(No Model.)

T. RAMS.

CARRIAGE TOP PROP.

No. 344,135. Patented June 22, 1886.

Fig. 1.

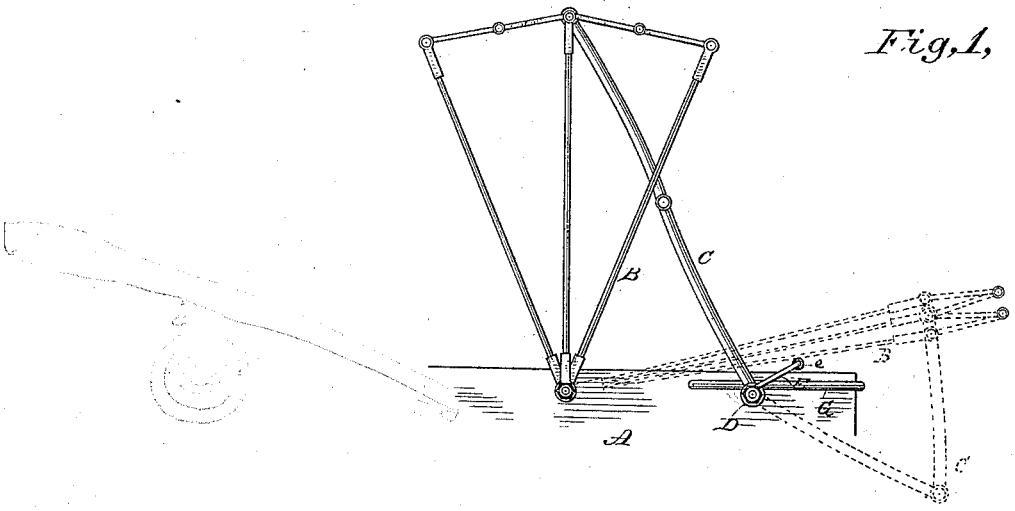
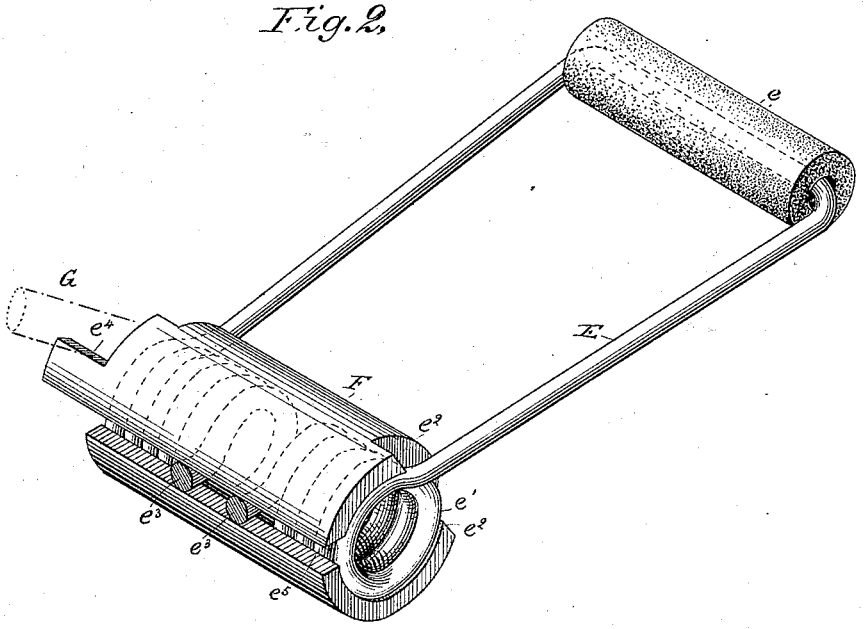


Fig. 2.



WITNESSES:
Dan Polk
U. J. Polk

INVENTOR
Tillman Rams
BY
Richd. N. Manning
ATTORNEY

N. PETERS, Photo-Lithographer, Washington, D.C.

UNITED STATES PATENT OFFICE.

TILLMAN RAMS, OF KANSAS CITY, MISSOURI, ASSIGNOR OF ONE-HALF TO EPHRAIM H. FENTON, OF SAME PLACE.

CARRIAGE-TOP PROP.

SPECIFICATION forming part of Letters Patent No. 344,135, dated June 22, 1886.

Application filed October 2, 1885. Serial No. 178,826. (No model.)

To all whom it may concern:

Be it known that I, TILLMAN RAMS, a citizen of the United States, residing at Kansas City, in the county of Jackson and State of Missouri, have invented certain new and useful Improvements in Protectors for the Back Bows in Folding Tops to Vehicles; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, forming a part of this specification.

My invention has for its object to provide for the back prop bolt of a vehicle a spring-lever to receive the back bow of the top when said top is lowered, and thus afford a yielding resistance in the fall of and prevent injury to the said back bow by its too sudden fall; and it consists in the novel devices hereinafter fully described, and specifically pointed out in the claims.

Figure 1 is a side view of the folding frame for the top of a vehicle. Fig. 2 represents my improved bow-protector upon an enlarged scale.

In the construction of my device I make a sleeve, F, of the proper size to receive a coil-spring, e', and permit the entrance of a suitable prop bolt within the sleeve and the coil-spring therein, whereby it may be secured to the side of the carriage A. The sleeve F is provided with a longitudinal transverse slot, e^5, and in longitudinal continuation of one end portion of sleeve F, near slot e^5, is made the lug e^4. The bow-protector E is formed from a single piece of stout wire, which is first bent at right angles to form an arm in a central relation to said piece, and the roller e, which may be made from rubber, is perforated longitudinally to receive the arm portion of wire. The roller e is made the comparative length of the sleeve F, and the wire of the bow-protector is again bent at right angles upon an opposite end of the roller, thus making the protector nearly rectangular in form. The opposite ends of the wire are now coiled between the opposite sides and in a transverse relation thereto, the ends being turned outwardly, so as to pass through the slot e^5. The ends of the wire having the opposite coiled springs are then spread apart, and the coil-springs on opposite ends of the wire protector are inserted in the sleeve F from relative opposite ends, the bent ends of the spring, e^3 e^3, passing through the slot e^5, and supporting the said ends e^3 e^3 in suitable tensions. The opposite ends of the sleeve F are made with the rabbeted portions e^2, which are upon a relative side of the sleeve opposite to the slot e^5, and permit the protector E to extend the coil-springs farther within the sleeve, and afford room for the play of the protector. The sleeve F is then fitted over the usual prop-bolt upon the side of a vehicle, which is in line with the back bow, and the lug e^4 carried beneath the rail G, which extends around the carriage. Should there be no rail around the vehicle to receive the lug e^4, a perforation may be made through the side of the vehicle and the lug e^4 inserted therein. The nut-bolt is then screwed on the end of the prop-bolt as commonly done. When the sleeve F is properly adjusted to the prop-bolt and shifting-rail, the tension of the coil-spring e' is sufficient to permit the back bow to be lowered upon the roller e, and the resistance to said back bow and the weight of the reclining top being a yielding one, the injury from bending, which often results from a sudden fall of the top upon the prop-bolt, is obviated. The spring and lever are made in one piece, so that as the lever is carried down by the weight of the top the spring is contracted and the tension more evenly distributed through the lever and spring.

Having fully described my invention, what I now claim as new, and desire to secure by Letters Patent, is—

1. The combination, with a suitable prop-bolt upon a vehicle, adapted to support the back bow, and a sleeve provided with a lug upon one end, and suitable means upon the vehicle for preventing the rotation of said sleeve, of a coiled spring in said sleeve, and a

lever extending from said spring integral therewith, an arm on said lever, and an anti-friction device on said arm, as described.

2. The combination, with a suitable prop-bolt upon a vehicle, adapted to support the back bow, as described, and the shifting-rail, of a sleeve provided with a lug upon one end, a coiled spring in said sleeve, and a lever attached to and extending from said coiled spring, an arm on said lever, and a roller on said arm, as shown and described.

TILLMAN RAMS.

Witnesses:
FRED. W. PERKINS,
A. M. GAYLORD.