Nov. 20, 1928.

1,692,543

J. H. BOURGON

BODY CONSTRUCTION

Filed July 2, 1926

FIG. 1

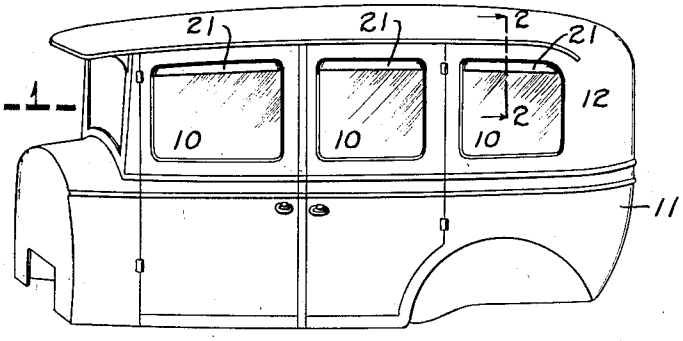


FIG. 2

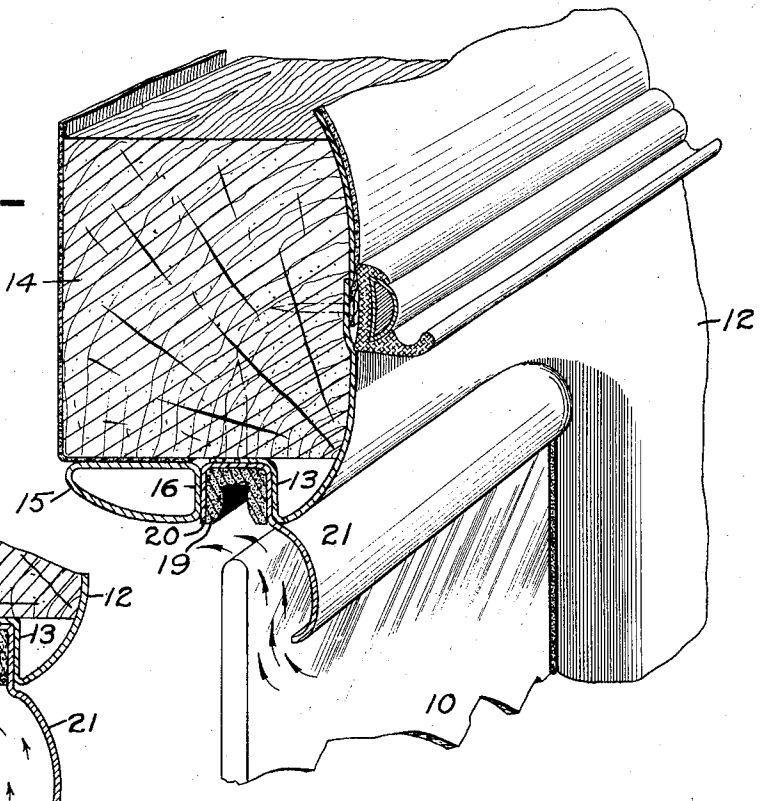
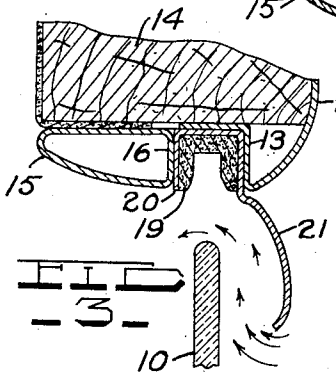


FIG. 3



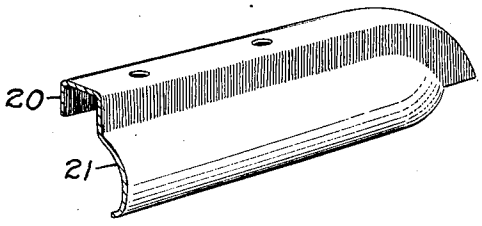


FIG. 4

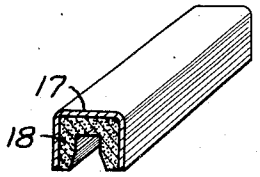


FIG. 5

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BODY CONSTRUCTION.

Application filed July 2, 1926. Serial No. 120,118.

This invention relates to vehicle bodies and particularly to window constructions of the type wherein the window is vertically adjustable in its frame for the purpose of ventilation.

The principal object of the present invention is to provide a window construction in which means is provided for allowing the window to be lowered a limited amount for the purpose of ventilation without permitting a direct current of air to enter the body, and for preventing the entrance of rain through the opening made by lowering the window.

Another object is to provide a window construction of the class described, in which a depending lip or shield is provided at the upper edge of the window, and spaced therefrom on the outer side thereof.

A further object is to provide a window construction of the class described, in which the window-guiding channel is provided with an integral outwardly and downwardly extending lip or flange for permitting the window to be lowered a limited amount for ventilation without liability of rain being carried through the opening thus made.

The above being among the objects of the present invention, the same consists of certain features of construction and combinations of parts to be hereinafter described with reference to the accompanying drawing, and then claimed, having the above and other objects in view.

In the accompanying drawing which illustrates a suitable embodiment of the present invention, and in which like numerals refer to like parts throughout the several different views,

Figure 1 is a perspective view of a body for a motor vehicle in which the present invention is embodied.

Figure 2 is a broken perspective view taken substantially on the line 2—2 of Figure 1.

Figure 3 is a sectional view taken on the line 2—2 of Figure 1.

Figure 4 is a broken perspective view of the metallic casing portion of the window-guiding channel illustrated in the previous views, showing its general shape and contour.

Figure 5 is a broken perspective view of the complete window-guiding channel member used on the sides of the window frame and heretofore commonly used at the top of the window frame.

Window constructions, as commonly made, are such that upon lowering the window an amount sufficient to provide a break between it and its upper guiding channel, a direct current of air may pass such break or opening, and, in case it is raining, considerable rain may be carried therethrough. Various forms of deflectors have been proposed in the past for allowing the window to be opened a limited amount without permitting a direct current of air, or rain, to enter the opening, and some of these forms have had more or less commercial success. However, these forms have either been too expensive for wide use, or else their appearance has been an obstacle to their adoption.

In the present invention a form of construction has been provided that not only is relatively economical to manufacture, but is sufficiently presentable in appearance to be acceptable in such places as on the highest grade of motor vehicle body constructions. The method I use for providing this construction is to employ an upper window guide of metal construction and extend the outer edge thereof outwardly and downwardly in spaced relation to the window to form the deflector in question.

Referring to the drawings to more clearly illustrate the construction which is shown in connection with the body of a motor vehicle of the closed type, in Figure 1 is shown the relative position of the invention in respect to the windows 10 of a motor vehicle body 11. In such bodies, the metal panels or sheathing 12 of the doors and body are punched out to form the window openings or frames and the metal surrounding such openings is turned inwardly a slight distance and then away from the opening and parallel to the panel to form an abutment such as 13, the margin of the metal being again turned inwardly and secured to a frame member such as 14. A garnish moulding such as 15 is also secured to the member 14 in spaced relation to the abutment 13, and one face 16 thereof provides a second abutment opposing and spaced from the abutment 13, thereby forming a recess between the two abutments. A similar recess extends down the sides of

the windows, and the construction at the bottom of the window is similar except that the recess there has no bottom and, in effect, presents a slot leading into the lower portion or well of the door to allow the window to be lowered or raised therethrough. Within the recess thus formed in the sides and top of the window opening a window-guiding channel is secured. In cases where the window itself is unframed, as in the construction shown, the window guiding channel is preferably made as shown in Figure 5, comprising a relatively thin walled channel member 17, which received within its walls a similarly shaped and disposed channel member 18 composed of felt or similar resilient or soft material. The member 18 is cemented or otherwise secured within the member 17, which thus holds it in shape and prevents displacement or distortion of the same. In cases where the window is framed, the felt member 18 may be dispensed with and the window frame allowed to seat directly within the member 17.

Heretofore such window-guiding channels have been employed for both the sides and the top of the window opening, the edges of the window glass 10 being received within the channel of the member 18 and being guided thereby in its raising or lowering movements, the upper edge of the window being received by the upper channel when the window is fully closed so as to effect a sealing connection at that point. In such cases, as soon as the window 10 is lowered below the upper window-guiding channel, a direct opening into the interior of the vehicle is uncovered through which rain may enter the body.

The present invention overcomes this difficulty in a simple and economical manner, as previously described, by providing a window-guiding channel at the upper edge of the window opening substantially the same as that composed of the members 17 and 18 previously described, the felt channel 19 being identical with the channel member 18 and the channel portion 20 of the outer channel member being substantially the same as the channel member 17. The outer edge of the channel 20 is extended to form a deflector 21 which extends outwardly and downwardly therefrom a sufficient amount to form a substantial deflector spaced outwardly from the plane of the window glass 10, the margin of the deflector being preferably bent back toward the window a slight amount for the sake of appearance. As shown in Figure 4, the ends of the channel 20 and deflector 21 may be rounded to fit the corners of the window opening and glass where such opening and glass are correspondingly rounded, thereby to give a more finished and more pleasing appearance to the construction.

The operation of the device is apparent. When the window 10 is in full raised position with its upper edge received within the felt channel 19, no air can enter the body through the window opening. When the window 10 is lowered an amount corresponding to that shown in Figures 2 and 3 of the drawing, or to a point where its upper edge is still above the lower edge of deflector 21, air may pass under the lower edge of the deflector 21 and into the body 11 over the top of the window 10. Should the air be laden with rain, the upward turn of the air under the lower edge of the deflector 21, when entering the body 11, will precipitate the rain therefrom, and the air thus entering the body will be free of the same.

It will be seen from the foregoing that the construction provided offers a very economical construction to manufacture and one that is effective in operation. The cost of providing the same on constructions using such standard window guide constructions as described is almost negligible. In addition, it requires no additional means for securing it in place or requires no more joints than the ordinary form of guides described. It also may be used on windows in doors as well as in other places, and in constructions employing channel window guides of the conventional types the upper guide thereof may be readily replaced by one of the type herein described and claimed so as to form an excellent service proposition.

Formal changes may be made in the specific embodiment of the invention described without departing from the spirit or substance of the broad invention, the scope of which is commensurate with the appended claims.

What I claim is:

1. In combination with a window and a window frame having a longitudinally disposed recess therein, a pliable channel member for receiving the upper edge of said window, and a metallic channel member supporting said pliable member fitting within said recess and secured to said window frame, said metallic member having an imperforate deflector portion curved outwardly and then inwardly positioned in spaced relation to the plane of said window.

2. In combination with a window frame having a longitudinally disposed recess therein and a window vertically movable therein, a pliable channel member for receiving the upper edge of said window, and an inverted trough-shaped member fitting within said recess at the upper edge of said frame supporting said pliable member therein, said trough-shaped member having an imperforate depending portion at the outer edge thereof positioned in spaced relation to the plane of said window.

3. In combination with a window frame and a window vertically movable therein, said frame having a longitudinally disposed recess

therein, a felt channel-shaped member for receiving the upper edge of said window, and a metallic channel member supporting said felt member secured to said window frame within said recess, said metallic member having an imperforate depending portion at the outer edge thereof curved outwardly and then inwardly at its lower edge in spaced relation to said window to permit air to pass below said depending portion and above said window when said window is lowered.

Signed by me at Detroit, Michigan, U. S. A., this 29th day of June 1926.

JOSEPH H. BOURGON.