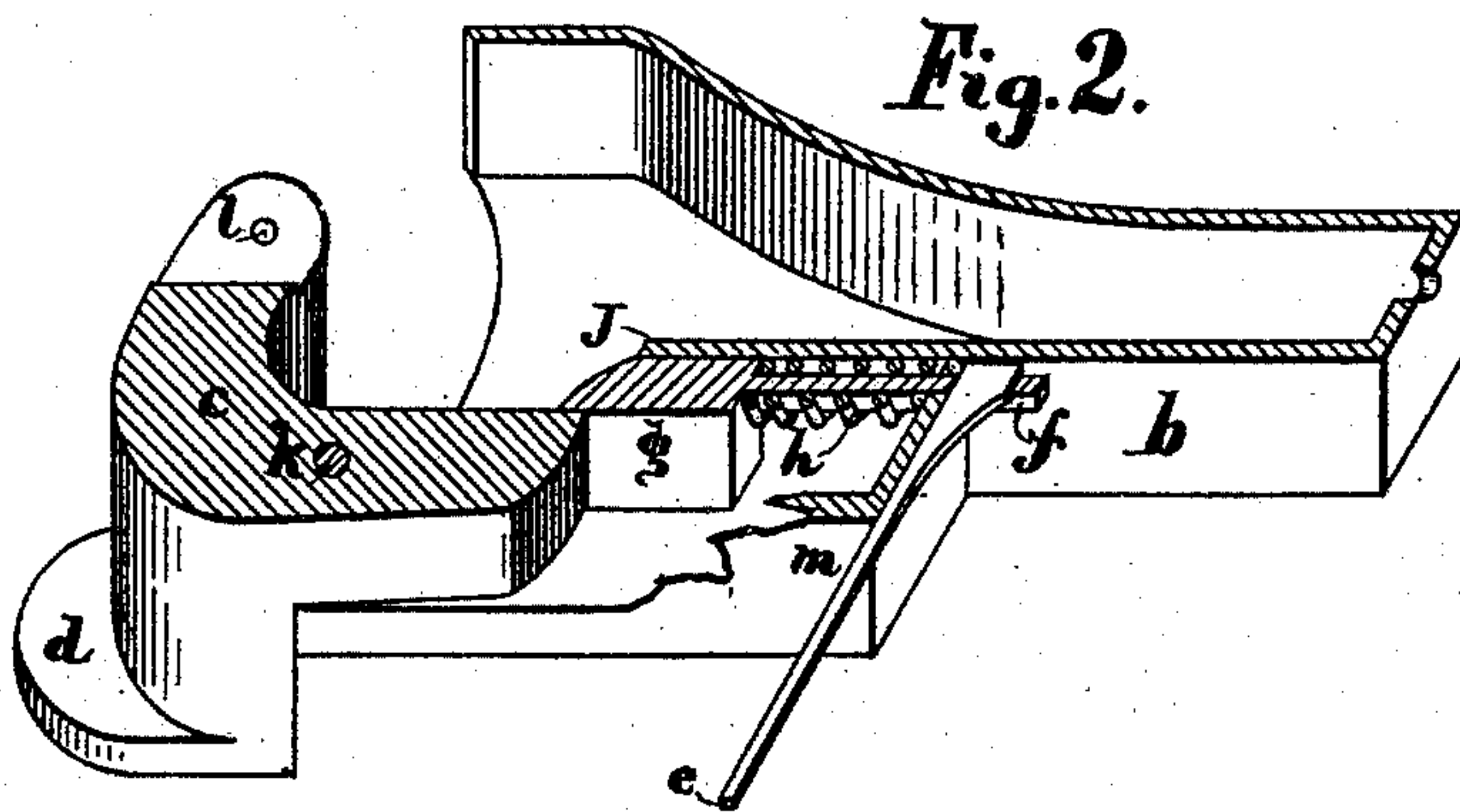
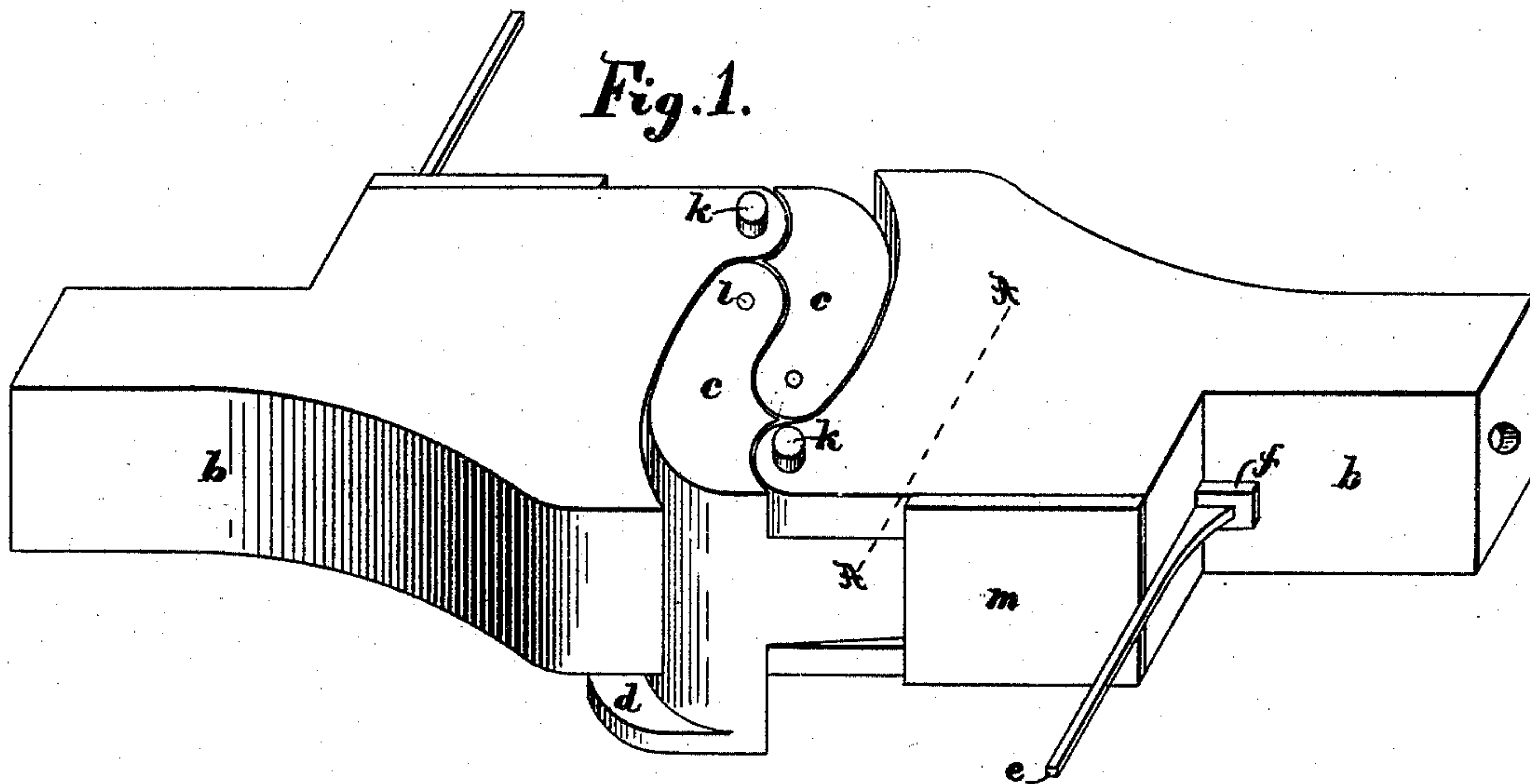


(No Model.)

H. LESLY.  
CAR COUPLING.

No. 477,561.

Patented June 21, 1892.



Witnesses.  
George M. Woodward  
Harry M. Turner

Inventor.  
Harry Lesly

# UNITED STATES PATENT OFFICE.

HENRY LESLY, OF BIRMINGHAM, ALABAMA.

## CAR-COUPLING.

SPECIFICATION forming part of Letters Patent No. 477,561, dated June 21, 1892.

Application filed January 29, 1892. Serial No. 419,723. (No model.)

*To all whom it may concern:*

Be it known that I, HENRY LESLY, a citizen of the United States, residing at Birmingham, in the county of Jefferson and State of Alabama, have invented a new and useful Improvement in Car-Couplers, of which the following is a specification.

My invention relates to improvements in self-couplers; and the object of my improvement is: first, to provide a coupler that will be self-connecting by two cars coming in contact with each other; second, for uncoupling while there is a strain upon the coupler without going between the cars; third, to provide a hook of such form as to prevent draw-heads from falling to the ground when pulled out by breakage or other accident. I attain these objects by mechanism illustrated in the accompanying drawings, in which—

Figure 1 is an isometrical view of a pair of couplers connected, as in use. Fig. 2 is an isometrical sectional view of Fig. 1 at dotted lines A A, showing the special form and construction of internal mechanism.

Similar letters refer to similar parts throughout the several views.

*b* is a cast-metal casing cored to receive lock-block *g*, with rod *f*, (connected therewith or made a part thereof,) and coupling-hook *C* and spring *h*, furnished with partition or wall *J*.

*C* is a cast hook with a slot and hole *l*, as shown in Fig. 2, for holding ordinary link and pin, when used in connection with old-fashioned link draw-heads, and swings on pin *k* when disengaged from block *g* in order to uncouple from draw-head of corresponding form, also furnished with lip or extension *d* at its lower extremity.

*d* is a lip or extension at the lower extremity of hook *C* for the purpose of preventing opposite draw-head from falling to the ground in case of draw-bolt breaking or an accidental loosening from car.

*e* is a lever passing through a slot in rod *f* and held in place by a pin or bolt through end

next to casing *b* for the purpose of disengaging block *g* and hook *C* when uncoupling, and is operated by pressing forward at end farthest from casing in the direction of hook *C*, the edge of cover *m* acting as a fulcrum, thus compressing spring *h* and drawing block *g* from hook *C*, releasing same, which swinging on pin *k* will uncouple from opposite draw-head. In coupling, the opposite draw-heads coming in contact with each other, the hooks *C* being disengaged from blocks *g* and swung outward, press each other toward the center, the back end of hook *C* presses against a correspondingly rounded or beveled end on block *g*, forcing the same in the direction of spring *h*, which it compresses until they can pass each other, when spring *h* expands, returning block *g* to its former position, holding hook *C* locked until released by means of lever *e*.

I am aware that prior to my invention, couplers have been made that were self-acting and could be released without going between the cars. I do not therefore claim such a combination, broadly; but

What I do claim as my invention, and desire to secure by Letters Patent, is—

1. In a car-coupler, the hook *C*, formed with a lip or extension that will prevent the opposite draw-head from falling to the ground when accidentally drawn from the opposite car.

2. The combination, in a car-coupler, of the lever *e*, operated by a forward movement over a short fulcrum to obtain increased leverage for uncoupling under strain, with block *g* and rod *f*.

3. In a car-coupling, the block *g*, provided with the beveled front face and the plain rear face corresponding in width with the tail of the hook, in combination with the wall *J* within the coupling-head and the spiral spring *h* and suitable means for actuating the said block, all substantially as described.

HENRY LESLY.

Witnesses:

GEORGE M. WOODWARD,  
HARRY M. TURNER.