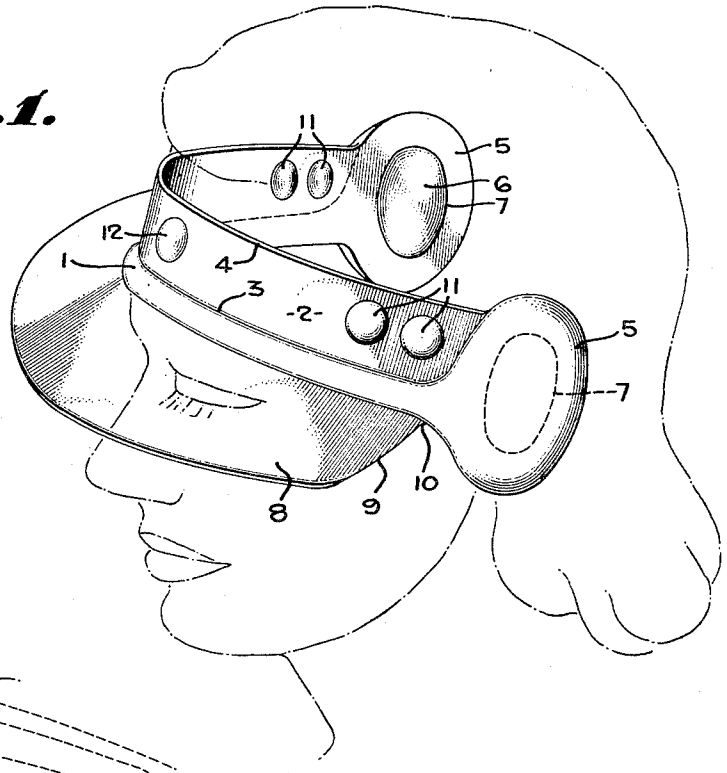
Dec. 7, 1954 R. H. PENMAN ET AL 2,696,008

EYE PROTECTOR

Filed Oct. 18, 1948

Fig. 1.



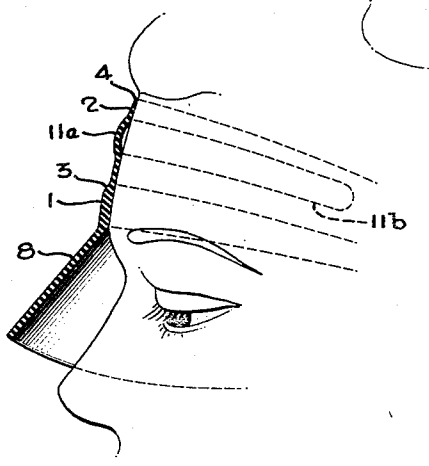
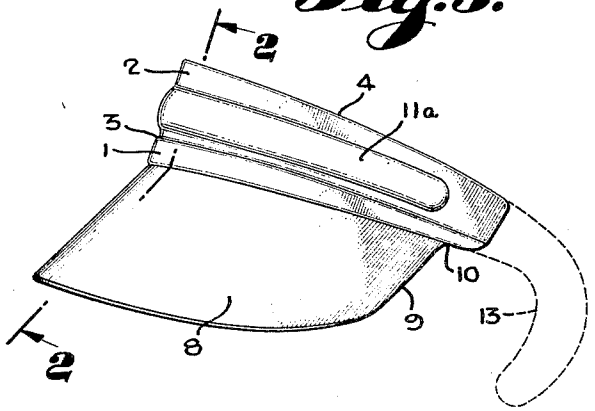


Fig. 2.

Fig. 3.



INVENTORS
ROBERTA H. PENMAN
ROBERT B. PENMAN
BY Francis D. Cannon
ATTORNEY

United States Patent Office 2,696,008 Patented Dec. 7, 1954

2,696,008

EYE PROTECTOR

Roberta H. Penman and Robert B. Penman, Los Angeles, Calif.

Application October 18, 1948, Serial No. 55,108

1 Claim. (Cl. 2—174)

This invention relates to an eye protector to be worn by a person who is having her hair shampooed.

An object of the invention is to provide an eye protector including an arcuate body adapted to be applied to the forehead, and provided with special means for preventing soapy water from passing down between its upper edge and the surface of the forehead, and thence into the wearer's eyes. We are aware that eye protectors constructed with an arcuate body to be applied to the forehead, have been used heretofore, but in practice they are generally ineffective to prevent soapy water from passing down at all points along the contact line on the forehead, although they do provide visors projecting out from the forehead to deflect some of the soapy water from passing directly into one's eyes.

One of the objects of this invention is to construct the eye protector in such a way that at its upper edge it will press itself tightly against the forehead without giving discomfort, but so that any soapy water coming in contact with it will be excluded, and caused to flow down onto the visor, or be directed over to the side.

Another object of the invention is to provide means incorporated in the body of the eye protector, which will cause it to hold itself forcibly to the wearer's forehead and temples. To this end, one of the features of our improvement involves the use of pneumatic means, including compressible pockets or "cups" located in such a way that they will co-operate in supporting the eye protector at the front of the forehead, and will also co-operate with extensions that may be employed to anchor the ends of the eye protector on the wearer's ears.

Further objects of the invention will appear hereinafter.

The invention consists in the novel parts and combinations of parts to be described hereinafter, all of which contribute to produce an efficient eye protector for use in shampooing.

A preferred embodiment of the invention is described in the following specification, while the broad scope of the invention is pointed out in the appended claims.

In the drawings:

Fig. 1 is a perspective of an eye protector constructed in accordance with our invention, and in this view the outline of a head is included, illustrating how the eye protector is applied in practice.

Fig. 2 is a vertical section taken through the eye protector in a medial front and rear plane, that is to say, at the most forward point of the forehead. This view illustrates a different form of vacuum cup from that illustrated in Fig. 1.

Fig. 3 is a side elevation of the eye protector embodying our invention, further illustrating a modification of the body of the eye protector shown in Fig. 2. In this model of the eye protector its ends may also be provided with hooks to be set back of one's ears.

In the model of the eye protector illustrated in Fig. 1, it comprises an arcuate body **1** preferably formed of some suitable material such as soft plastic, rubber, or other suitable material of a sufficient elastic nature, which will be pliable and slightly extensible under the action of a tensile force. The upper edge portion or girt **2** of the protector (see Figure 2), is composed of an extensible and somewhat elastic material. The lower edge of this girt merges into the body **1** of the protector along a line or zone **3**. In order to enable the upper edge **4** of the eye protector to conform closely to the surface of the wearer's forehead and cling to the same with an intimate

contact, the girt **2** of the eye protector is preferably relatively thinner than its body **1**. By making the body **1** relatively thick, its extensibility will be relatively lower than that of the upper edge of the girt **2**, which is most desirable. In practice, however, if desired the girt **2** may be made of a slightly different character of material more elastic than the body **1**, and along the line or zone **3** these two parts may be vulcanized together.

In the model illustrated in Fig. 1, the ends of the body **1** are illustrated as enlarged vertically and extended in a horizontal direction so as to form two lobes **5** which have substantially flat inner faces at which openings or cup-shaped pockets **6** are formed respectively, which are adapted to fit over the wearer's ears. When the eye protector is applied to the head, the rear edges or lips **7** of these "cups" or pockets will engage the wearer's ears at their rear side. When so applied, the length of the curved girt **2** should be short enough so that its upper edge **4** will be placed under tension. This tension should be sufficient to hold this edge closely against the forehead and temples, so that any soapy water reaching this edge, will pass down over the outer side of the edge and be shed down away from the eyes by the visor **8** which projects downwardly and outwardly from the lower edge of the body **1** of the protector. This visor is of substantially crescent form, and is of sufficient thickness to enable it to maintain this general form. At the ends of the visor its outer peripheral edge **9** inclines upwardly and merges as at **10** into the lower edge of the body **1** of the protector where it merges into the ear-lobe **5**.

In order to maintain tension in the upper edge **4** of the girt **2**, we prefer to provide two pairs of vacuum cups **11** formed integrally in the material of the girt **2** as indicated in Figure 1, and located near the ends of the girt and adjacent to the lobes **5**. The edges of the cups **11** are substantially in the plane of the inner face of the girt **2**. When applying the protector to the head after nesting the wearer's ears in the ear-lobes **5**, the outer and convex faces of the vacuum cups **11** should be pressed inwardly so as to expel the air from them and enable the material that forms the bodies of these cups to assume a position lying substantially against the surface of the forehead. Then when the manual pressure on them ceases, the atmospheric pressure on their outer sides will hold this portion of the eye protector firmly in place.

While vacuum cups at the ends of the bandeau, may be sufficient to enable the protector to operate effectively if it is of the proper size to fit the wearer's head, in practice and in order to enable protectors of a considerable range in length to be used on the same head, we prefer to provide the girt **2** with a vacuum cup **12** at another location which is preferably at about the middle of the length of the girt. This vacuum cup **12** should be pressed inwardly after the bandeau has been applied, and adjusted to the height desired, by pressing in on the outer face of the vacuum cup **12**, thereby deflating it so that the unbalance of the atmospheric pressure on its outer side, will press the eye protector at this point firmly against the forehead.

Of course the ear-lobes **5** perform the additional function of keeping soapy water out of the wearer's ears, but we do not claim any novelty in the use of ear-lobes per se on an eye protector to perform that function, but only as an anchorage on the ear to assist in developing tension in the girt.

In the model of the device illustrated in Fig. 3, instead of providing a plurality of vacuum cups such as the cups **11** illustrated in Fig. 1, we may provide a vacuum cup **11***a* which is in the form of a channel. If desired, there may be a single one of these vacuum cups that extends throughout substantially the entire length of the eye protector. This is indicated in the dotted lines **11***b* in Fig. 2. Or, if desired, instead of having a single channel-form cup of this kind, we may provide two such channel-form cups **1** located on each side of the eye protector and extending up to a point near the middle of the eye protector at the front. As in the embodiment shown in Figure 1 this vacuum channel is molded in the material of the girt **2** with its edge substantially in the plane of the inner face of the girt. Also, if desired, each end of the eye protector may be provided with a hook-shaped ex-

tension 13 indicated in dotted lines in Fig. 3, to be hooked around the wearer's ears.

In applying this bandeau to the forehead and temples, of course it is necessary to press with one's hands on the entire length of the channel-form cup or cups, to expel substantially all the air from them in order to insure that they will operate effectively to cause the bandeau to cling forcibly to the forehead and temples.

Many other embodiments of the invention may be resorted to without departing from the spirit of the invention.

We claim as our invention:

An eye protector for use when shampooing one's hair, comprising an arcuate body with a girt extending along its upper edge portion, and a visor extending outwardly and downwardly from the lower edge of said body, the said girt being relatively elastic and constructed so as to fit closely to the forehead for preventing water from passing down the forehead and under the eye protector when the same has been applied and pressed against the wearer's forehead, the said girt having longitudinally spaced apart vacuum cup means formed integrally in the material of the girt and located below the upper edge of the girt, said cup means having their concave depressions disposed forwardly from the inner face of the said girt and functioning when pressed forcibly inwardly against the forehead, to secure the eye protector to the forehead by suction effect, to maintain the upper edge of said girt in water tight engagement with the forehead.

References Cited in the file of this patent

UNITED STATES PATENTS

Number	Name	Date
1,563,746	Hirsch et al.	Dec. 1, 1925
1,566,891	Lyon	Dec. 22, 1925
1,722,120	Wickland	July 23, 1929
1,741,327	Merlino	Dec. 31, 1929
2,060,553	Burleigh	Nov. 10, 1936
2,131,344	Crowley	Sept. 27, 1938
2,162,608	Davis	June 13, 1939
2,424,352	Conjurske	July 24, 1947
2,505,359	Hurt	Apr. 25, 1950