

(No Model.)

R. C. DE VAULT.
CAR FENDER.

No. 542,242.

Patented July 9, 1895.

Fig. 3.

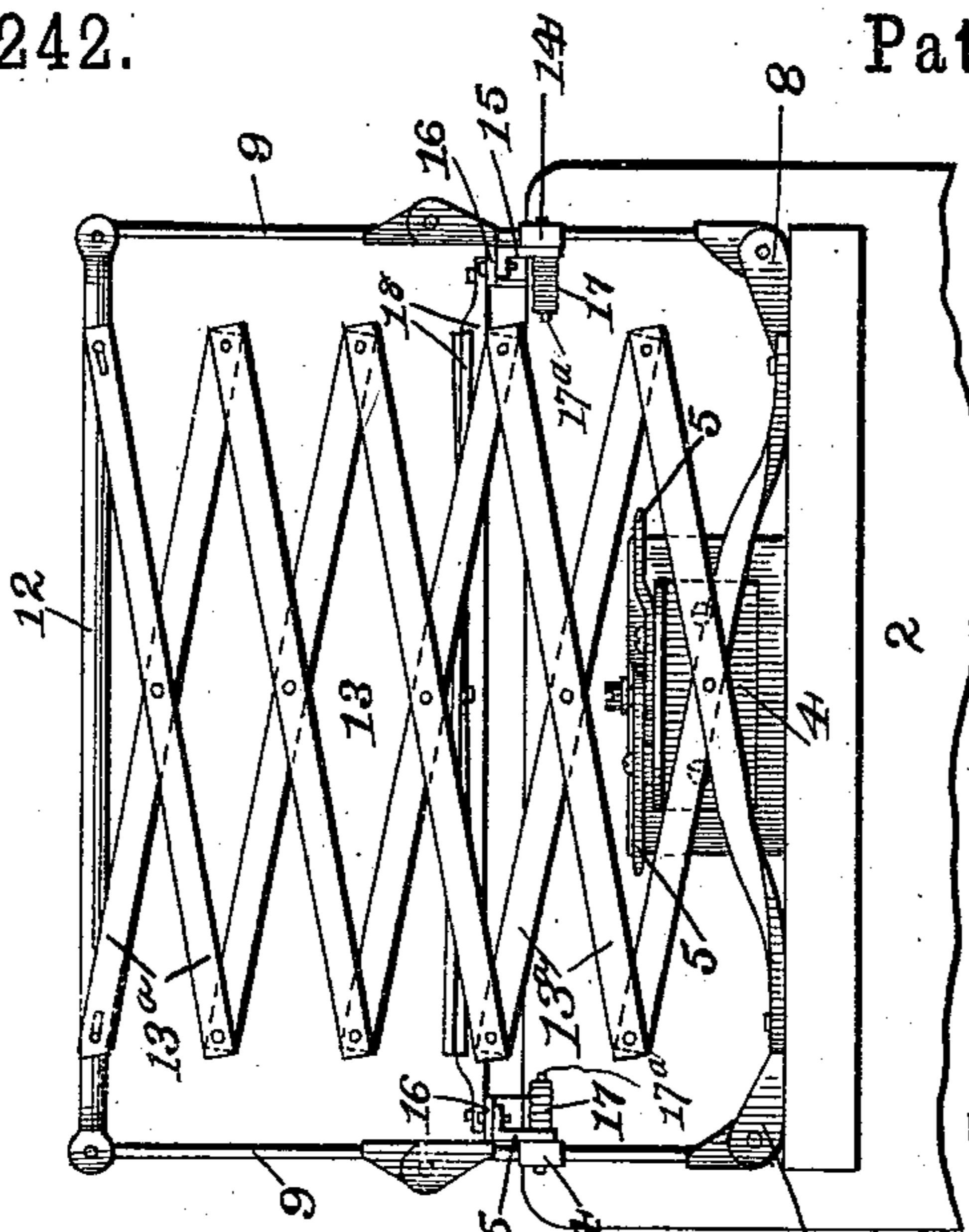


Fig. 2.

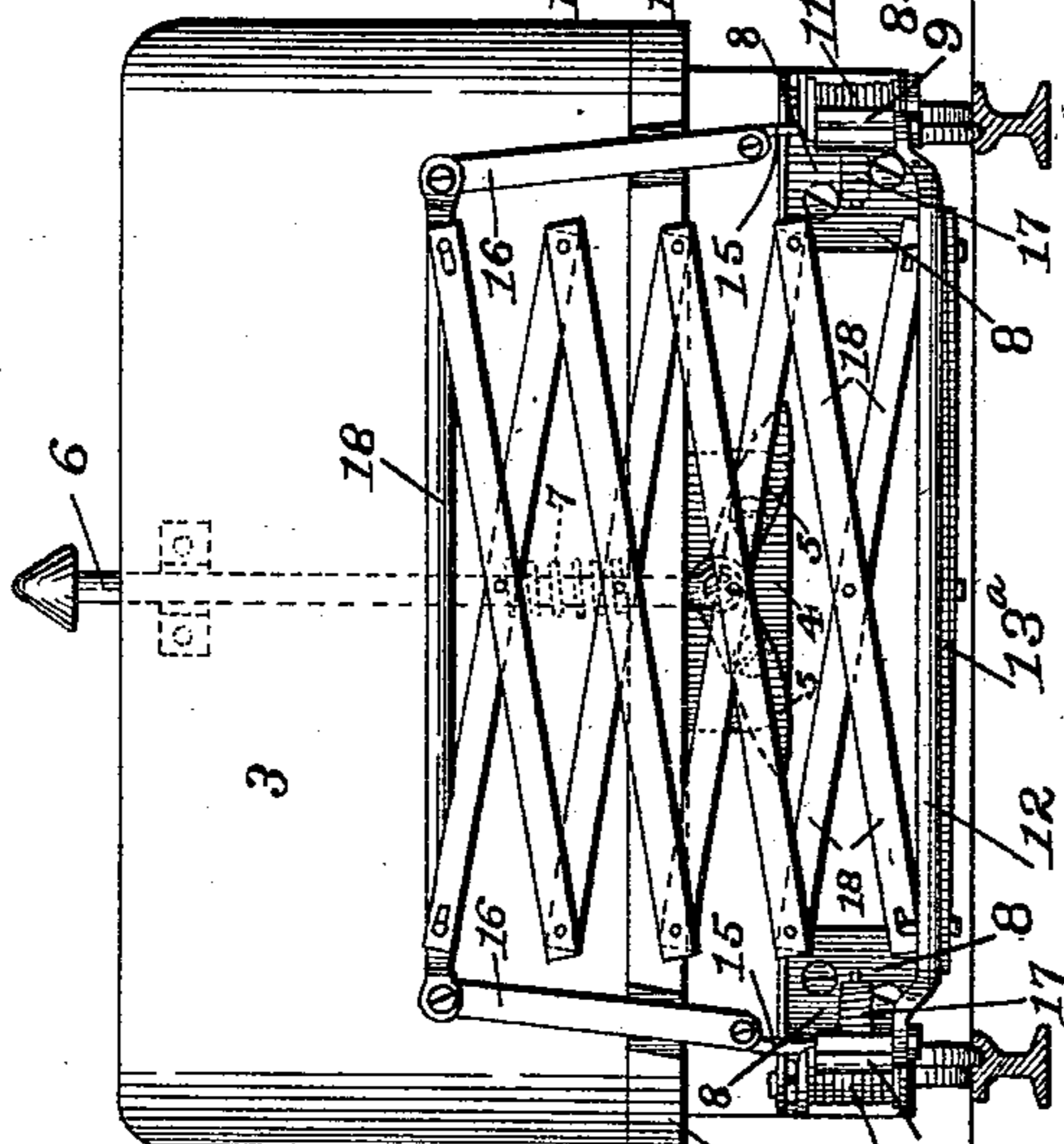


Fig. 1.

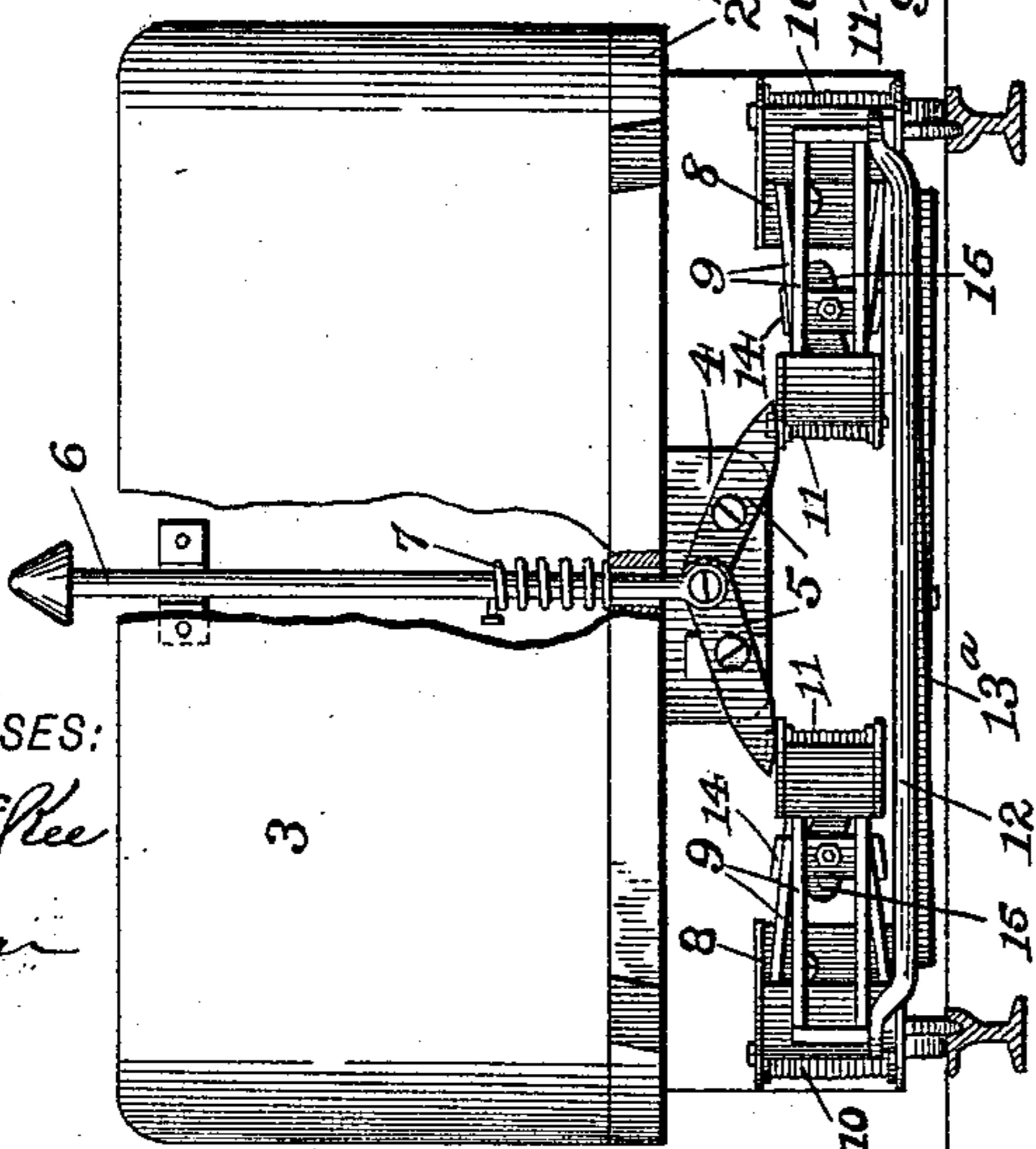


Fig. 5.

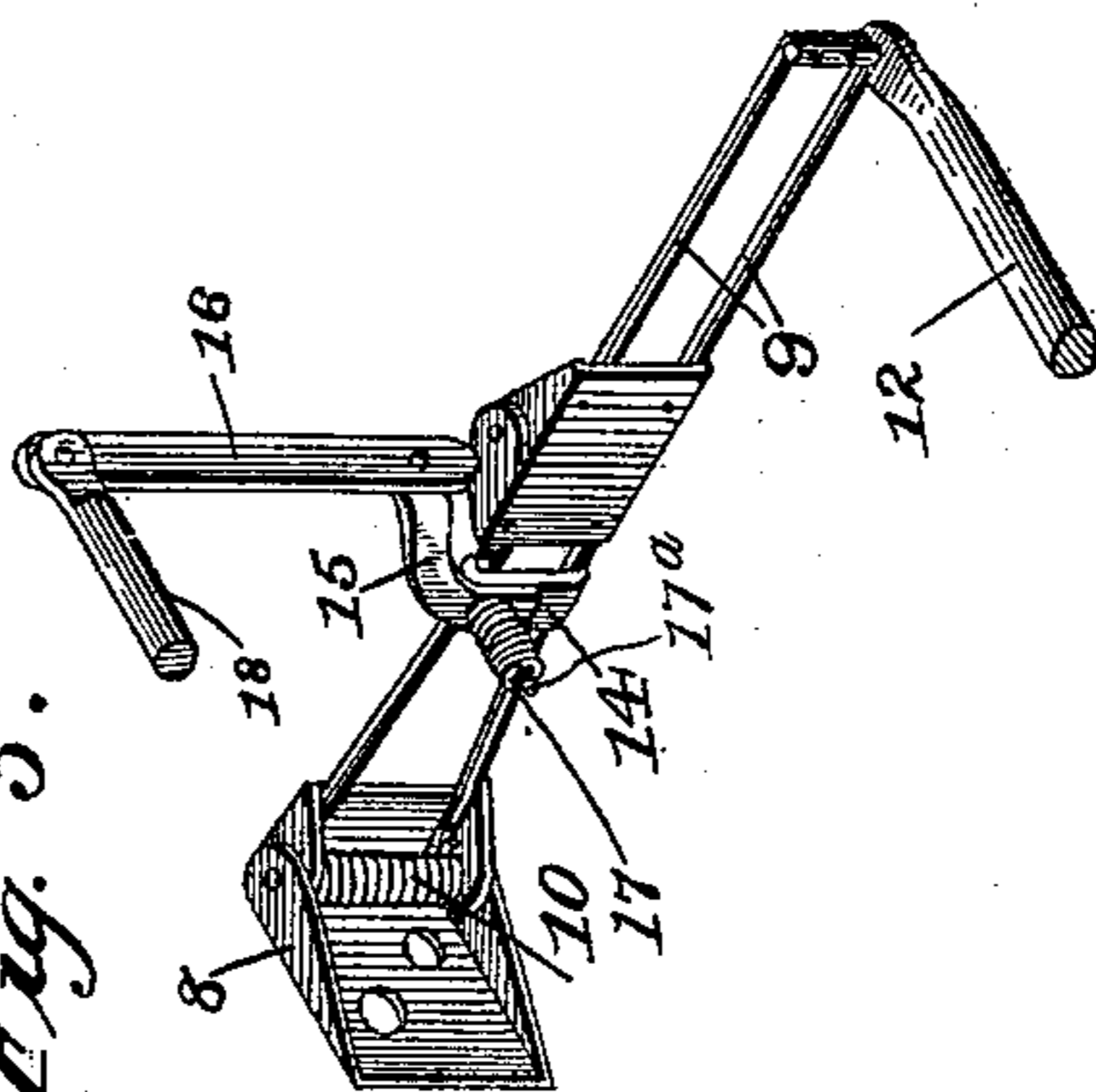


Fig. 6.

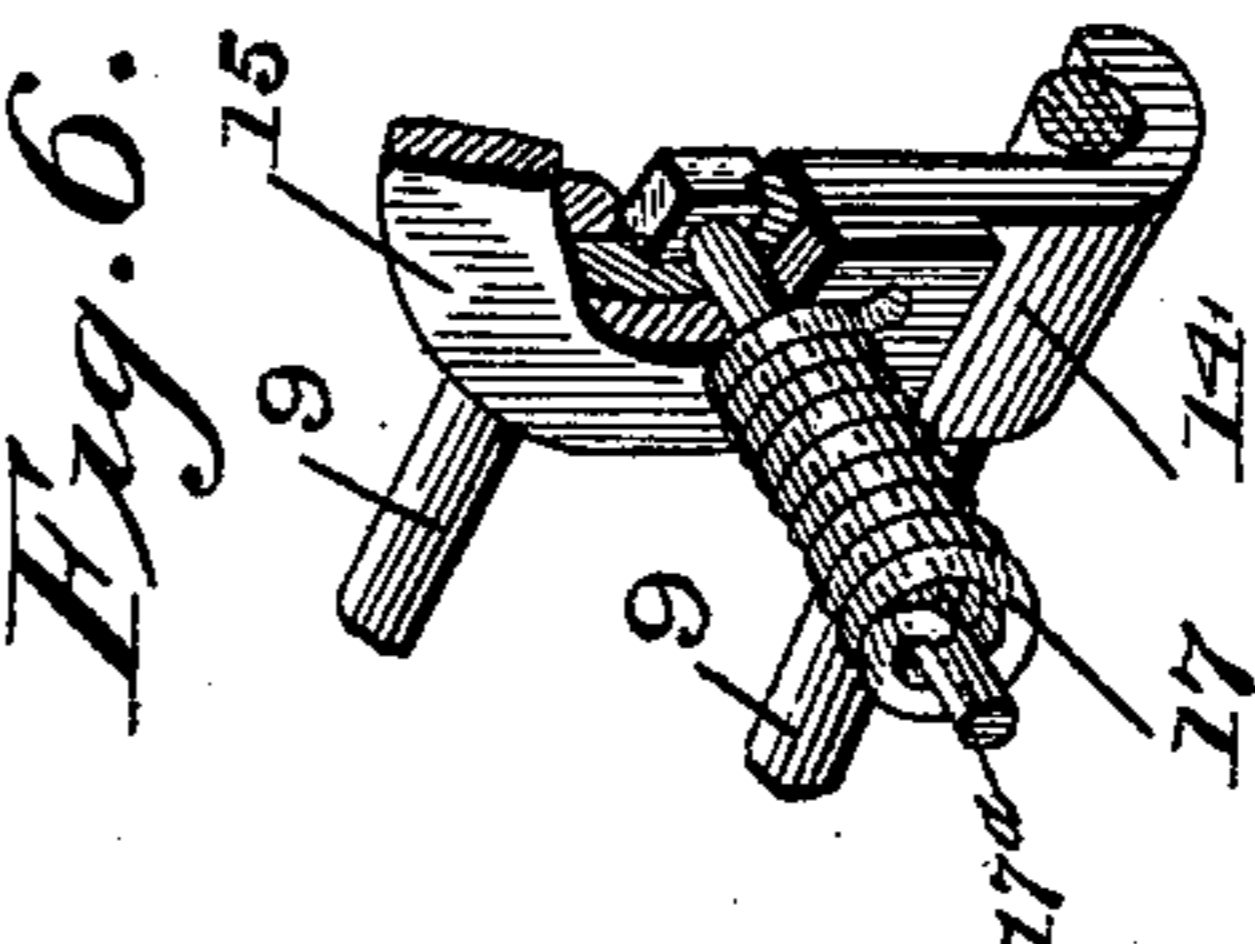
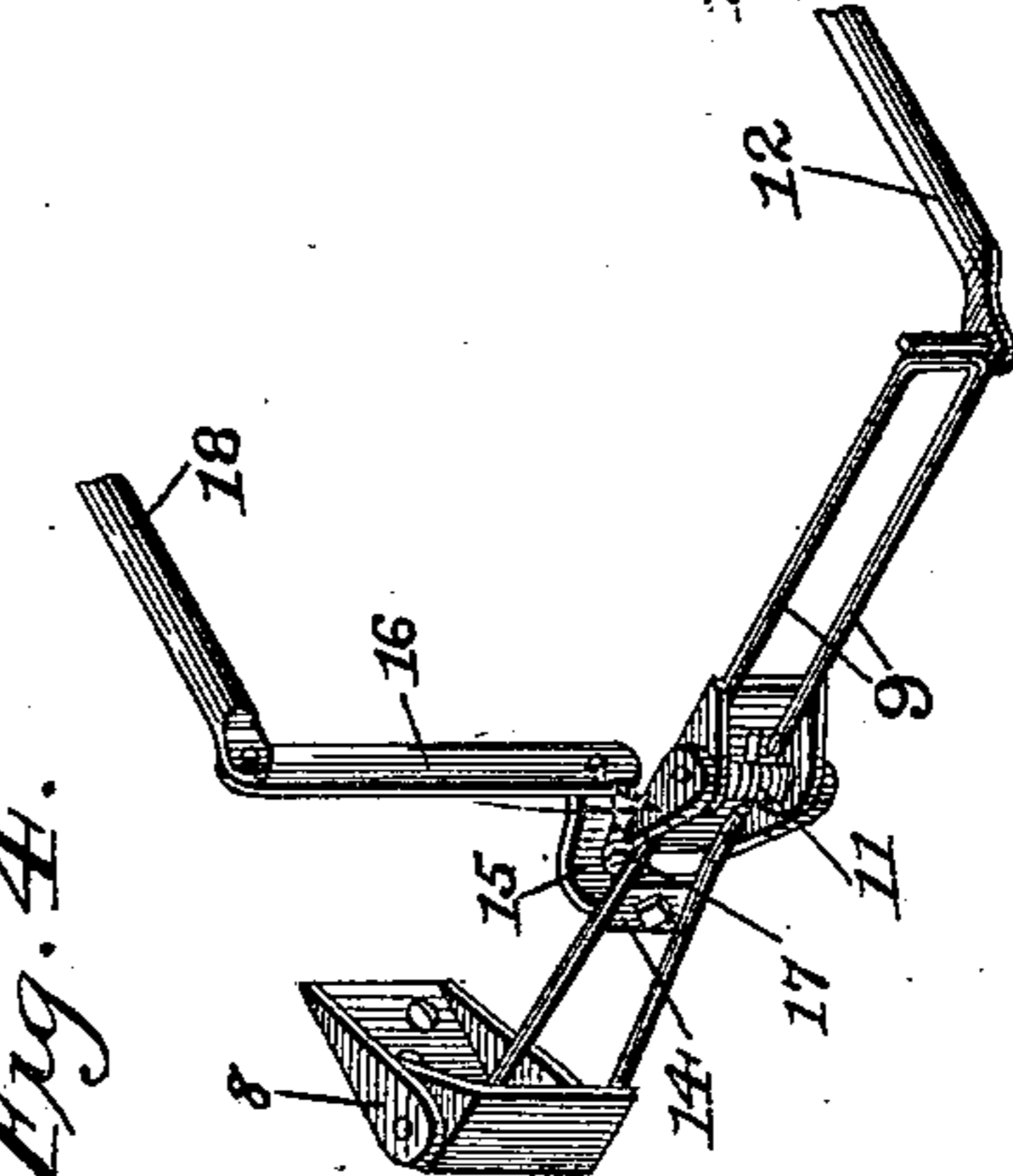


Fig. 4.



WITNESSES:

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CAR-FENDER.

SPECIFICATION forming part of Letters Patent No. 542,242, dated July 9, 1895.

Application filed March 29, 1895. Serial No. 543,653. (No model.)

To all whom it may concern:

Be it known that I, ROBERT C. DE VAULT, a citizen of the United States, residing at Philadelphia, in the county of Philadelphia and State of Pennsylvania, have invented certain new and useful Improvements in Car-Fenders; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to improvements in car fenders and guards, the object of the same being to produce a device of this character which may be attached to street-cars of ordinary construction, may be conveniently folded up out of place beneath the front platform of the car when it is desired to store the car or to couple two or more together, and may be quickly actuated and thrown out into operative position.

The invention consists of two side frames pivoted in brackets to a support on the under side of the car, springs for normally urging said frames outwardly, the said frames being pivoted at their center and connected at their forward ends by a bar to which is attached the fender proper, which consists of a series of angularly-disposed rods or bars pivoted at their center and ends, and acting after the manner of ordinary lazy-tongs. Pivoted at about the center of the two side frames are the two side arms of the guard, and springs are provided for normally urging said guard upwardly on its pivot. The two side beams of said guard are connected at their forward ends by a transverse bar, to which is also connected angularly-disposed rods similar to those of which the fender proper is made up. The parts thus described are adapted to be folded down into compact space and are held in their folded position by means of the engagement of the projecting ends of the pivots of the two side frames with a pair of dogs pivoted in a bracket beneath the front platform and actuated by a rod projecting through said platform adjacent to the dash-board of the car.

The invention also consists in other details of constructions and combinations of parts, which will be hereinafter more fully described and claimed.

In the drawings forming a part of the specification, Figure 1 represents a front elevation of a car, showing my fender and guard applied thereto in their folded position. Fig. 2 is a similar view showing the same in their operative position. Fig. 3 is a bottom plan view of the device in its operative position. Figs. 4 and 5 are detail views of the side frames of which the fender is made. Fig. 6 is a detail perspective view showing a portion of the guard and the spring for actuating the same connected thereto.

Like reference-numerals indicate like parts in the various views.

By reference to the drawings it will be seen that 1 represents a car of ordinary construction, 2 the front platform, and 3 the dash-board thereof. Pivoted in a bracket 4, secured to the under side of the platform 2, are a pair of dogs 5, having elongated slots at their inner end through which projects a pin passing through the lower end of a rod 6, extending upwardly through the platform 2 and projecting above the dash-board 3. This rod 6 is normally urged upwardly by means of a coiled spring 7, as clearly shown.

8 8 represent two brackets, bolted or otherwise secured to a cross-beam on the under side of the car 1, in each of which is pivoted the inner end of the side frames 9. These frames are made of tubular rods and connecting-collars and are pivoted at their center and adapted to move inwardly at that point. Coiled springs 10, encircling the shaft upon which the inner ends of said side frames are pivoted, tend to normally urge said side frames outwardly on said pivot. Similar springs 11 at the pivotal connection at the center of said side frames tend to hold the two parts of the frames normally in a direct line. The forward ends of the side frames 9 are connected by means of a transverse bar 12, and to this bar are secured the forward ends of the fender proper 13. This fender consists of a series of angularly-disposed rods 13^a, pivoted at their central and extreme outer points and act in the nature of lazy-tongs. The outer ends of the inner rods are firmly secured to the cross-beam on the under side of the car. To supporting-braces 14 on the side frames 9 are pivoted arms 15, pivoted to the inner or lower ends of the side bars 16 of the guard.

Coiled springs 17, secured at one end to the pivotal shaft 17^a and at the other to the arms 15, act against the arms 15 and tend to normally urge the side bars 16 upwardly. The outer ends of said side bars 16 are connected by a transverse bar 18, to which are attached the forward ends of a series of angularly-disposed rods 18 of which the guard is made up. The inner ends of said series of bars are pivotally connected to two of the rods 13^a, of which the fender 13 is made up. The said guard is adapted to be swung forward on the pivot 17^a, lie flat on the fender, and be retracted therewith in folding up the fender. By this construction it will be seen that through the action of the springs 10, 11, and 17, the tendency of the parts is to be thrown into the position shown in Fig. 2, which is the normal operative position of the fender and guard.

When it is desired to couple two or more cars or to store the cars in the least possible space, the guard 16 is folded down upon its pivot against the bars 13^a of which the fender is made up. The side frames 9 are bent inwardly upon their central pivot and the parts closed down one upon the other, as shown in Fig. 1, the dogs 5 engaging the projecting ends of the shaft upon which the said side frames are centrally pivoted. This position may be held as long as desired, and this may indeed be the normal position of the fender. When it is desired to throw the same into operative position, as shown in Fig. 2, it is merely necessary to depress the rod 6, which will disengage the dogs 5, and through the action of the springs 10, 11, and 17 the parts will immediately assume their operative positions.

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

1. The combination with a car, of a fender adapted to fold up upon itself, a guard pivoted to said fender and adapted to fold up upon itself, springs for normally urging and holding

said fender outwardly and said guard up against the front of the dash-board, dogs for securing the same in their closed positions and means for releasing said dogs, substantially as and for the purpose described.

2. The combination with a car, of a fender therefor, consisting of side frames pivoted to brackets on the under side of the car, and also pivoted at their central points, springs for normally holding the parts of said side bars in a direct line, a transverse bar connecting the outer ends of said side frames, a supporting platform for said fender made up of a series of angularly disposed rods pivoted at their central and outer portions, connected to said transverse bar and to the under side of the car, a pair of pivoted dogs adapted to hold said side bars in their folded position, and means for actuating said dogs, substantially as and for the purpose described.

3. The combination with a car, of a fender therefor, consisting of side frames pivoted to brackets on the under side of the car, and also pivoted at their central points, springs for normally holding the parts of said side bars in a direct line, a transverse bar connecting the outer ends of said side frame, a supporting platform for said fender made up of a series of angularly disposed rods pivoted at their central and outer portions, connected to said transverse bar and to the under side of the car, a folding guard pivoted to said side frames, springs for normally urging said guard upwardly, a pair of pivoted dogs adapted to hold said side bars in their folded position, and means for actuating said dogs, substantially as and for the purpose described.

In testimony whereof I have signed this specification in the presence of two subscribing witnesses.

ROBERT C. DE VAULT.

Witnesses:

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A. HEATON MINNICK.