

Aug. 18, 1942.

J. MUROS

2,293,401

PROTECTED BLADE

Filed Oct. 5, 1939

2 Sheets-Sheet 1

Fig. 1

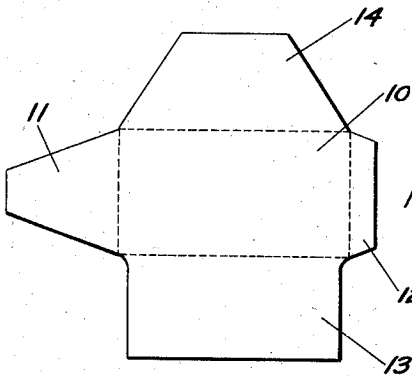


Fig. 2

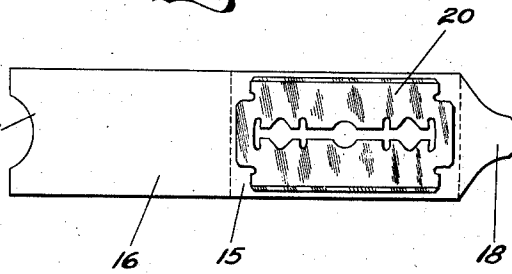


Fig. 3

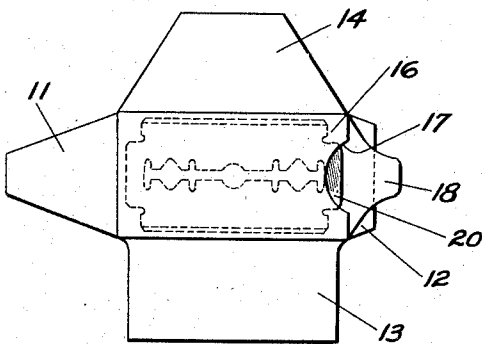


Fig. 4

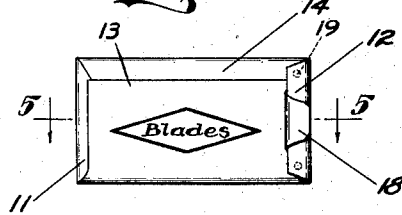


Fig. 6

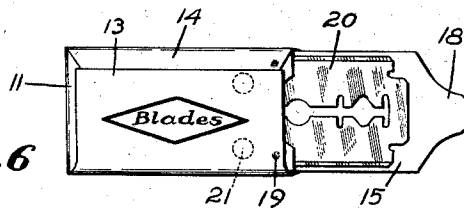
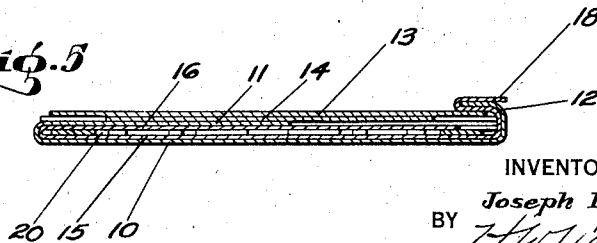


Fig. 5



INVENTOR

Joseph Muros

BY

H. W. Fenway,
ATTORNEY

Aug. 18, 1942.

J. MUROS

2,293,401

PROTECTED BLADE

Filed Oct. 5, 1939

2 Sheets-Sheet 2

Fig. 7

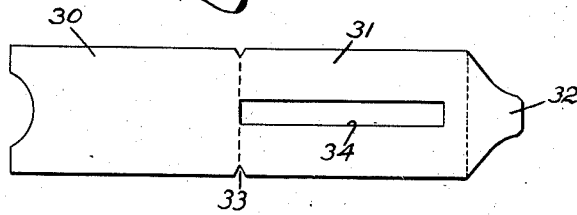


Fig. 8

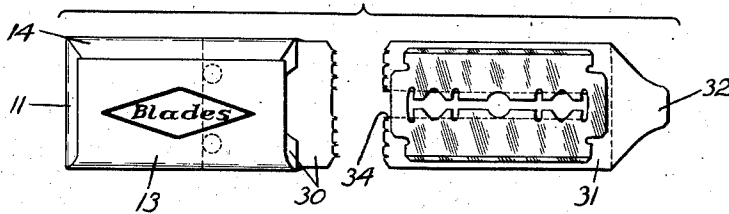
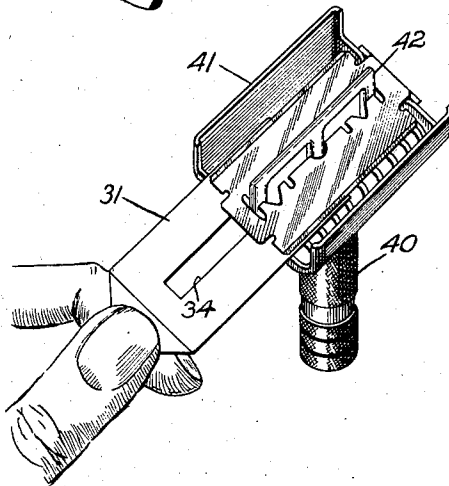


Fig. 9



INVENTOR
Joseph Muros
BY *M. J. Newway*
ATTORNEY

UNITED STATES PATENT OFFICE

2,293,401

PROTECTED BLADE

Joseph Muros, Cambridge, Mass., assignor to Gillette Safety Razor Company, Boston, Mass., a corporation of Delaware

Application October 5, 1939, Serial No. 298,068

5 Claims. (Cl. 206—46)

This invention relates to the packaging of fine edged blades, such for example as safety razor blades. It consists in a novel wrapping by which the user is enabled to withdraw in one motion a single blade from a sealed envelope wherein the blade has been fully protected from moisture and from damage to its keen shaving edge.

Blade manufacturers desire to dispense safety razor blades in printed or lithographed envelopes having an attractive appearance and artistic appeal to the purchaser. Practical considerations render it necessary in many cases to protect the blade from moisture by completely or partially enclosing it in a waterproof wrapping, and to protect the keen edge of the blade by holding it definitely out of contact with the folds of its envelope and wrapper. Accordingly, it is the practice to attach the blade temporarily to a flat portion of its wrapping by spots of adhesive or by an interlocking configuration. All these expedients have been successively used in the past but at some sacrifice to the convenience of the user in that it is sometimes inconvenient to open the sealed blade-enclosing envelope, more especially to find a starting place for opening the envelope so that the blade may be withdrawn conveniently and without danger to the user or damage to the blade edge from contact with its wrapping.

In one aspect the present invention consists in a sealed envelope containing a safety razor blade and presenting an easily located tab or tongue, the assembled unit being so organized that by merely pulling the tab the seal of the outer envelope may be broken and the blade withdrawn therefrom with its sharp edge guarded against injury from contact with the outer envelope.

In its preferred form a characteristic of my invention consists in a blade envelope combined with a sheet wrapper in such a manner that one flap of the envelope and one flap of the wrapper are folded simultaneously into contact with a previously folded part of the envelope. In this way, a tongue of the wrapper may be arranged to project freely out from under a sealed flap of the envelope and all the steps of wrapping and sealing may be carried out at a high rate of speed in automatic machinery.

An important feature of my invention consists in so relating the inner wrapper and outer envelope that when the blade is withdrawn from the envelope the covering portion of the wrapper is stripped from it and the blade is presented in a fully exposed but edge-guarded condition.

Still another feature of my invention consists

in the combination envelope and inner wrapper so related and of such construction that the exposed blade may be presented by the user directly to the razor without requiring him to touch the blade itself in the procedure. As herein shown both of the foregoing objects are attained by the slotting of the underlying portion of the wrapper for the reception of the blade-locating projections of the razor and attaching the cover portion of the wrapper to the inside of the envelope. Accordingly, when the wrapped blade is withdrawn, the cover portion of the wrapper is stripped from the blade because it is held within the envelope and is finally torn off leaving the blade lightly attached to the slotted underlying portion of the wrapper. This may be then conveniently used as a conveying medium for transferring the blade into position upon the safety razor and locating it upon the blade positioning projection thereof. Finally this part of the wrapper is withdrawn edgewise out of the razor from beneath the blade.

In my co-pending application, Serial Number 277,036, filed June 2, 1939, I have disclosed a protected blade enclosed in a wrapper and an envelope which is sealed so that the blade is released by widthwise movement and stated therein that it would be within the scope of my invention so to design the envelope and wrapper as to release the blade by endwise movement. In one aspect, the present invention comprises a construction of wrapper and envelope so designed that the blade is released by endwise movement.

This characteristic and other features of my invention will be best understood and appreciated from the following description of a preferred embodiment thereof, selected for purposes of illustration and shown in the accompanying drawings, in which:

Fig. 1 is a plan view of a blank for a blade envelope;

Fig. 2 is a plan view showing a wrapper blank with a blade positioned thereon;

Fig. 3 is a view similar to Fig. 1 showing a wrapped blade in position to be enclosed therein;

Fig. 4 is a plan view of the complete protected blade package employing the blanks of Figs. 1 and 2;

Fig. 5 is a sectional view on an enlarged scale on the line 5—5 of Fig. 4.

Fig. 6 is a plan view showing a blade partially withdrawn from its package;

Fig. 7 is a plan view of a wrapper blank of alternative shape;

Fig. 8 is a plan view showing a blade fully withdrawn from its envelope; and

Fig. 9 is a view in perspective illustrating the step of placing the protected blade in a safety razor.

The blade envelope shown in Fig. 1 is designed to exhibit the printed insignia of the manufacturer upon its outer surfaces and comprises a rectangular body portion 10 having a long tapering flap 11 at one end, short or narrow flap 12 at the other end and tapering rectangular back flap 13 and front flap 14. Such a blank may be died out from paper stock and scored in a single operation as indicated by the dotted lines. In preparing such a blank for automatic wrapping machinery it is sometimes desirable to provide the inner face of the end flap 12 with spots of adhesive which are effective in the final wrapping step to seal the envelope.

In Fig. 2 is shown a wrapper blank of oiled or waxed paper with a blade positioned thereon. The blank comprises a rectangular body portion 15 scored transversely to define the fold line of its two leaves and of these the cover portion 16 is provided in its free end with a concave recess 17. The body portion 15 is provided at its free end with a tapering tongue 18 which extends substantially beyond the end of the blade 20.

The blade selected for illustration is of a well-known commercial type, sharpened on both longitudinal edges and having reentrant corner recesses which define elongated unsharpened end portions in the blade. The blade 20 is placed upon the body 15 of the wrapper and held thereon by adhesive spots with its sharpened edges definitely located within the longitudinal edges of the wrapper and one unsharpened end edge located in proximity to the fold line of the wrapper.

In Fig. 3 the wrapped blade is shown as located upon the envelope blank of Fig. 1 in position to be enclosed therein, that is to say, with the folded wrapper coinciding substantially with and superposed upon the body 10 of the envelope. In this position, it will be noted that the tongue 18 of the wrapper projects beyond the contour of the envelope blank over the short flap 12. In the wrapping operation the end tab or tongue 11 of the envelope is first folded inwardly upon the cover portion 16 of the wrapper. The back flap 14 is then folded inwardly and secured to the cover leaf 16 of the wrapper by adhesive spots and next the front flap 13 is folded over the flap 14 and secured thereto by one or more spots of adhesive. Afterwards the short end flap 12 is folded inwardly together with the tongue 18 of the wrapper and the flap 12 is sealed at its ends to the body of the package thus formed by adhesive spots 19.

It will be noted then in closing the envelope in the manner above outlined the short flap 12 is separated from the body of the package throughout an intermediate portion of its length by the tongue 18 and that the adhesive spots 19 are located beyond the edges of this tongue. The tongue 18 may be left flat upon the face of the folded flap 13 or it may be folded outwardly around the inner edge of the flap 12 as a vertex. The sealing of the short flap 12 in this manner completely seals the protected blade package.

Whatever may be the final position of the tongue 18 it remains conspicuous in the package and easy of location by the user even without close inspection. Accordingly, when he desires to remove the blade for use all that is required

is that he grasp and pull the tongue 18 endwise, or toward the right as seen in Figs. 4 and 5, whereupon the adhesive spots holding the short flap 12 will be broken permitting the flap to be turned back into its flat position as in Fig. 3.

Further pulling upon the tongue 18 is effective to withdraw the blade endwise upon the body portion 15 of its wrapper from the envelope. The cover or upper leaf of the wrapper is held back in place during this movement by its connection with the envelope and the sharp edges of the blade are guarded meanwhile by the single thickness of the wrapper projecting beyond them. When the wrapped blade has been wholly removed from the envelope the wrapper has been unfolded and its cover portion 16 has been entirely stripped from the blade which now lies fully exposed in convenient position for the user to lift it from the underlying leaf of its wrapper.

Figs. 7, 8 and 9 illustrate my invention as embodied in a wrapper and envelope from which the blade may be withdrawn for presentation to the safety razor without requiring the user to touch the blade. In this embodiment of the invention the wrapper blank of oiled or waxed paper comprises a rectangular body scored transversely to define the two leaves 30 and 31. The blank is edge-notched at 33 and scored defining an overlying leaf 30 provided with a concave recess in its free end, and an underlying leaf 31 provided with a projecting tongue 32 at its free end and with a longitudinal slot 34 which intersects the fold line of the wrapper blank and is of sufficient width to accommodate the blade locating projections of a safety razor. In enclosing a blade in the wrapper of Fig. 7 the blade is placed upon the underlying leaf 31, with its slot in registration with the slot 34, and caused to adhere thereto by wax or oil spots and the overlying leaf 30 is then folded over upon the upper face of the blade. The blade wrapped in this manner is then enclosed in an outer envelope as explained in connection with Fig. 3, the overlying leaf 30 of the wrapper being secured by spots of adhesive to the inner surface of the envelope and the tongue 32 projecting from the envelope beneath the short flap 12.

In withdrawing the wrapped blade of Fig. 8 from the envelope the tongue 32 is grasped by the user and pulled toward the right drawing the underlying leaf 31 with the blade lightly attached thereto out from the end of the envelope while the overlying leaf 30 is doubled under and stripped from the upper face of the blade on account of its connection with the inside of the envelope. When further movement of the overlying leaf 30 is arrested by the cemented spots, the wrapper is torn apart at its scored line thus opening the rear or left-hand end of the slot 34 but leaving the blade 20 undisturbed on the underlying leaf in registration with this slot.

The underlying leaf may now be utilized as a conveying medium in placing the blade 20 in position in a safety razor 40 as suggested in Fig. 9. In this operation the slot in the leaf 31 and the slot in the blade are registered with the blade-locating rib 42 of the safety razor, while the razor is held with its cap sections 41 in open position. Having thus located the blade, with its sharp edges continuously guarded by the single thickness of the underlying leaf 31, the user has only to draw the leaf 31 toward the right slipping it from beneath the blade out of the razor, leaving

the blade in position to be clamped for shaving in the razor.

It will be appreciated from the foregoing description that my invention has three distinct aspects and that these may be cooperatively employed as herein shown or utilized severally. There is the sealed, end-exit blade package, the blade-stripping package, and the package providing an underlying conveying medium for placing the blade in a safety razor. All these aspects of the invention are represented in the disclosure of Fig. 3 and only the first in the disclosure of Fig. 4.

Having thus disclosed my invention and described certain specific embodiments thereof, I claim as new and desire to secure by Letters Patent:

1. A protected blade having an inner wrapper folded into leaves enclosing the blade and a projecting tongue on one leaf only, and an outer envelope including overlapping parts and in which the blade and its wrapper are enclosed, the tongue of the wrapper being brought out under an overlapping part of the envelope and one leaf of the wrapper being attached to the inside of the envelope whereby it is stripped longitudinally from the blade when the blade is withdrawn from the envelope by said tongue lying bare upon the other leaf of the wrapper.

2. A protected blade having an inner wrapper with leaves enclosing the blade and a projecting tongue on one leaf only, and an outer envelope having a long end flap, side flaps overlapping said long end flap, and a short end flap overlapping the folded side flaps of the envelope, the other leaf of the wrapper being secured to the inside

of the envelope and the tongue of the wrapper being brought out underneath the short end flap of the envelope.

3. A protected blade having an inner wrapper folded with leaves on both sides of the blade and provided with a projecting tongue on one leaf only, and an outer envelope having a flap folded with said tongue, the tongue-carrying leaf of the inner wrapper being slotted to accommodate the blade-locating projections of a safety razor and the other leaf being secured within the envelope, whereby that leaf is stripped from the blade when the blade is withdrawn from the envelope.

4. A protected blade having an inner wrapper folded about a part of the blade, attached to one face of the blade and overlapping both its longitudinal edges, a tongue projecting from one folded part only of said inner wrapper, and an outer envelope having side and end flaps and enclosing the blade and its wrapper, the tongue of the wrapper being brought out under one of the end flaps of the envelope between sealed points therein.

5. A protected blade having an inner wrapper folded about one end of the blade, attached to the blade and overlapping both of its longitudinal edges, a tongue projecting from one folded part only of said inner wrapper, and an outer envelope having an end flap covered by two side flaps of the envelope and another end flap sealed at its end to the side flaps of the envelope and overlapping the same, the tongue of the wrapper being folded about both flat faces of said overlapping end flap.

JOSEPH MUROS.