

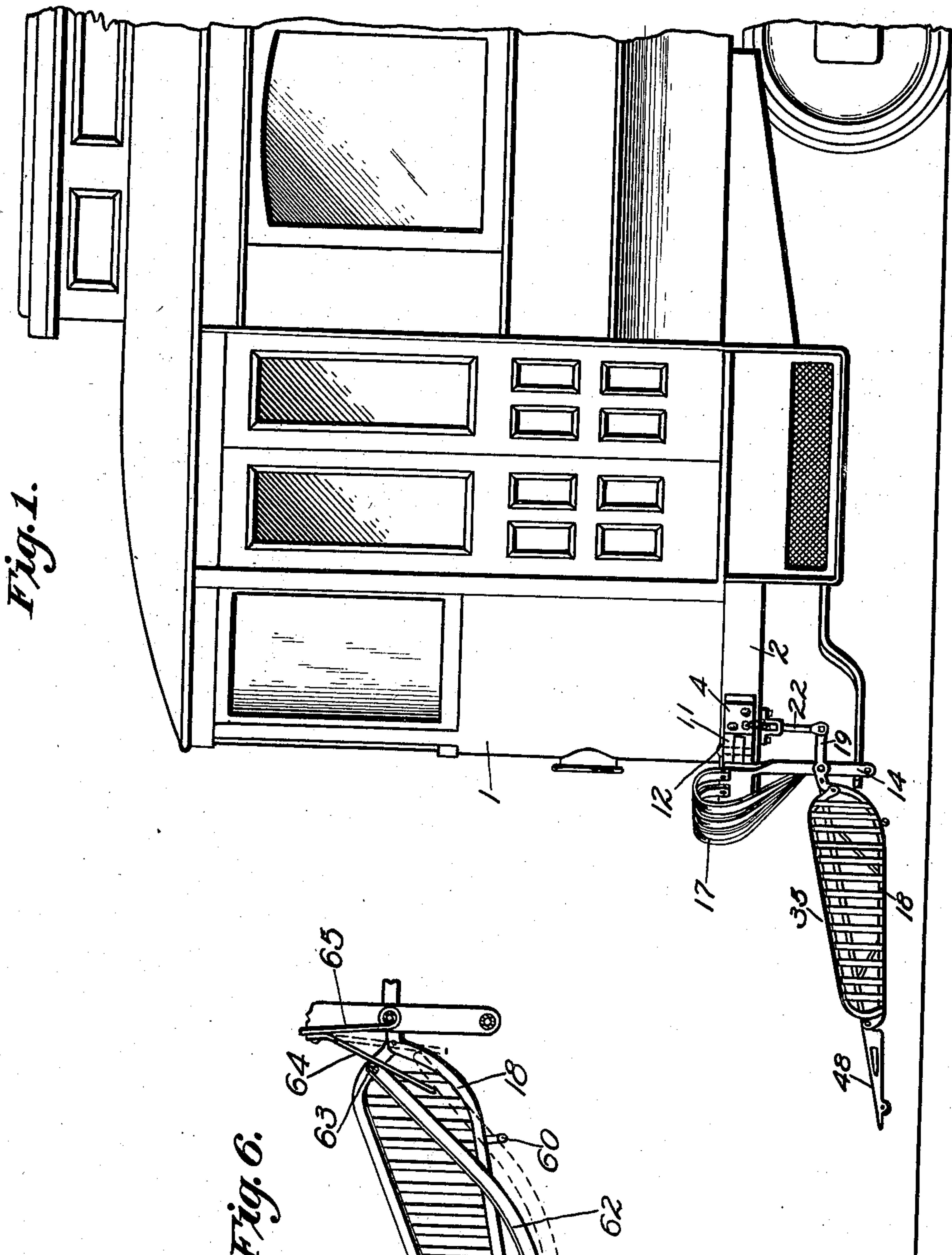
No. 847,437.

W. PICKETT.
CAR FENDER.

PATENTED MAR. 19, 1907

APPLICATION FILED FEB. 8, 1906.

3 SHEETS-SHEET 1.



Witnesses

*William J. Baldwin -
John H. Meild*

*Inventor,
William Pickett*

No. 847,437.

PATENTED MAR. 19, 1907.

W. PICKETT.
CAR FENDER.

APPLICATION FILED FEB. 8, 1906.

3 SHEETS—SHEET 2.

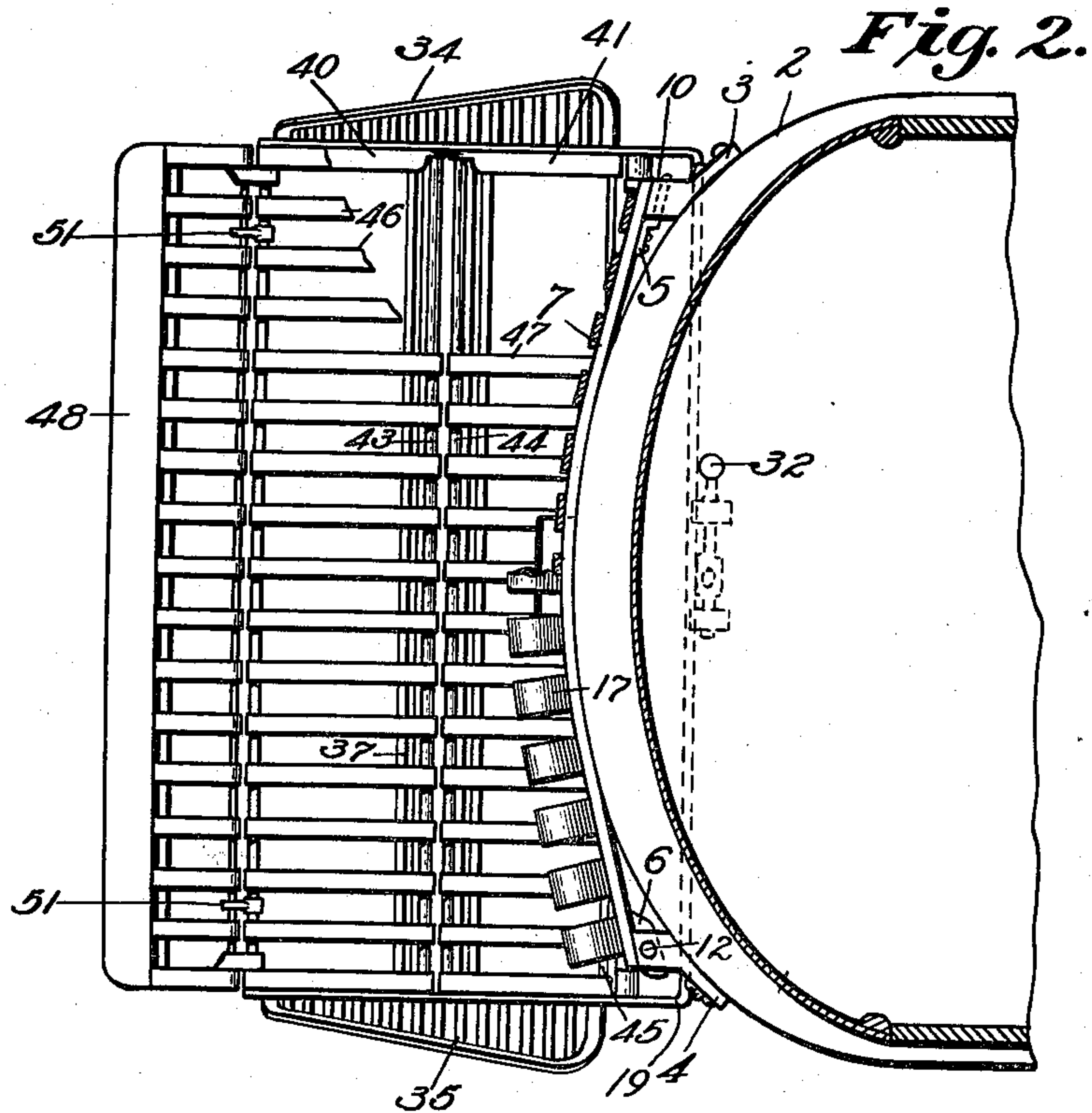
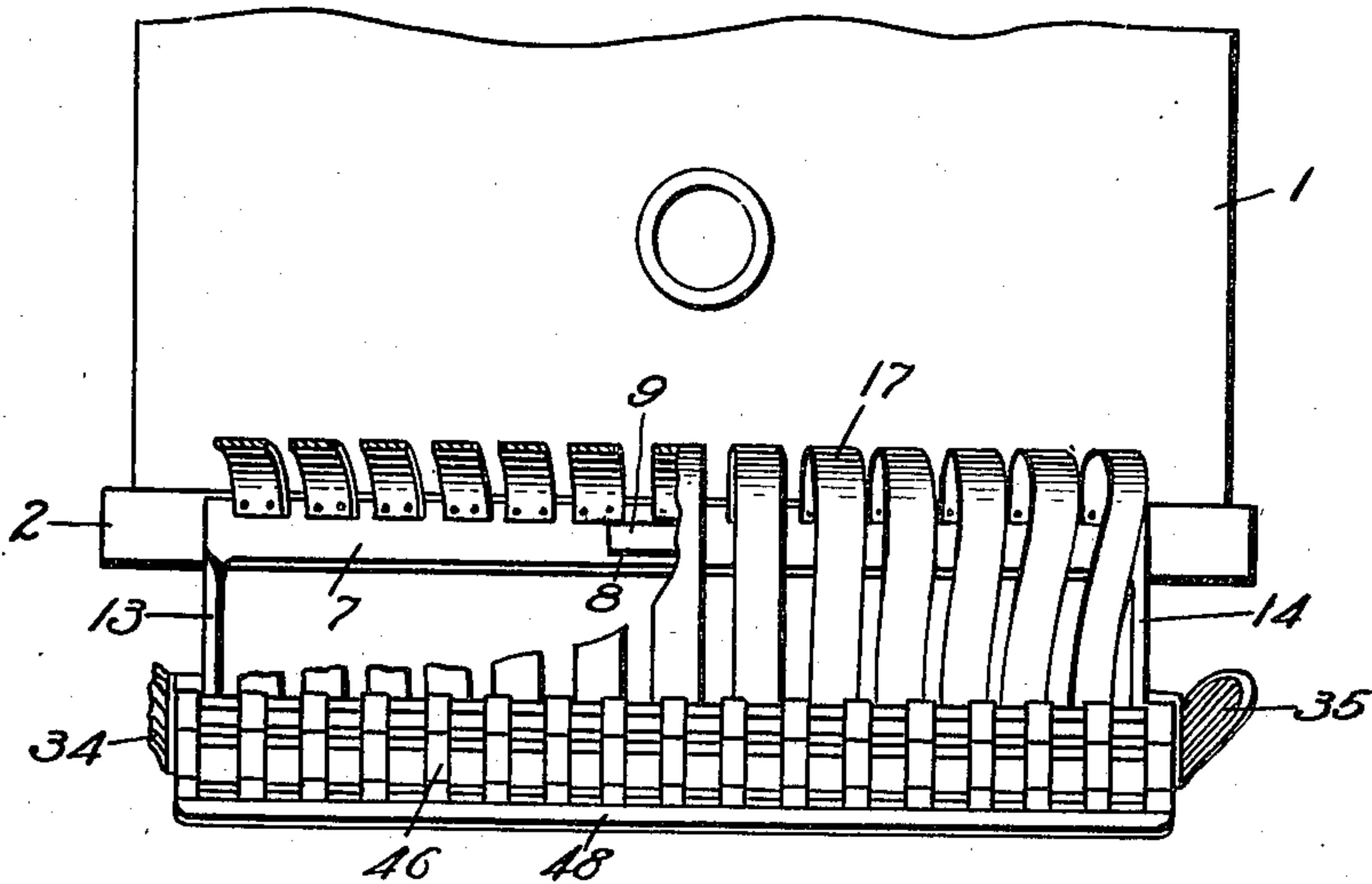


Fig. 3.



Witnesses:
William J. Baldwin
John H. Neild

Inventor,
William Pickett

No. 847,437.

W. PICKETT.
CAR FENDER.

PATENTED MAR. 19, 1907

APPLICATION FILED FEB. 8, 1906.

3 SHEETS—SHEET 3.

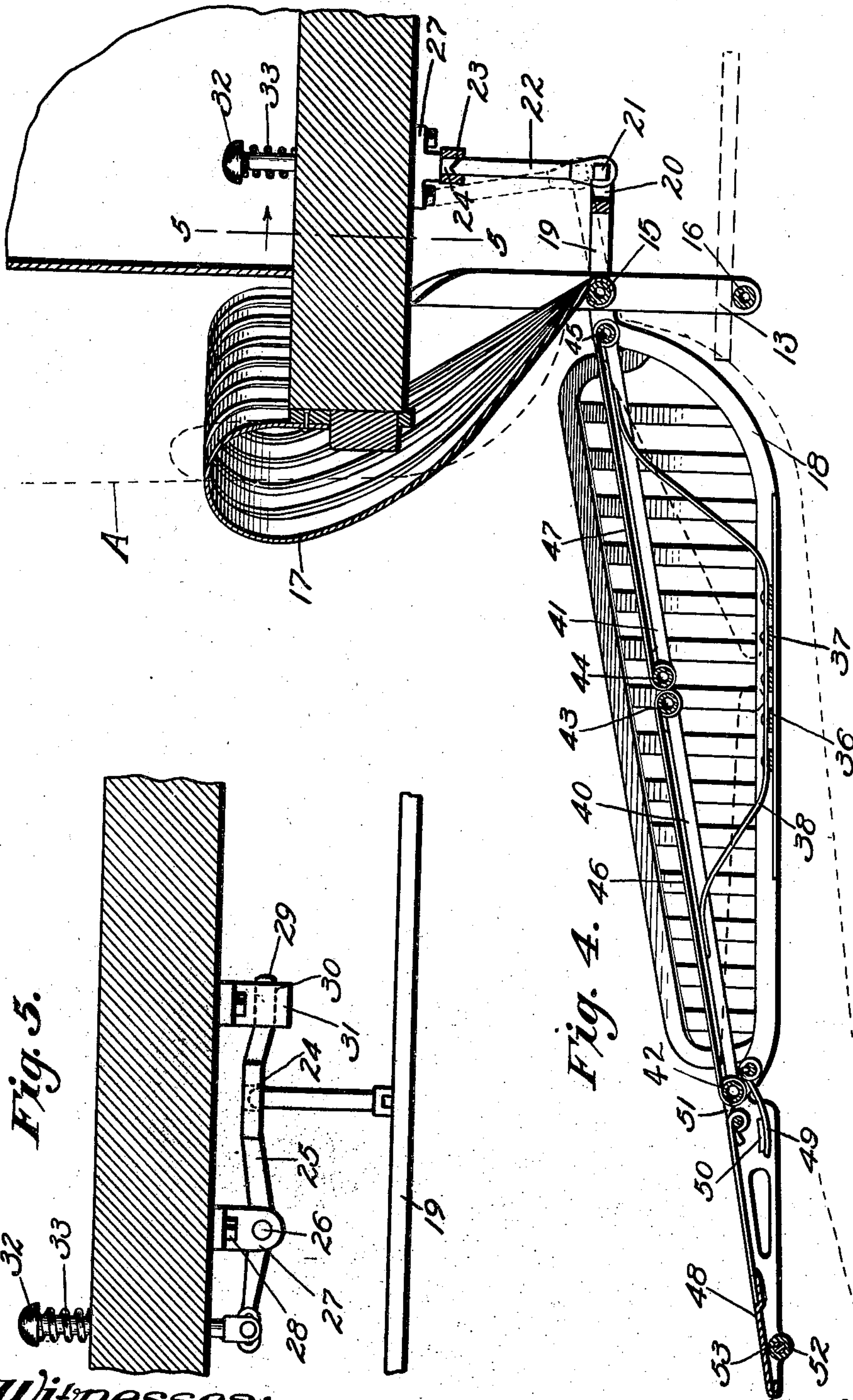


Fig. 5.

Fig. 4.

Witnesses:

William J. Baldwin
John H. Neild

Inventor,

William Pickett

UNITED STATES PATENT OFFICE.

WILLIAM PICKETT, OF LYNN, MASSACHUSETTS, ASSIGNOR OF ONE-HALF
TO WILLIAM B. MARSH, OF LYNN, MASSACHUSETTS.

CAR-FENDER.

No. 847,437.

Specification of Letters Patent.

Patented March 19, 1907.

Application filed February 8, 1906. Serial No. 300,030.

To all whom it may concern:

Be it known that I, WILLIAM PICKETT, of the city of Lynn, in the county of Essex, Commonwealth of Massachusetts, have invented a new and useful Improvement in Car-Fenders, of which the following is a full, clear, and exact description.

My invention relates to a car-fender, and has for its object the provision of a fender capable of being conveniently and expeditiously attached to or detached from any car.

An important feature of the invention is the construction of a fender in a simple and durable manner and at a minimum cost of manufacture.

One object of my invention is to provide means whereby a person, if run down or struck by a moving car, will be caught up and supported in a cushioned cradle and buffer without material injury.

Referring to the drawings and in detail, Figure 1 is a side elevation illustrating the car-fender in position. Fig. 2 is a top plan of the car-fender partially broken away. Fig. 3 is a front elevation with buffer member partially broken away. Fig. 4 is a longitudinal section illustrating the operating members of this device. Fig. 5 is a fragmentary view illustrating the actuating members, and Fig. 6 is an alternative construction illustrating a depressible cradle.

1 represents a car-body, 2 the supporting-frame. Located on the car-frame 2 are the fender-supporting lugs 3 and 4. Coöperating with the lugs 3 and 4 are the securing members 5 and 6. The securing members 5 and 6 are rigidly fastened to the curvilinear buffer-supporting strips 7 of the device. The member 7 is provided with an aperture 8, through which projects the bumper 9. This forms a central support for the member 7. The member 5 registers with an aperture 10, formed in the lug 3. The member 6 coöperates with the horizontal slot 11, formed in the lug 4. A pin is passed through the lug 4 and member 6, thus securely fastening them together.

The members 3, 4, and 9 serve to support the car-fender and also to absorb the thrust caused by the impact of an impinging body.

Integral with the supporting-strip 7 are the downwardly-extending arms 13 and 14, which support the circular transverse bars

15 and 16. Rigidly secured to the supporting-strip 7 and the transverse bar 15 are the spring-buffer members 17. Pivotaly secured to the transverse bar 15 exterior to the downwardly-extending arms 13 and 14 is the cradle-frame 18. One extremity of the cradle-frame 18 is formed in the shape of a yoke 19, integral with which is the lug 20. Rigidly secured to the lug 20 by means of a bolt 21 is an upwardly-extending arm 22. The upper extremity of the arm 22 is provided with an inclined surface 23, the purpose of which will be described hereinafter. Registering with the upwardly-extending arm 22 is an opening 24, formed in the lever 25. The lever 25 is fulcrumed on the bolt 26 in the downwardly-extending lug 27, secured to the car-frame 2 by means of bolts 28.

One extremity 29 of the lever 25 coöperates with a slot 30 in a downwardly-extending lug 31. By this construction the lever 25 is free to move vertically in order to allow the lever 22 to disengage from the lever 25. Oppositely disposed to the said extremity 29 of the lever 25 is secured the actuating-rod 32. This is held in its normal position by the spring 33.

Extending outwardly at approximately forty-five degrees and rigidly secured to the frame 18 are the side guards 34 and 35. The mid portion of the sides of the frame 18 are formed into angle-rods 36, which support a plurality of transverse bars 37. They are rigidly secured to said member 36. Superimposed on the transverse bars 37 are the leaf-springs 38, the extremities of which serve to flexibly support the oppositely-hinged members 40 and 41, which are normally in the raised position, as illustrated in Fig. 4.

Mounted on the hollow transverse bars 42, 43, 44, and 45 are a plurality of slats 46 and 47, possessing a suitable flexibility. Mounted on the transverse hollow bar 42 is an auxiliary extension-frame 48, which is held normally in a rectilinear position by the spring 49, which is secured to the frame 18 and coöperates with the lug 50. The upward movement of the auxiliary frame 48 is limited by the lug 51. At the outward extremity of the frame 48 is a roll 52, which is mounted on the rod 53. The said roll 52 contacts with the roadway at such times as the car-fender is released and drops.

Referring now to my alternative construc-

tion illustrated in Fig. 6, the frame 18 is provided with a transverse bar 60 of a circular cross-section adapted to pivotally receive a scoop-shaped cradle 61, provided with a plurality of longitudinally-flexible strips 62. Oppositely disposed to the transverse bar 60 is a similar transverse bar 63, which not only supports the longitudinally-flexible strips 62, but also coöperates with the leaf-spring member 64, which is rigidly secured to the vertical spring-buffer member 65. The downward movement is limited by the stop 66. By this construction a resilient effect is obtained by the cradle 61 when moved by any contacting body.

Under normal conditions the extreme forward end of the fender is approximately six inches above the rails. In an emergency when necessary to make use of this device the operator depresses the vertical rod 33, whereby the upwardly-extending arm 22 is allowed to move freely forward. This permits the rolls 52 to contact with the road-bed. The entire fender is now locked in operative position, as illustrated by the dotted position of the arm 22, Fig. 4.

Should the fender be in the normal position upon striking an object, the auxiliary member 48 is adapted by the above-described construction to be depressed, whereby an approximately same result will be obtained as if the fender had been released. Also by the above-described construction as a body impinges on the main fender a valuable cushioning effect is obtained. Serious horizontal impact is cared for by means of the buffers 17.

The dotted line A illustrates the facility with which the fender can be moved from an operative to a closed position. The entire fender can be removed from the car by simply extracting the retaining-pin 12, when the fender can be given a movement of rotation about the slot 10 as a center, then a movement of lateral translation from the said slot, when the entire fender will be free to be deported. A reverse of this method is used to attach the fender to the car.

On account of the simplicity and ease of this operation it is entirely practicable to use but one fender on a car and to change it from one end to the other when the direction of movement of the car is reversed.

In accordance with the provisions of the patent statutes I have described the principle of operation of my invention, together with the apparatus which I now consider to represent the best embodiment thereof; but I desire to have it understood that the apparatus shown is only illustrative and that the invention can be carried out by other means.

What I claim as new, and desire to secure by Letters Patent of the United States, is—

1. In a car-fender, the combination of a frame, a pivot for supporting the frame at one end, a manually-actuated device for re-

leasing the frame and permitting it to assume an operative position, and a yielding bottom for said frame comprising a hinged member arranged to yield in a downward direction, and a spring for normally holding the said member in a raised position.

2. In a car-fender, the combination of a cradle having a main frame, a pivot for supporting the cradle, an auxiliary frame carried by the front end of the main frame, a pivot for connecting the main and auxiliary frames, a spring tending to lift the auxiliary frame with respect to the main frame, and a stop for limiting the upward movement of the auxiliary frame.

3. In a car-fender, the combination of a cradle having a main frame, a pivot for supporting the frame, an auxiliary frame carried by the main frame, means for yieldingly supporting the auxiliary frame, a lock for holding the main and auxiliary frames in a raised position, and a means for releasing the lock and permitting the frames to drop into an operative position, the auxiliary frame riding over the surface of the road-bed.

4. In a car-fender, the combination of a pivotally-supported frame, side guards carried thereby, a bottom for the frame adapted to yield downwardly and comprising oppositely-hinged members, a spring for normally raising the members, and an auxiliary frame yieldingly supported by the front end of the main frame.

5. In a car-fender, a pivotally-supported frame, side guards carried thereby, in combination with a flexible buffer-strip secured to the pivot-bar at one extremity, the opposite extremity being attached to the main supports.

6. In a car-fender having a main supporting-strip with downwardly-extending arms integral therewith, in combination with a pivotally-secured frame having a suitable locking device.

7. In a car-fender having a main supporting-strip with downwardly-extending arms integral therewith, in combination with a pivotally-secured frame, one extremity of which is provided with an upwardly-extending arm adapted to engage with a latch held normally in position by a spring.

8. In a car-fender, a cradle having a frame, a pivot engaging the frame for supporting the cradle composed of opposite hinged members, said members coöperating with a transverse shaft or stop, said shaft being rigid with the frame and said frame having a suitable locking device.

Signed at Lynn, Massachusetts, this 1st day of February, 1906.

WILLIAM PICKETT.

Witnesses:

DUGALD McK. McKILLOP,
FRANK G. HATTIE.