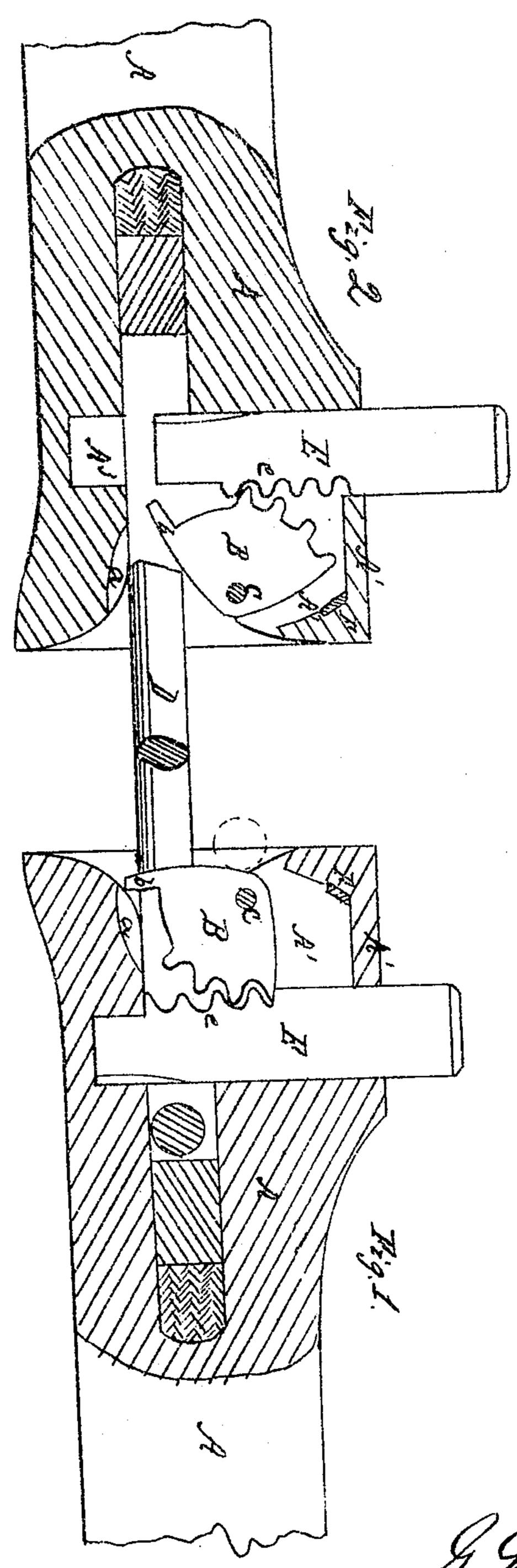
# G.M. Haynie. Car-Coupling.

Nº 75420

Patented Mar. 10, 1868



Jamesses. Jamesses. Jamesses. Jamesses. Inventor. I It. Hay mie By Angholdor Altorneys.

# Anited States Patent Pffice.

## G. W. HAYNIE, OF OLNEY, ILLINOIS.

Letters Patent No. 75,420, dated March 10, 1868.

#### IMPROVED CAR-COUPLING.

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

### TO ALL WHOM IT MAY CONCERN:

Be it known that I, G. W. HAYNIE, of Olney, in the county of Richland, and State of Illinois, have invented a new and useful Improvement in Car-Couplings; and I do hereby declare the following to be a full, clear, and exact description of the same, reference being had to the accompanying drawing, which is made a part of this specification.

My invention relates to that class of car-couplings termed "self-couplers," and consists in raising the coupling-pin (which is in the form of a rack) by means of a segmental pinion, operated by the coupling-link. In the drawing my invention is represented by a longitudinal section of a pair of contiguous draw-heads—

Figure 1 of which shows the several parts in their normal or coupled condition, and

Figure 2 shows the pin being raised by the coupling-link.

A represents the draw-head, which may be of any suitable form, in the cell or chamber  $A^1$ , in the top of the flaring mouth of which the segmental cam-pinion B is suspended on the pivot C; the point at which this pivot is placed being such that the link D in entering the cam will not fail to strike the pinion below it, so as to revolve the pinion without straining its pivot, as represented by the dotted circle in fig. 1. The pinion B, in addition to a sufficient number of cogs to raise the pin or key, has an arm or cog, b, the outer edge of which forms a part of the face of the cam, and which is of sufficient length to rest on the link until it passes under the pin, the draw-head being cut out, when necessary, as shown at a, to allow such formation. E represents the coupling-pin or key, the front of which forms a rack, e, corresponding with the cogs of the pinion B, by which it is raised. This pin passes through a corresponding opening in the top,  $A^2$ , of the draw-head A, and its lower end rests in the socket  $A^3$  of said draw-head.

The interior of the draw-head is provided with the ordinary buffer spring, and, to provide against any possibility of the end of the segmental pinion, by a sudden stroke, being thrown against the front wall of the cell A<sup>1</sup>, it is there provided with a spring, F, which would lessen the liability of the cogs being broken off by the stroke, and, at the same time, enable the pinion to more expeditiously regain its former position. The coupling-pin E may be provided with a ring, or any suitable attachment, by which to raise it.

Having thus described my invention, what I claim as new, and desire to secure by Letters Patent, is-

1. The combination of the segmental cam-pinion B b, and coupling-pin E e, when the same are adapted to be operated by the coupling-link, substantially as described.

2. The spring F, applied and operating substantially as and for the purpose specified.

G. W. HAYNIE,

Witnesses:

W. H. WILLIAMSON, FRANK POWERS.