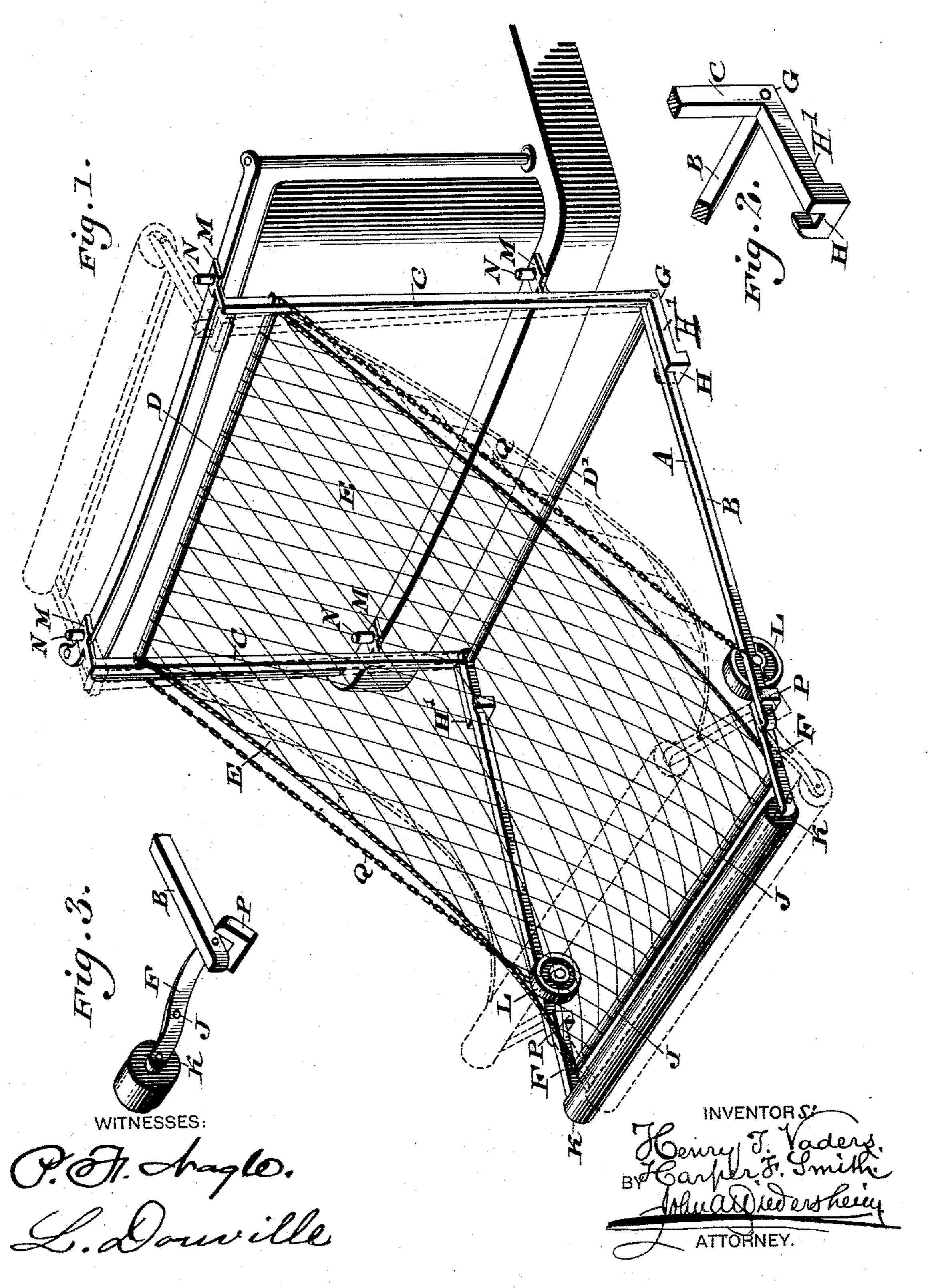
(No Model.)

H. T. VADERS & H. F. SMITH. CAR FENDER.

No. 551,241.

Patented Dec. 10, 1895.



United States Patent Office.

HENRY T. VADERS AND HARPER F. SMITH, OF PHILADELPHIA, PENNSYL-VANIA; SAID VADERS ASSIGNOR OF TWO-THIRDS TO SAID SMITH.

CAR-FENDER.

SPECIFICATION forming part of Letters Patent No. 551,241, dated December 10, 1895.

Application filed August 2, 1895. Serial No. 557,979. (No model.)

To all whom it may concern:

Be it known that we, HENRY T. VADERS and HARPER F. SMITH, citizens of the United States, residing in the city and county of 5 Philadelphia, State of Pennsylvania, have invented a new and useful Improvement in Car-Fenders, which improvement is fully set forth in the following specification and accompanying drawings.

o Our invention consists of a car-fender having an auxiliary frame to which the netting, canvas or other material is attached, so that when a person or object strikes said frame it is raised, so as to lift the person and direct 15 him into said material; which latter slackens and depresses so as to receive the person or object without injury, and retain the same therein.

It also consists of novel details of construc-

20 tion, as will be hereinafter set forth.

Figure 1 represents a perspective view of a car-fender embodying our invention. Figs. 2 and 3 represent perspective views of detached parts.

Similar letters of reference indicate corre-

sponding parts in the several figures.

Referring to the drawings, A designates the main frame of a fender, the same consisting of the side pieces B, the uprights C, cross-30 bars D D', netting, canvas or other suitable material, forming the bed E, and an oscillating frame F, which latter is pivoted to the front of the frame A, and is adapted to rise and fall. The rear ends of said side pieces 35 B are pivotally connected with the lower ends of the uprights C, as at G, whereby said frame A may be raised and folded against the dasher or platform, as seen in dotted lines, the said pieces B of said frame A, when the frame is 40 lowered, resting on the seats H of the horizontal limbs H' which extend forwardly from the lower ends of the uprights C, and are recessed to receive the adjacent portion of said side pieces B.

The frame F consists of side pieces which are connected by a cross-bar J to which the lower end of the bed E is attached, the upper end of the same being attached to the cross-

bar D of the frame A. Mounted on the front 50 end of the frame F is a roller K, which is

formed of elastic, flexible or other material,

its position when in use being preferably close to the rails of the car-tracks.

The frame A has rollers or wheels L mounted thereon, the same acting as pilots, and are 55 adapted to run on the rails of the car-track.

The uprights C of the frame A have secured to them the hooks or eyes M, which are adapted to engage with pins or studs N on a car, it being noticed that by this provision 60 the fender may be removed and adjusted on either end of the car as desired.

On the rear end of the frame F are laterally-extending angular shoulders or lips P, which, when said frame is in its normal posi- 65 tion, have their horizontal limbs abut against the adjacent portions of the side pieces B of the frame A, thus limiting the downward motion of said frame, while the vertical limbs of said lips freely embrace the sides of said 70 pieces B and act as braces for preventing lateral strain on said frame F.

It will be seen that the frame A is rigidly connected with the uprights C and limbs H' and that the frame F is rigidly connected 75 with said frame A and both are so held in operative position against vertical and lateral

displacement. The operation is as follows: When a person or object strikes the roller K, as the axis of 80 the frame F is at or about the rear end thereof, said frame is thrown upwardly by the impact against it, and the bed E which is connected with the frame is slackened, so that it becomes depressed or bowed downwardly, and 85 the person or object struck is raised by the ascending frame F and thrown or directed into said bed, into which he or it will be received without injury, and without liability of rolling out. When the person or object is 90 removed, the frame F is restored to its normal position, and the bed is somewhat straightened out, so that it may yield downwardly when the frame F is again struck as previously described.

It is also evident that the frame F may rise and fall, due to the vibrations of the fender of the car, so as to prevent injury to said frame and connected parts, the same being also true of the main frame A.

The frame A may be strengthened by the chains or other braces Q, which are connected

with the vertical and horizontal portions of radictively as the specific $\mathbf{said}(\mathbf{frame.})$. The results of the second state of the second state $\mathbf{said}(\mathbf{frame.})$

Having thus described our invention, what we claim as new, and desire to secure by Let-5 ters Patent, is—

1. In a car fender the uprights C and the horizontal limbs H which project forwardly from the lower ends thereof in combination with the side pieces B of the main frame, said pipe and the representation pivoted on their rear ends to said uprights and seated intermediate of their ends no bear and the second of the recesses in said limbs II', substantially as described.

2. In a car fender the roller-carrying frame HARPER F. SMITH. ward ends of the side pieces B of the main the ball and provided with the angular lips P, | ... and John A. Wiedersheim, and the lips and the second s whose lower limbs are below said ends, and a set A.P. Jennings.

whose vertical limbs are aside of said ends. said parts being combined substantially as 20 described.

3. In a car fender the main frame A, the uprights C, with the laterally extending limbs II' on the lower ends thereof, the side pieces B of said frame being mounted on said up- 25 rights and seated on said limbs, in combination with the roller-carrying frame F, have a ing its side pieces pivoted to the said side pieces B, and formed with lips embracing said side pieces B, substantially as and for the 30 purpose set forth.

HENRY T. VADERS.

Witnesses: