

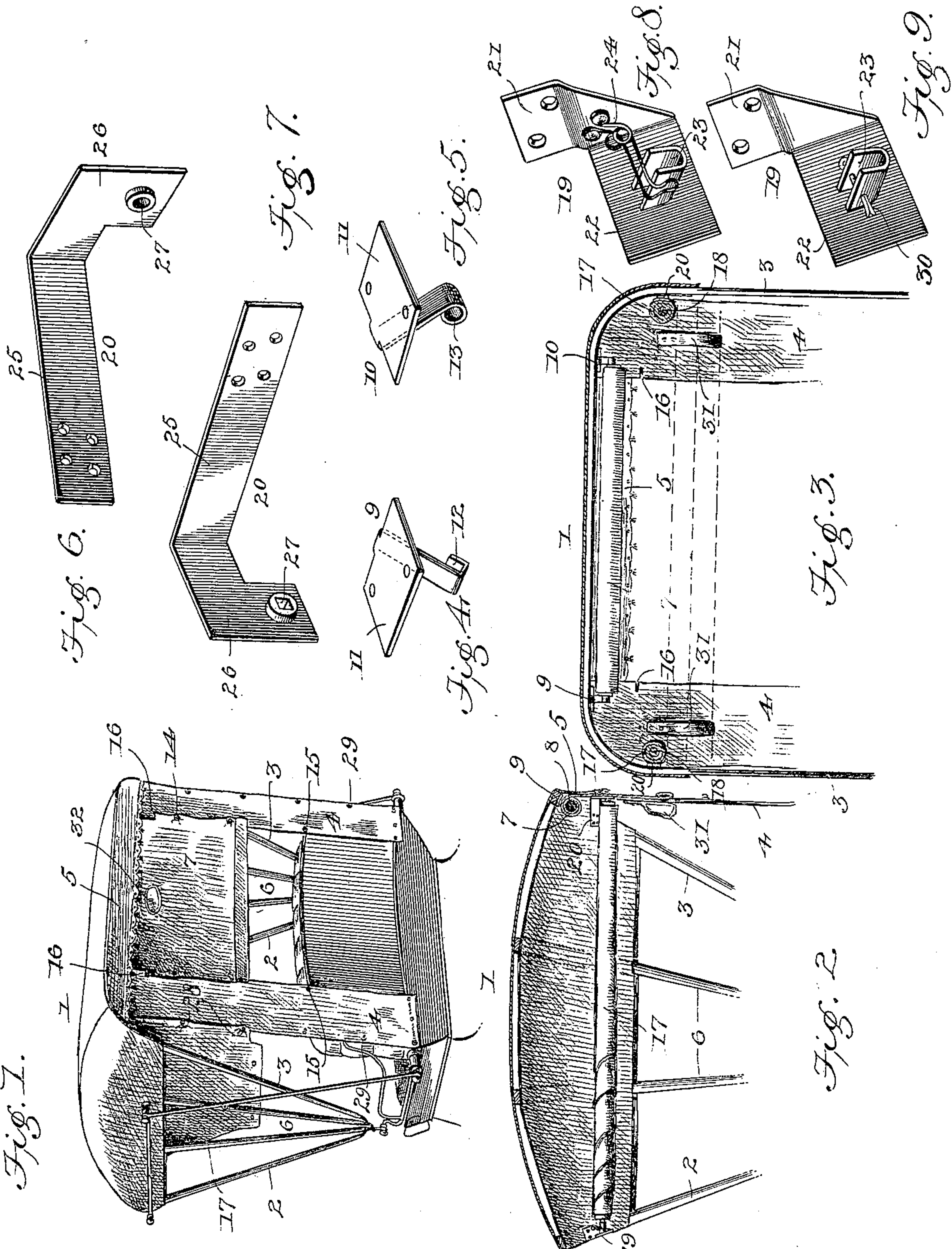
No. 624,066.

Patented May 2, 1899.

G. P. MITCHELL.  
BUGGY TOP.

(Application filed Oct. 29, 1898.)

(No Model.)



Witnesses

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# UNITED STATES PATENT OFFICE.

GEORGE P. MITCHELL, OF OVID, MICHIGAN.

## BUGGY-TOP.

SPECIFICATION forming part of Letters Patent No. 624,066, dated May 2, 1899.

Application filed October 29, 1898. Serial No. 694,959. (No model.)

*To all whom it may concern:*

Be it known that I, GEORGE P. MITCHELL, a citizen of the United States, residing at Ovid, in the county of Clinton and State of Michigan, have invented a new and useful Buggy-Top, of which the following is a specification.

My invention relates to buggy-tops, and particularly to an improvement over Patents Nos. 576,598 and 576,599 granted to me on February 9, 1897, in the matter of the means for supporting and securing the side and back curtains, whereby when not in use they may be conveniently housed and protected and when in operative position may be extended to a greater or less extent to either partly or wholly close the buggy-top at its sides and back.

A further object of the invention is to provide such means for mounting the side curtains as to facilitate the dismounting thereof when it is required to crush or fold the buggy-top and in connection therewith to provide means whereby the side curtains may be supported contiguous to the back curtain when said top is in its crushed or folded condition.

Further objects and advantages of this invention will appear in the following description, and the novel features thereof will be particularly pointed out in the appended claims.

In the drawings, Figure 1 is a perspective view, taken from the rear, of a buggy-top provided with curtains and supporting devices constructed and arranged in accordance with my invention, the curtains being shown partly drawn or extended. Fig. 2 is a vertical longitudinal section of a portion of the buggy-top. Fig. 3 is a vertical transverse section of a portion of the buggy-top, showing the side-curtain rollers temporarily supported parallel with and contiguous to the rear-curtain roller. Figs. 4 and 5 are detail views in perspective of the rear-curtain-roller brackets. Figs. 6 and 7 are similar views of the rear side-curtain-roller brackets. Fig. 8 is a similar view of one of the front side-curtain-roller brackets. Fig. 9 is a similar view of a modified construction of front side-curtain-roller brackets.

Similar reference characters indicate corresponding parts in all the figures of the drawings.

In the drawings I have shown the features of my invention in connection with a buggy-top having a cover 1, front and rear bows 2 and 3, and back quarters 4, a rear valance 5 being arranged to drop exteriorly over the upper ends of said quarters. Any desired number of intermediate bows 6 may be employed.

The back curtain 7 is attached to a spring-roller 8 of the ordinary or any preferred type, (not illustrated in detail in the drawings,) and the journals of said back-curtain roller are mounted in brackets 9 and 10, having securing-plates 11, which are attached to the underside of the horizontal portion of the rear buggy-top bow. From these securing-plates the shanks of the brackets 9 and 10 depend and incline rearwardly to dispose the angular and round bearings 12 and 13 adjacent to the plane of the back quarters, the angular bearing, as in the ordinary practice, being open-sided to allow the lateral displacement of the curtain-roller journal which may be mounted therein, and thus provide for the axial movement of the roller to displace its other journal from the closed round bearing of the other bracket. The described construction and disposition of the rear-curtain-roller brackets provide for arranging the rear curtain adjacent to the inner or front surface of the back quarters; but the edges of said back curtain are provided with eyes 14 for engagement with the ordinary or any preferred buttons or fasteners 15, secured exteriorly to the quarters near their inner edges, and to so dispose the back curtain as to adapt its eyes to engage with said buttons or fasteners the edges of said curtain are extended, as described in my aforesaid former patent, No. 576,599, through slits or notches 16, formed in the upper inner edges of the back quarters, near their upper ends, and concealed by the described valance 5. Also the rear-curtain roller is mounted in front of and is concealed from the rear of the vehicle by said valance, said roller being above the plane of the lower edge of the valance.

The side curtains 17, which are reduced toward their lower ends to correspond with the shape of the buggy-top sides, are attached at their upper edges to side-curtain rollers 18, having their journals mounted in front and



rear side-curtain-roller brackets 19 and 20, secured, respectively, to the inner surfaces of the front and rear buggy-top bows 2 and 3. The front side-curtain-roller bracket, which I have illustrated in the drawings, Figs. 2 and 8, consists of a securing-plate 21, tapered toward its lower end and provided with a lateral ear 22, from which projects a rearwardly-extending seat 23, and in connection with this seat and closing the open upper side thereof is a movable holder 24, consisting in the construction illustrated in said Figs. 2 and 8 of a looped spring-actuated arm depending at its inner looped end contiguous to the inner side of the seat, having its parallel sides arranged to span the seat and terminally attached to the surface of said securing-plate, said sides being coiled contiguous to the securing-plate to give the desired resilience to the holder. To introduce the front journal of a side-curtain roller into this front seat, it is necessary to raise or displace the holding-arm; but when seated, with said arm in operative position, the accidental displacement of the front curtain-roller journal is prevented. The rear side-curtain-roller bracket 20 consists of a rearwardly-extended securing-plate 25, bent inwardly at its rear end to form an ear 26, which is disposed in contact with the inner or front surface of the back quarter and is provided with a curtain-roller-journal bearing 27.

By arranging the rear-curtain-roller-journal bracket contiguous to the plane of the back quarter the rear edge of the side curtain when the latter is extended is adapted to overlap the outer edge of the back quarter sufficiently to engage the eyes 28 with the buttons or fasteners 29, located adjacent to the said outer edge of the back quarter, as clearly shown in Fig. 1, and by employing a plurality of eyes and buttons or fasteners spaced at uniform intervals I am enabled to extend the side curtains either partly, as shown in Fig. 1, or wholly to afford the desired protection to the occupant of the vehicle. It will be understood also that either a partial or a complete extension of the back curtain is possible. Furthermore, it will be understood that the overlapping of the outer edge of the back quarter by the rear edge of the side curtain forms a break-joint, by which wind and rain are effectually excluded from the interior of the buggy-top at this point.

In the modified construction illustrated in Fig. 9 I have shown a front side-curtain-roller bracket having a movable bearing-closing device consisting of a split key 30; but the ease with which the hereinbefore-described closer may be manually displaced to release the roller-journal facilitates the dismantling of the roller, and in addition thereto said resilient closer, being permanently attached to and forming a part of the bracket, is not liable to become displaced or lost.

When it is desired to fold or crush the

buggy-top, the side-curtain rollers, with the attached curtains completely rolled, are dismounted and fitted in temporary supporting-loops 31, attached to the inner surfaces of the back quarters adjacent to the rear-curtain-roller brackets, as indicated in Fig. 3. Furthermore, in practice each of the curtains is provided with a light 32.

In practice various changes in the form, proportion, and the minor details of construction may be resorted to without departing from the spirit or sacrificing any of the advantages of the invention.

Having described my invention, what I claim is—

1. A carriage-top having a back-curtain roller, and supports mounted on the rear carriage-top bow, and pendent bearing-loops located upon the back quarters of the carriage-top below said supports, for the reception of the roller-journals, substantially as specified.

2. The combination with a carriage-top, of a back curtain having a roller, and back-curtain-roller brackets 9 and 10 having securing-plates 11 attached to the horizontal portion of the rear carriage-top bow, and depending rearwardly-inclined shanks terminating in bearings 12 and 13, located adjacent to the plane of the back quarters of the carriage-top, for the reception of the back-curtain-roller journals, substantially as specified.

3. The combination with a carriage-top having front and rear bows, and side curtains having rollers, of front and rear side-curtain-roller brackets secured respectively to the inner surfaces of the front and rear bows, each front-roller bracket consisting of a securing-plate 21 tapered toward its lower end to cause its rear edge to occupy a vertical position, a lateral ear 22 projecting perpendicularly from the plane of said securing-plate with its front surface flush with the front edge of the bow, an open-topped roller-journal seat projecting rearwardly from said ear, and movable means for closing the open top of the seat, substantially as specified.

4. The combination with a buggy-top having front and rear bows, of side curtains having rollers, and front and rear side-curtain-roller brackets secured respectively to the upright portions of the front and rear buggy-top bows, and having bearings for the reception of the journals of the curtain-rollers, each of said rear brackets having a rearwardly-extending securing-plate terminating in a bearing-ear disposed parallel with and contiguous to the plane of the back quarters of the buggy-top, substantially as specified.

5. The combination with a buggy-top having front and rear bows and back quarters, of side and back curtains having rollers, side and back journal-bearing brackets secured to the front and rear carriage-bows, the rear side-curtain-roller brackets having their bearings arranged contiguous to the inner surfaces of the back quarters, and the rear edges

of the side curtains being adapted to overlap  
the outer edges of said back quarters, and in-  
terlocking fastening devices carried by the  
back quarters, contiguous to their inner and  
5 outer edges, and the contiguous edges of the  
back and side curtains, substantially as speci-  
fied.

In testimony that I claim the foregoing as  
my own I have hereto affixed my signature in  
the presence of two witnesses.

GEORGE P. MITCHELL.

Witnesses:

E. M. CLARK,  
J. E. HYLAND.