

L. F. BUSCHMANN.

Car Coupling.

No. 99,632.

Patented Feb. 8, 1870.

Fig: 1.

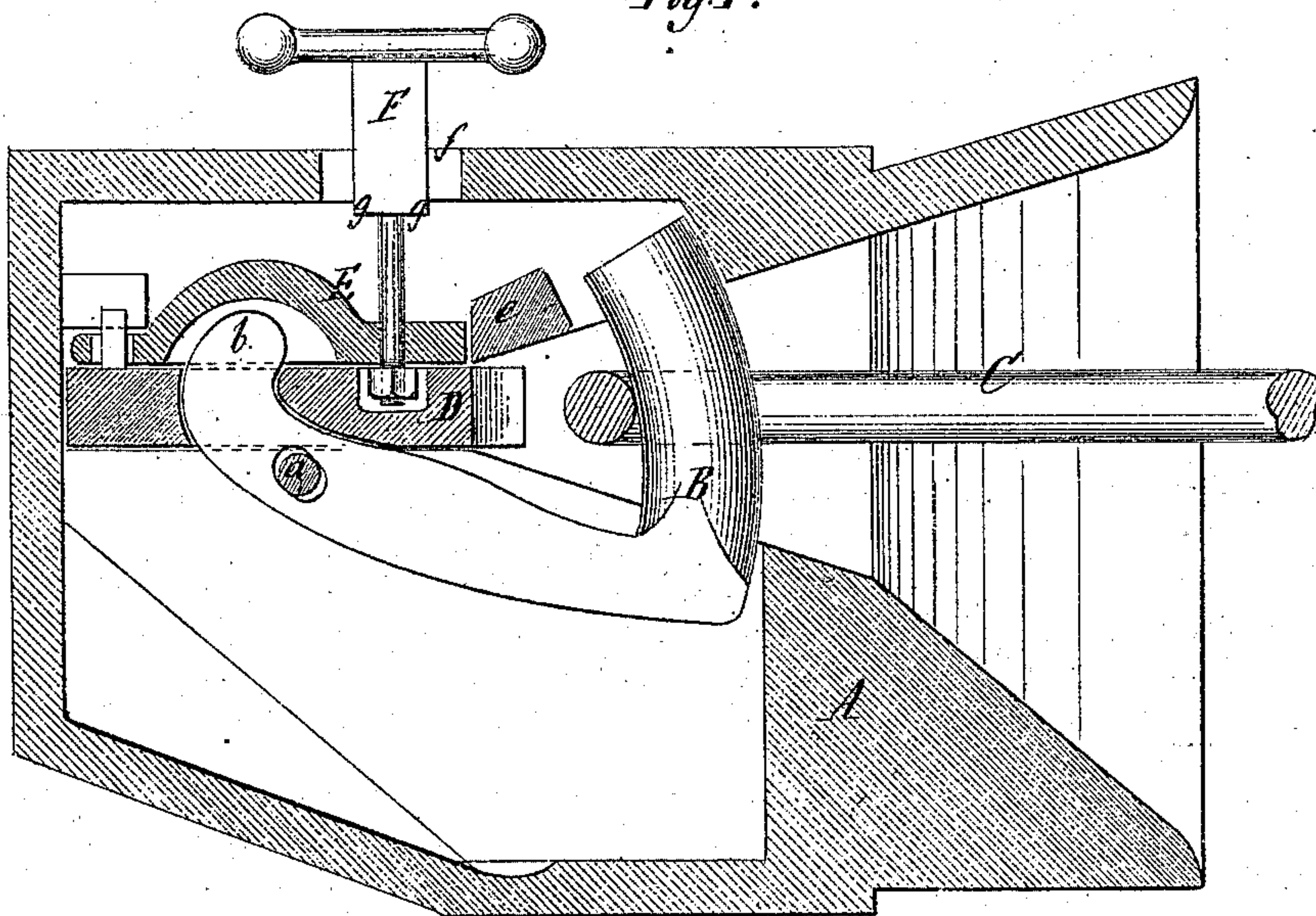
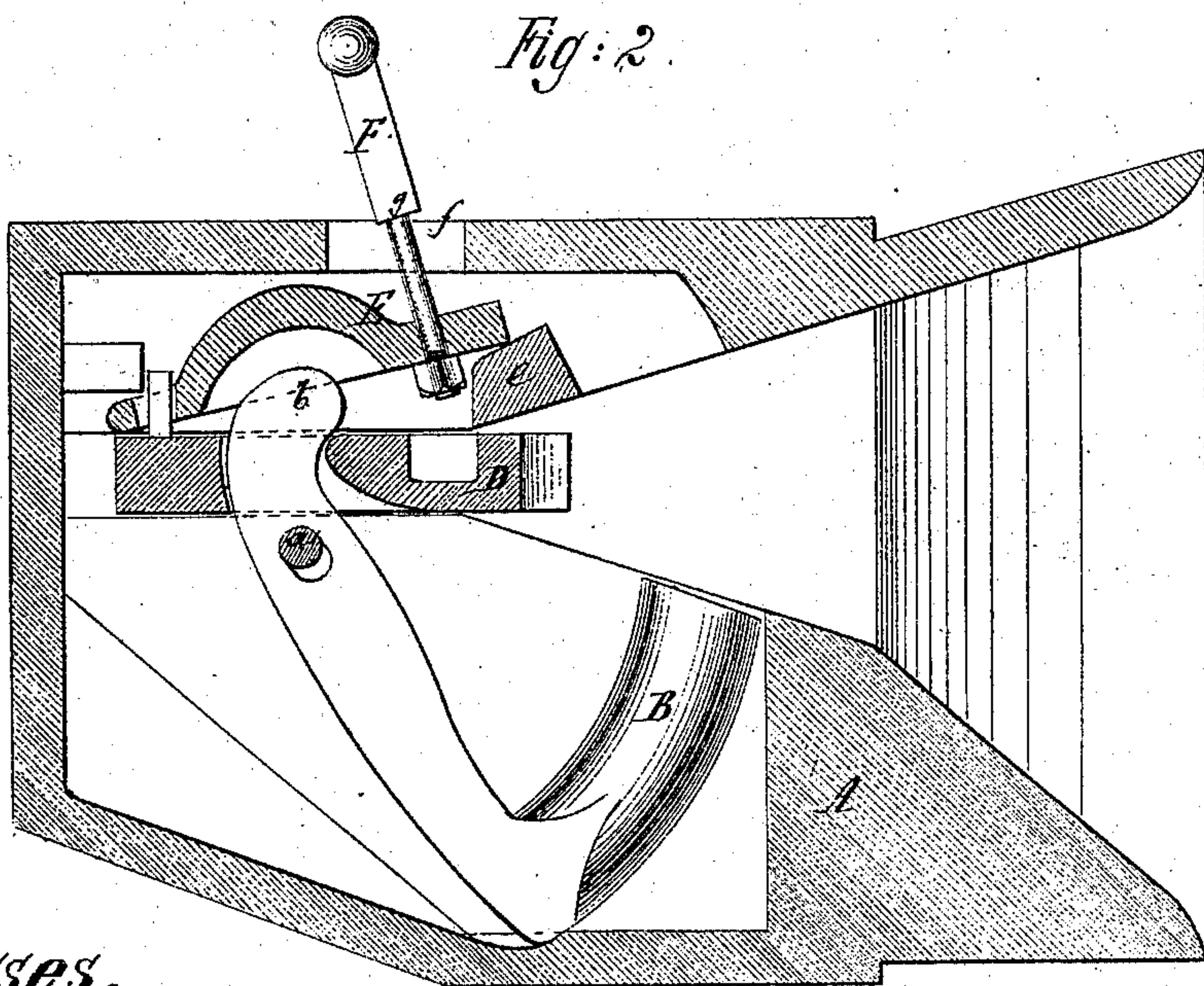


Fig: 2.



Witnesses.

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LEOPOLD F. BUSCHMANN, OF NEW YORK, N. Y.

Letters Patent No. 99,632, dated February 8, 1870.

IMPROVED RAILWAY-CAR COUPLING.

The Schedule referred to in these Letters Patent and making part of the same

To all whom it may concern:

Be it known that I, LEOPOLD F. BUSCHMANN, of the city, county, and State of New York, have invented a new and improved Car-Coupling; and I do hereby declare the following to be a full, clear, and exact description thereof, which will enable those skilled in the art to make and use the same, reference being had to the accompanying drawing, forming part of this specification, in which drawing—

Figure 1 represents a longitudinal vertical section of this invention when the cars are coupled.

Figure 2 is a similar section of the same when the cars are uncoupled.

Similar letters indicate corresponding parts.

This invention consists in the arrangement of a hook, which is hinged to the draw-head, and acted upon by a slide fitted into the draw-head and catching over the tail end of the hook, in such a manner, that by the action of the link or shackle-bar on the slide, the hook is raised and caused to retain the link, and when the slide is released, the hook drops down, and the link is freed.

With the slide is combined a locking-catch, which retains the same, together with the hook, in their locking-position, and which can be operated by a handle from the top of the draw-head, in such a manner that when the catch is in its locking-position, the hook is prevented from releasing the link automatically, and when the catch is in its unlocking-position, the hook is free to drop and release the link.

In the drawing—

The letter A designates a draw-head, which is constructed and attached to the cars in the usual manner.

In the interior of this draw-head is secured a hook, B, which oscillates on a pivot, *a*, passing transversely through the draw-head, in such a position that if the link C is pushed into the draw-head, and the hook B is raised, it will catch in and retain said link.

From the inner end of the hook B extends a tail, *b*, through a mortise in the slide D, which is fitted into the draw-head, and free to slide back and forth in the direction in which the link moves in and out; and, if the link is pushed into the draw-head, it strikes the slide and pushes the same back, and, by the action of the slide on the tail of the hook, said hook is raised and caused to catch in the link.

To the top of the slide D is secured a locking-catch, E, which is operated by a handle, F, projecting through the top of the draw-head.

When the slide D is pushed back, the catch E drops down behind a stop, *e*, which is cast solid with the draw-head, and the slide is retained in the position shown in fig. 1.

By the action of the slide, the hook B is retained in its locking-position, and the link C is prevented from getting disengaged. By raising the catch E, so that it clears the stop *e*, the slide D is released, and the hook B is free to drop down to the position shown in fig. 2.

The catch E, as shown in the drawing, is a simple plate, provided with a mortise, which drops over a lug rising from the slide D; but it is obvious that the form and construction of this catch could be changed in various different ways.

The handle F projects up through an oblong mortise, *f*, in the top of the draw-head, and its shank is provided with two shoulders, *g*, so that by raising the handle and then turning it, these shoulders can be made to catch over the edges of the mortise *f*, thereby retaining the catch E in the position shown in fig. 2.

If two cars are to be coupled, the link is secured in the draw-head of one car, while the hook B in the other car is let down to the position shown in fig. 2. As the link enters this last-named draw-head, the slide D is pushed back, the hook B is raised, and the catch E drops behind the stop *e*, bringing all the parts to the position shown in fig. 1.

If the cars are to be uncoupled, the handle F is raised and turned, so as to suspend the catch E in the position shown in fig. 2, and the hook B drops down and releases the catch.

The hole in the hook B, through which the pivot *a* passes, is oblong, so that as said hook is raised, the strain of the link will draw it up against the shoulders *h h*, in the interior of the draw-head, and thereby the pivot *a* is relieved from all strain.

The slide D, when being pushed back, strikes the rear wall of the draw-head, and thereby the tail end of the hook is relieved from all injurious effects which might be produced by the powerful action of the link against the slide.

Having thus described my invention,

What I claim as new, and desire to secure by Letters Patent, is—

1. The combination of the hook B, slide D, and locking-catch E, with the draw-head A.

2. The handle F, provided with shoulders *g g*, in combination with the draw-head A, catch E, stop *e*, slide D, and hook B, substantially as set forth.

This specification signed by me, this 7th day of July, 1869.

LEOPOLD F. BUSCHMANN.

Witnesses:

W. HAUFFE,

E. F. KASTENHUBER.