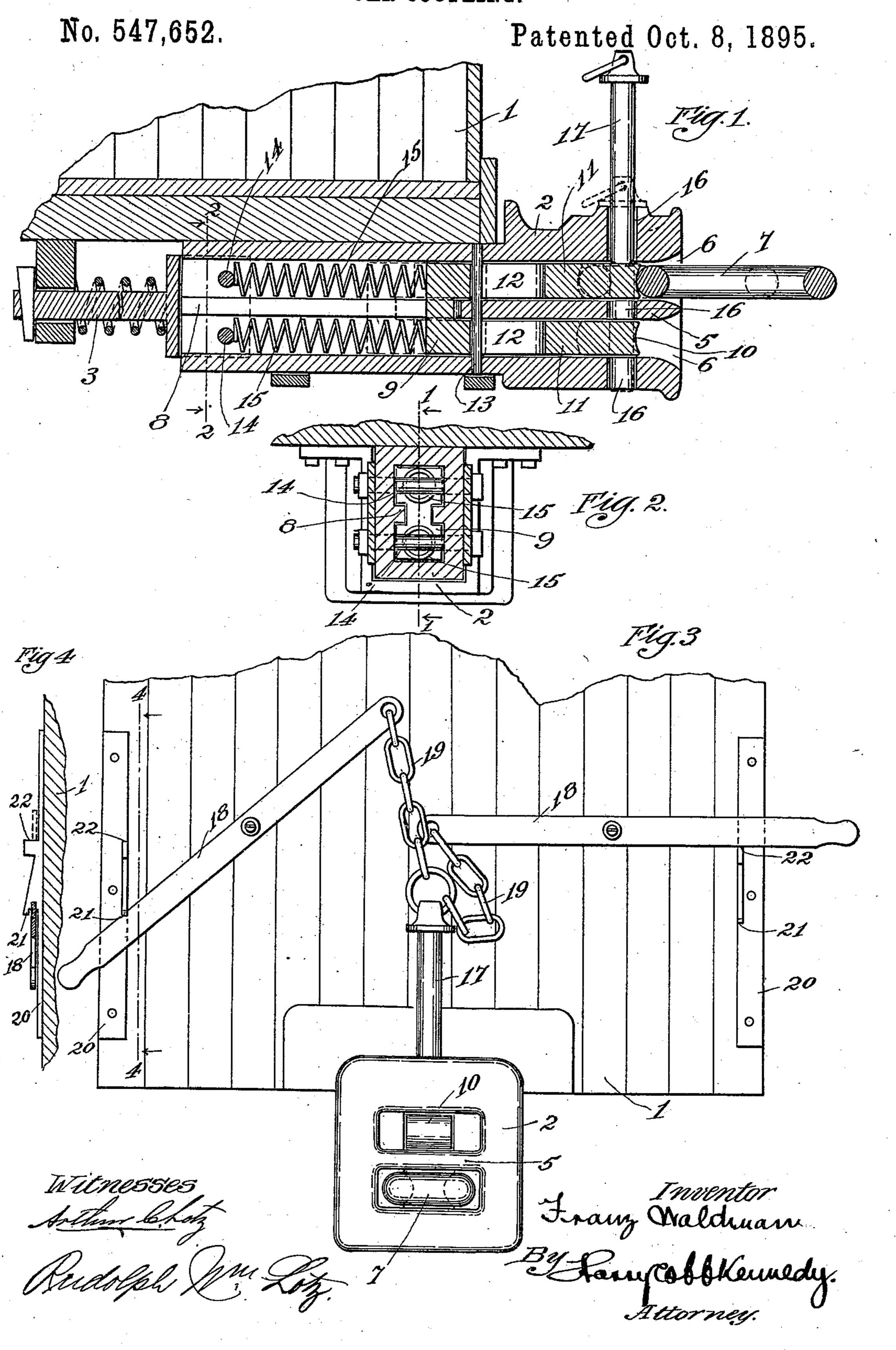
F. WALDMAN.
CAR COUPLING.



United States Patent Office.

FRANZ WALDMAN, OF STREATOR, ILLINOIS.

CAR-COUPLING.

SPECIFICATION forming part of Letters Patent No. 547,652, dated October 8, 1895.

Application filed August 9, 1894. Serial No. 519,794. (No model.)

To all whom it may concern:

Be it known that I, FRANZ WALDMAN, a citizen of the United States, residing at Streator, in the county of La Salle and State of Illinois, have invented certain new and useful Improvements in Car-Couplers; 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.

This invention relates to a novel construction in a car-coupler, the object being to provide a car-coupler in which the coupling-pin can be readily held in position and allowed to drop when the link of a companion coupler enters the draw-head and without manual aid.

The invention consists in the features of construction and combinations of parts hereinafter fully described and specifically claimed.

In the accompanying drawings, Figure 1 is a longitudinal vertical section of a car-coupler constructed in accordance with my invention and taken on the line 1 1 of Fig. 2. Fig. 2 is a cross-section taken on the line 2 2 of Fig. 1.

Fig. 3 is a fragmentary end elevation of a car provided with a coupler constructed in accordance with my invention. Fig. 4 is a fragmentary vertical section taken on the line 4 4 of Fig. 3.

Referring now to said drawings, 1 indicates a car, and 2 the draw-head. Exteriorly said draw-head is of familiar construction and is secured to the bottom of the car in a familiar manner and provided with the buffer 3. The 35 forward end of the draw-head is provided with a horizontal partition 5, which divides the opening in the end of the draw-head in two parts 6, located one above the other, so that the link of the companion coupler can enter 40 either of said openings, according to its elevation. The said partition 5 is rounded or tapered at its forward end to deflect the link 7 into either of the openings. The said partition 5 extends rearwardly about half the length of 45 the draw-head, as shown in Fig. 1, and from the rear end of this partition and on the side walls of the draw-head are two ribs or guides 8, located in alignment with the partition, as shown in Figs. 1 and 2. Located within the 50 draw-head is a follower 9, that consists of two arms 10, that are located within the respective openings 6 of the draw-head and l

are connected in the rear of the partition 5, as shown in Fig. 1, the whole being preferably cast integrally, while the rear end of said 55 follower is provided with guide-grooves that receive the guides 8. In this way it will be seen that the follower can slide back and forth within the draw-head, and to limit the movement of the same I provide upright slots 12 60 in said arms 11, through which a pin 13 passes that is secured to the top and bottom pieces of the draw-head. Near the rear end of the draw-head and extending across the same are two pins 14, and between these pins and the 65 rear end of the follower springs 15 are located, which, acting by expansion, hold the follower under tension at the forward limit of its movement. When the follower is at the forward limit of its movement, the arms 11 cover the 70 opening 16, through which the coupling-pin passes, said opening 16 extending, of course, through the partition 5, as shown in Fig. 1.

I have shown in Fig. 1 the parts of my coupler and the position they will assume when the 75 coupling is to be made—that is to say, with the follower at the forward limit of its movement and the pin 17 located within the opening 16 at the upper side of the draw-head and resting upon the upper arm 11 of said follower. 80 As the link 7 approaches and enters the opening in the draw-head it will engage the forward end of one of the arms of the follower and force the same to the rear against the tension of the springs 15, as shown in dotted lines 85 in said Fig. 1, and when the end of the link passes the end of the pin 17 said pin will drop into position, as will be obvious. I have also provided convenient devices for lifting the pin and holding it in an elevated position. 90 Said devices consist of a lever 18, pivoted upon the front end of the car and having its inner end connected, preferably, by a chain 19 with the upper end of the pin 17. To the side of the car a holding-plate 20 is secured, having 95 two stops 21 and 22, with either of which the free end of the lever can be engaged. For instance, if it is desired to prevent the pin from dropping, the free end of the lever can be hooked under the lower stop 21, which will 100 hold the pin in an elevated position, as shown, while, on the other hand, if the free end of the lever is moved up and engaged with the upper stop 22, the other end of the lever will

be so depressed as to permit the pin to descend. The car may be provided with these levers on both sides, whereby the coupling, as well as the uncoupling, can be accomplished from the other side of the car, as will be obvious, for it is only necessary to pull down the free end of the lever to lift the coupling-pin.

From the foregoing description it will be seen that I provide an inexpensive and durable car-coupler which obviates the necessity of the switchman standing in front of the end of the car to set the pin, to uncouple the car, or to drop the pin. It will also be seen that my invention can be applied to the ordinary caring a spring 15 and single arm 11 therein and inserting a pin 13 through the slot 12 in such arm.

I claim as my invention—

o In a car coupler the combination with the car, of a longitudinally movable draw-head having two link-sockets separated by a hori-

zontal partition 5, a longitudinally movable follower within the draw-head having two parallel and longitudinally extending arms 25 adapted to work within the respective link-sockets, said arms being slotted vertically and longitudinally, a stop pin extending vertically through the draw-head, through the partition therein, and through the slotted arms of the 30 follower, a spring to press the follower forward, and a coupling pin working vertically through the draw-head, the parts being constructed and arranged to sustain the coupling pin in its elevated position and to permit the 35 follower to be pressed back to release the coupling pin.

In testimony whereof I affix my signature

in presence of two witnesses.

FRANZ WALDMAN.

Witnesses:

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CARL REINHARDT, THEO. ROCKENFELLER.