to claim and secure by Letters Patent is:

1. As a new article of manufacture, a composite substantially flat finger ring blank having a one-piece rolled exterior of precious metal upon a core of cheaper metal, and with said cheaper metal terminating short of the ends of said blank, said blank having ends including plugs, said ends being wholly of precious metal.

2. As a new article of manufacture, a composite substantially flat finger ring blank having

a seamless rolled exterior of precious metal upon a core of cheaper metal, and with said cheaper metal terminating short of the ends of said blank, said blank having ends including plugs, said ends being wholly of precious metal.

3. As a new article of manufacture, a composite substantially flat though shouldered finger ring blank having a seamless rolled plate exterior of precious metal upon a core of cheaper metal, and with said cheaper metal terminating short of the ends of said blank, said blank having ends including plugs, said ends being wholly of precious metal.

4. The method of making a composite flat finger ring blank which consists in forming a cylindrical rod having a rolled exterior of precious metal upon a core of cheaper metal extending substantially throughout the length thereof, removing the end portions of the core of said rod, securing a plug of precious metal in the spaces thus made to again provide a solid cylindrical rod, tapering opposite ends of the cylindrical rod as thus formed to provide a composite ring taper with ends wholly of precious metal, and striking from the taper thus formed a substantially flat ring blank.

5. The method of making a composite finger ring blank which consists in forming a rod having an exterior of precious metal upon a core of cheaper metal but with said metals terminating in stepped relation at both ends of said rod, securing to said stepped end portions of said rod core-obscuring, precious metal fittings to provide a solid cylindrical rod, tapering opposite ends of the cylindrical rod as thus formed to provide a composite ring taper with ends wholly of precious metal, and striking from the taper thus formed a flattened ring blank.

6. As a new article of manufacture a composite flattened finger ring blank having an exterior of precious metal upon a core of cheaper metal, and with said cheaper metal terminating short of the ends of said blank, said blank including precious metal fittings obscuring ends of said core, providing blank ends wholly of precious metal.

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