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SAFETY RAZOR AND BLADE ASSEMBLY

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Fig. 1

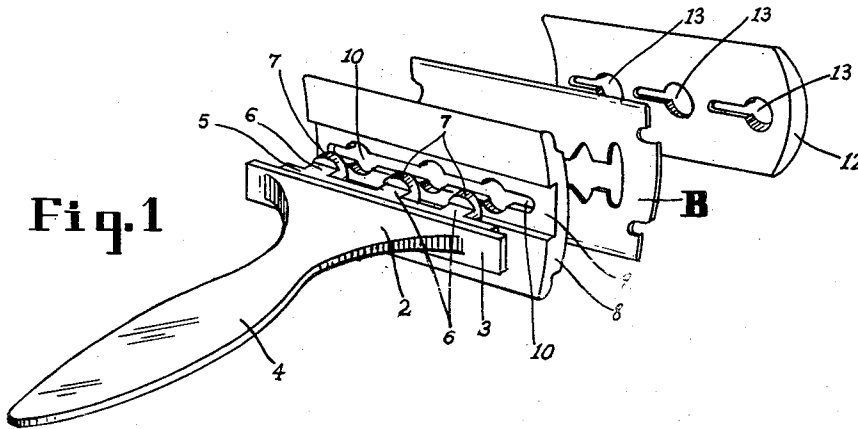


Fig. 2

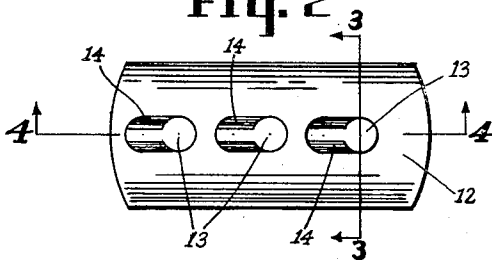


Fig. 4

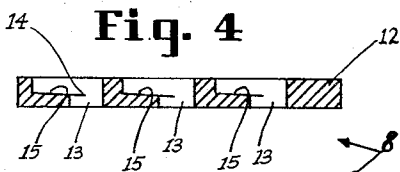


Fig. 3



Fig. 5

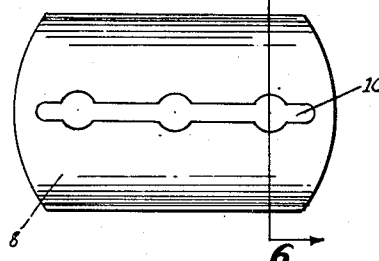


Fig. 6

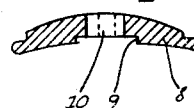


Fig. 7

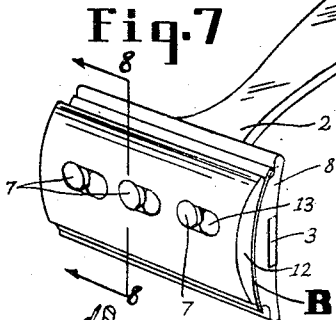
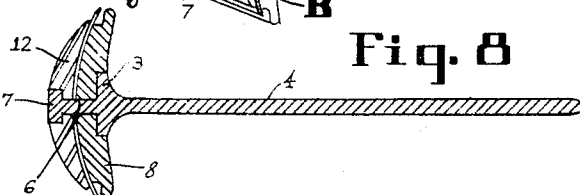


Fig. 8



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SAFETY RAZOR AND BLADE ASSEMBLY

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2 Claims. (Cl. 30—66)

This invention relates to safety razors, and particularly to an improved safety razor of the double edge type.

It is the general object of the present invention to provide a simple and inexpensive safety razor constructed of a minimum number of parts which can be conveniently fabricated.

It is another object of the invention to provide a new and novel safety razor which may be made of a thermoplastic material and which is so designed that it can be easily molded without the use of cores.

It is a further object of this invention to provide an improved safety razor which is light in weight and one which can be easily and quickly assembled and with which a conventional double edge cutting blade may be used.

Various other objects and advantages of this invention will be more apparent in the course of the following specification, and will be particularly pointed out in the appended claims.

In the accompanying drawings, there is shown for the purpose of illustration, an embodiment which my invention may assume in practice.

In these drawings:

Fig. 1 is an exploded perspective view of the safety razor constructed in accordance with the present invention,

Fig. 2 is an elevational view of the outer side of the keeper member,

Fig. 3 is a sectional view taken on line 3—3 of Fig. 2,

Fig. 4 is a sectional view taken on line 4—4 of Fig. 2,

Fig. 5 is an elevational view of the outer side of the guard member,

Fig. 6 is a sectional view taken on line 6—6 of Fig. 5,

Fig. 7 is a perspective view showing the razor completely assembled, and

Fig. 8 is a sectional view taken on line 8—8 of Fig. 7.

Referring more particularly to the drawings, the improved safety razor of the present invention consists of a body portion 2 having a head portion 3 and a handle portion 4. On the outer side of the head portion 3, there is provided a transversely extending tongue-like portion 5 having a plurality of longitudinally extending stud-like portions 6, three in the present instance, extending outwardly therefrom with each being substantially rectangular-shaped in cross section and having cylindrical head portions 7 arranged on the extreme outer end thereof.

There is provided a concave-convex guard member 8 having a recess or groove 9 arranged in the concave surface thereof in which the head portion 3 is disposed. There is also arranged in this guard member 8, a transversely extending elongated slot 10 which co-operates with the transversely extending tongue-like portion 5 of the head 3 to position the guard member on the head portion.

A concave-convex keeper member 12, is provided having a plurality of keyhole shaped slots or apertures 13, three in the present instance, arranged therein which are adapted to co-operate with the enlarged cylindrical por-

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tions 7 of the stud-like portions 6. Each of the keyhole slots 13 is recessed at the outer convex surface of the keeper member so as to provide an elliptical-shaped recess, as at 14. The inner wall of each of the recesses 14 is preferably tapered, as at 15, for a purpose hereinafter to be described.

All of the parts of the razor above described, namely, the body member 2, the guard member 8 and the keeper member 12 are preferably made by injection molding and can be made from any suitable thermoplastic material such as, for example, polyethylene.

In assembling the razor, it will be understood that the guard member 8 is positioned on the head portion 3 so that the head portion is positioned in the groove 9 with the transversely extending tongue-like portion 5 carried thereby positioned in the slot 10 arranged in the guard member so that the stud-like portions 6 extend outwardly through slot 10 in the guard member. A conventional metallic razor or cutting blade B is then positioned on the guard member 8 with the stud-like portions 6 extending through the apertures therein. The keeper member 12 is then positioned on the razor blade with the head-like portions 7 of the stud-like portions 6 extending into the apertures 13 therein. The keeper member is then moved laterally so as to move the tapered surfaces 15 in each of the elliptical-shaped recesses 14 in under the shoulders of the cylindrical portions 7 thereby securely locking the razor blade between the guard member and the keeper member on the head portion. In other words, a bayonet locking arrangement is provided for securing the keeper member in position on the head portion and the parts in assembled relation. The razor is now in readiness for use.

As a result of my invention, it will be seen that there is provided a razor consisting of a minimum number of parts, each of which is so designed that they can be conveniently molded. It will also be seen that the parts are so constructed and arranged that they can be easily and quickly assembled and disassembled with the least amount of effort. Also, the parts of the razor are so designed that the cutting blade is securely held in position at all times so as to eliminate any danger of cutting the skin when properly used.

While I have shown and described an embodiment which my invention may assume in practice, it will be understood that this embodiment is merely for the purpose of illustration and description, and that other forms may be devised within the scope of my invention as defined in the appended claims.

What I claim as my invention is:

1. A safety razor comprising a body member having a head portion and a handle portion, a guard member arranged on said head portion, a plurality of outwardly and longitudinally extending stud-like portions carried by said head portion, each of said stud-like portions having an enlarged head portion arranged on the outer end thereof, a keeper member co-acting with said guard member to confine a cutting blade therebetween, said keeper member having a plurality of keyhole-shaped apertures arranged therein corresponding in number to the number of stud-like portions with which they co-operate, said keeper member having an elliptical-shaped recess arranged in the outer side thereof circumventing each of said apertures so as to provide a shoulder in each of said recesses, said enlarged head portions of said stud-like members adapted to be seated in said elliptical-shaped recesses against the shoulders therein when the razor is assembled so as to hold the guard member, the cutting blade and the keeper member together in a fixed position on said head portion.

2. A safety razor comprising a body member having a head portion and a handle portion, an elongated tongue-

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like portion carried by said head portion, a plurality of outwardly and longitudinally extending stud-like portions carried by said head portion and extending outwardly from said tongue-like portion, a guard member having an elongated slot therein in which said tongue-like portion is positioned so as to key the two members together with the stud-like portions extending outwardly through said slot, each of said stud-like portions having an enlarged head portion arranged on the outer end thereof, a keeper member co-acting with said guard member to confine a cutting blade therebetween, said keeper member having a plurality of keyhole-shaped apertures arranged therein corresponding in number to the number of stud-like portions with which they co-operate, each of said apertures having an elliptical-shaped recess arranged circumferentially therearound in the outer side of

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said keeper member so as to provide a shoulder therein, said enlarged head portions of said stud members adapted to be seated in said elliptical-shaped recesses against the shoulders therein when the razor is assembled so as to hold the guard member, the cutting blade, and the keeper member together in a fixed position on said head portion.

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