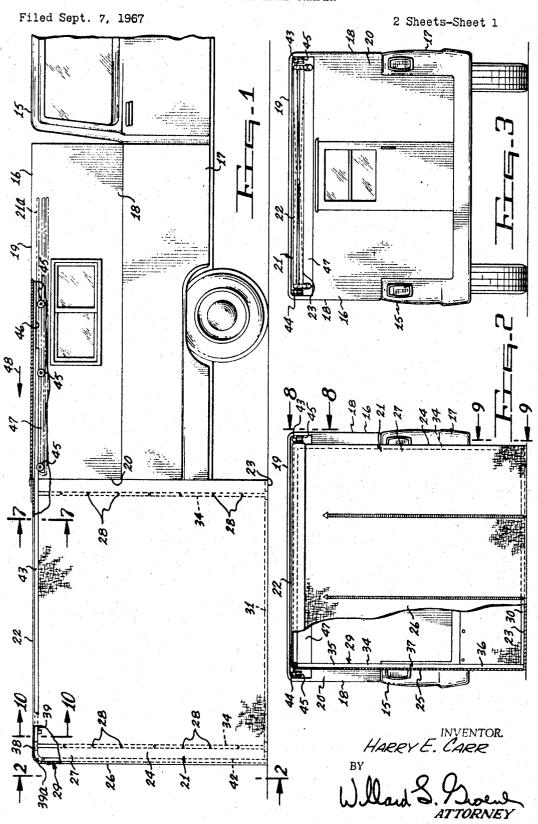
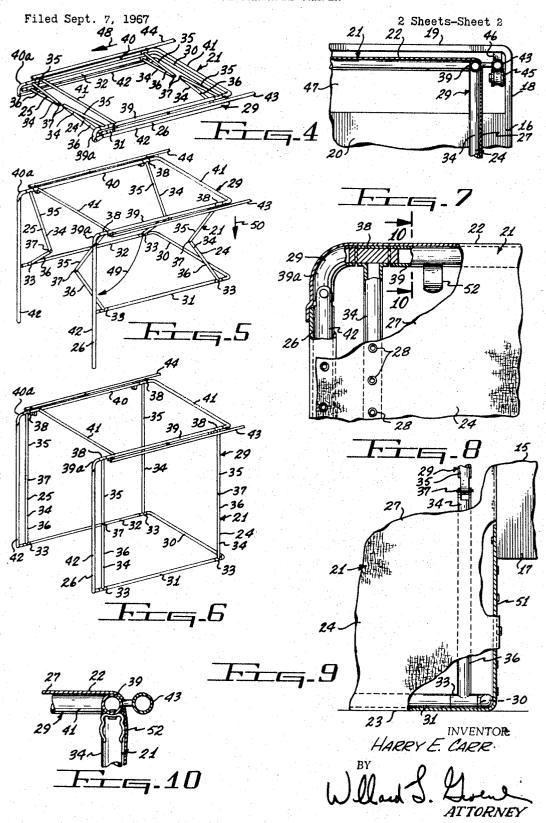
EXPANDABLE CAMPER



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3,463,540 EXPANDABLE CAMPER Harry E. Carr, 1438 E. Sunnyslope Lane, Phoenix, Ariz. 85020 Filed Sept. 7, 1967, Ser. No. 666,139 Int. Cl. B60p 3/34; E04b 7/16 U.S. Cl. 296-

2 Claims

ABSTRACT OF THE DISCLOSURE

A retractable and expandable extension for campers having light weight material covering a tubular frame, with rigid roof and floor portions interconnected by inbers engaging rollers in a storage compartment in the top portion of the camper, so that the collapsed structure may be retractably stored within the compartment.

Background of the invention

- (1) The field of the invention lies in campers, and is particularly directed to a retractable, expandable and 25 collapsible extension for increasing the inclosed area
- (2) Heretofore expandable campers have been extremely heavy and bulky mechanisms requiring time consuming tedious hand operations or elaborate power 30 assisted actuation systems for the expanding or collapsing operations. Other prior art devices have provided only partial inclosures such as extending canopies and the like.

Summary of the invention

In applicant's invention it is an object to provide an expandable camper which is simple to construct and inexpensive to manufacture.

Another object of this invention is to provide an expandable camper extension which is light weight and can be quickly and easily hand erected.

Still another object of this invention is to provide an expandable camper extension that requires a minimum amount of storage area.

And it is an object of the aforementioned apparatus to provide additional standing room space that can be easily installed on existing campers with a minimum of modification.

Brief description of the drawings

FIG. 1 is a side elevation of a camper showing the expandable extension of this invention applied thereto. 55 FIG. 2 is a rear elevation of a camper showing the

expandable extension taken on the line 2-2 of FIG. 1.

FIG. 3 is a rear elevation view similar to FIG. 2 but showing the expandable extension in the collapsed posi-

FIG. 4 is a diagrammatic perspective view showing the frame of the expandable extension in the collapsed

FIG. 5 is a diagrammatic perspective view similar to FIG. 4 but showing the expandable extension in the 65 partially erected position.

FIG. 6 is a diagrammatic perspective view similar to FIGS. 4 and 5 but showing the expandable extension in the erected position.

FIG. 7 is a fragmentary sectional view on the line 7-7 of FIG. 1.

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FIG. 8 is a fragmentary view on the line 8-8 of

FIG. 9 is a fragmentary view on the line 9—9 of FIG. 2.

FIG. 10 is a fragmentary sectional view on the line 10-10 of FIGS, 1 and 8.

Description of the preferred embodiment

As an example of the preferred embodiment of the invention, there is shown a truck 15 having a camper 16 attached to the truck bed 17, the camper 16 having the usual sides 18, top 19, and back 20.

In the present invention there is provided an expandwardly folding side walls and having an upwardly folding back wall, the roof frame having extended rail meming a horizontally disposed roof 22 and floor 23 interconnected by collapsible side walls 24-25, and having a vertically disposed folding back wall 26. As best seen in FIGS. 1, 8 and 9 the camper extension 21 has an 20 outer skin 27 suitably attached with snaps 28 to tubular frame 29, the skin being preferably of light weight materail such as canvas or the like.

As best seen in FIGS. 4, 5 and 6, the floor 23 is a substantially rectangular rigid frame having cross member 30 interconnecting the floor frame members 31-32. The opposite ends of each floor frame members 31-32 are provided with pivot mechanisms 33 to which are attached the lower ends of side frame members 34. Side frame members 34 have upper tubular frame members 35 and lower tubular frame members 36 and are pivotally connected at 37 whereby side walls 24-25 may be inwardly collapsed as will hereinafter be described in detail. The upper ends of side frame members 34 are attached to pivot mechanisms 38 provided in opposite ends of each roof frame member 39-40. The roof 22 is a substantially rectangular rigid frame having cross members 41 interconnecting roof frame members 39-40. The outermost ends of roof frame members 39-40 having outwardly downwardly extending portions 39a-40a, to which are pivotally connected back wall frame members 42. Suitably attached to roof 22 are extender rails 43-44, being of sufficient length so as to maintain a constant slidable engagement with rollers 45 and guides 46 suitably mounted within the storage compartment 47 of camper 16.

In operation: To move the camper extension 21 from its normally stored position 21a, shown in broken lines in FIG. 1, to the fully expanded position shown in solid lines, the camper extension 21 is moved in the direction of arrow 48 to the extended position shown best in FIG. 4. As shown in FIG. 5 the back 26 is then pivoted in the direction of the arrow 49 to the vertical position, and floor 23 is moved in the direction of the arrow 50 to the fully extended position shown best in FIGS. 1 and 6. To provide a weather-proof enclosure, the skin 27 is snapped at the corners and flap 51 is attached to the truck bed 17. The collapsing and storing of the camper extension 21 is accomplshed by reversing the previously described procedure. The roof frame members 39-40 are provided with downwardly extending clamps 52 which engage and retain floor frame members 31-32 when the camper extension 21 is in the collapsed position, thereby enabling the operations of expanding and collapsing to be more easily accomplished.

I claim:

- 1. An expandable camper for a vehicle comprising in combination:
- (A) a camper extension having a horizontally disposed roof and a floor interconnected by collapsible laterally spaced side walls and a vertically disposed folding back wall including,

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- (B) a floor frame comprising a substantially rectangular rigid frame having a laterally extending forward cross member interconnecting laterally spaced side floor frame members,
- (C) laterally spaced side frame members having lower tubular frame members with their lower ends pivotally mounted on the laterally spaced side floor frame members, and upper tubular frame members having their lower ends pivotally connected to rock around horizontal longitudinally extending axes on the upper ends of the lower tubular frame members so that the side walls may fold laterally inwardly toward each other,
- (D) laterally spaced longitudinally extending roof frame members,
- (E) means for pivotally connecting the upper ends of the upper tubular side frame members to the roof frame members,
- (F) laterally extending cross members fixed between the outer ends of the roof frame members to form 20 a substantially rectangular rigid roof frame,
- (G) outwardly and downwardly extending portions formed on the rear ends of the roof frame members.

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- (H) and laterally spaced back wall frame members, pivotally mounted at their upper ends to the outwardly and downwardly extending portions of the roof frame members, so as to swing forwardly and upwardly under the roof frame.
- 2. An expandable camper as in claim 1 wherein:
 - (I) extender rails are attached to the outside of the laterally spaced longitudinally extending roof frame members,
 - (J) and support and guide means on the vehicle slidingly engaging the extender rails.

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