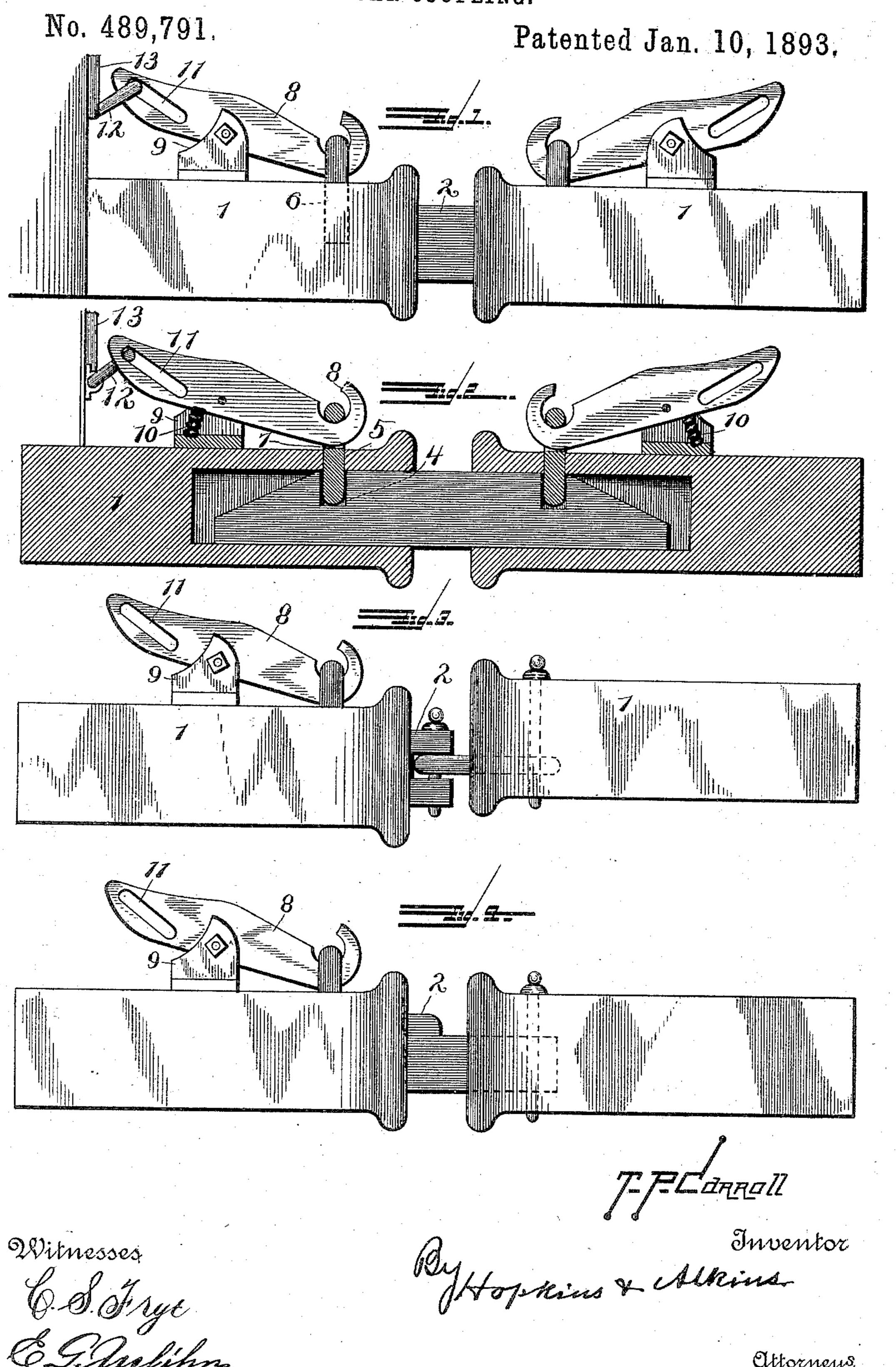
## T. P. CARROLL. CAR COUPLING.



## United States Patent Office.

THOMAS P. CARROLL, OF FRANKLIN FURNACE, NEW JERSEY.

## CAR-COUPLING.

SPECIFICATION forming part of Letters Patent No. 489,791, dated January 10, 1893.

Application filed October 13, 1892. Serial No. 448, 751. (No model.)

To all whom it may concern:

Be it known that I, THOMAS P. CARROLL, of Franklin Furnace, in the county of Sussex, State of New Jersey, have invented certain new and useful Improvements in Car-Couplers, of which the following is a specification, reference being had the accompanying drawings.

The object of my invention is to produce an improved coupler that may be operated by an attendant from the side of the car body without the danger of being crushed between the cars.

In the accompanying drawings: Figure 1 is a side elevation of a pair of my couplers; Fig. 2 is a central, vertical section of the same; Fig. 3 shows a form of coupler adapted to be used to couple a car provided with one of my couplings, and a car of ordinary construction and higher than the car provided with my coupler; Fig. 4 is view of a link designed to be used under like circumstances, when the ordinary car is of the same level as the one equipped with my coupler.

Referring to the figures on the drawings:
1 indicates a draw-head and 2 a link, having
at opposite ends a beveled edge and having
notches or recesses 4 near each extremity,
with which a flat tongue, analogous to an ordinary pin, may engage. The tongue is preferably a broad, flat piece which moves, through
a recess 5 in the top of the draw-head, in the
channel 6 upon opposite sides thereof. It
is preferably rounded at its lower edge and
is provided with an aperture 7 at its upper
edge, with which a hook 8, pivoted to a support 9, is adapted to engage and by which it
may be readily lifted through the aperture 7
and out of the way of the tongue.

one end in the bottom of the projection 8 and bearing at the other end against the hook, whereby it presses the hook against the tongue and drives the latter, yieldingly, toward the draw-head.

11 indicates an eccentric slot in the inner end of the hook whereby it may be tilted upon the pivot by means of a crank 12 extending from it toward the side of the car and terminating in a handle 13.

In operation, a link may be inserted into one end of the draw-head by forcing the opposite end of the other draw-head against it, when the beveled end of the link, pressing against the tongue, lifts it until it reaches 55 the recess in the end of the link when, under the impulse of its spring, it enters the recess and securely fastens the link in place.

As illustrated in Figs. 3 and 4, the link is identical with the one designed to be used 60 with cars equipped with my coupler, by having provision made in them for coupling the cars equipped with ordinary couplers.

What I claim is:-

1. In a car coupler, the combination with 65 the draw-head, having a link therein, with a notch, a tongue passing through an opening in the draw-head and adapted to engage the notch of a spring support on said draw-head with a hook end for engaging the tongue, and 70 means at the inner end of the support for raising the tongue, substantially as specified.

2. In a car coupler, the combination with the draw-head a link therein having beveled edges, at opposite ends, a notch in said link, 75 a tongue passing through an opening in the draw-head and adapted to engage the notch, of a pivoted spring support on said draw-head with a hook end for engaging the tongue, and an eccentric slot in the inner end of the 80 support, and means in said slot for raising said support, substantially as specified.

In testimony of all of which I have hereunto subscribed my name.

THOMAS P. CARROLL.

Witnesses:

MARCUS BRINK,

MATTHEW FLOOD,