

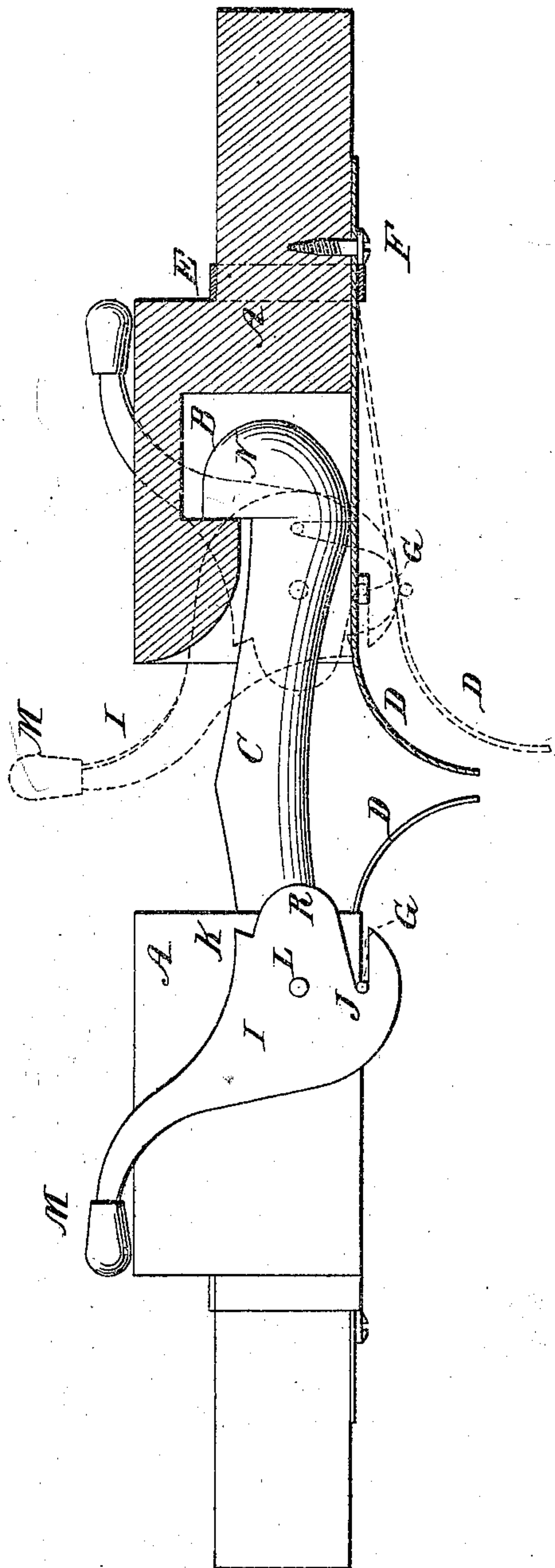
J. L. De GOOD.

Car-Couplings.

No. 134,648.

Patented Jan. 7, 1873.

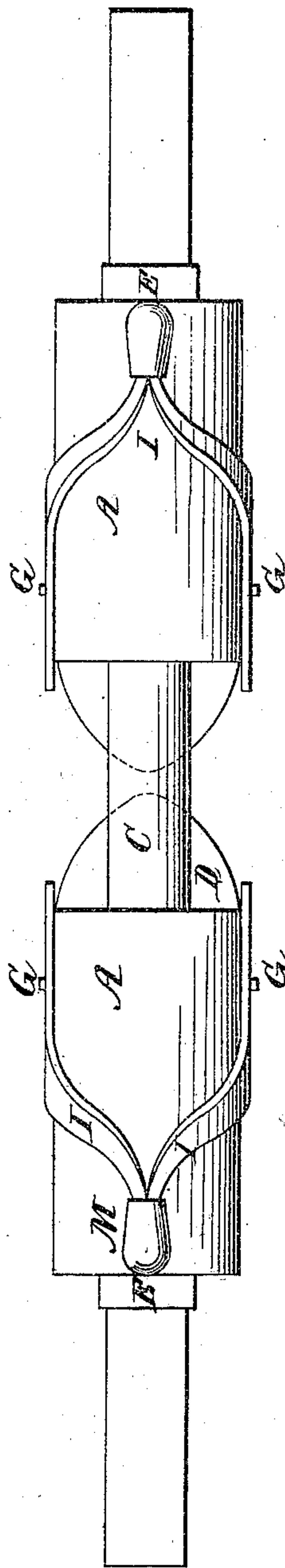
Fig. 1.



Witnesses.

W. H. Nelson
Wm Howard

Fig. 2.



Inventor.

Joseph L. De Good,
By Theophilus Mungen,
his Attorney.

UNITED STATES PATENT OFFICE.

JOSEPH L. DE GOOD, OF JEFFERSON, PENNSYLVANIA.

IMPROVEMENT IN CAR-COUPPLINGS.

Specification forming part of Letters Patent No. 134,648, dated January 7, 1873.

To all whom it may concern:

Be it known that I, JOSEPH L. DE GOOD, of Jefferson, in the county of Greene and State of Pennsylvania, have invented certain new and useful Improvements in Car-Couplings; and I hereby declare the following to be a full, clear, and exact description of the same, reference being had to the accompanying drawing making part of this specification, in which—

Figure 1 is a side elevation, showing end in section; and Fig. 2 is a plan view of the invention.

This invention relates to an improvement in car-couplings; and consists of a draw-head, composed of a buffer having a recess in its upper inside, provided with a lever and a spring having a downwardly-curved point, the whole being so arranged that the spring will act as a guide for a coupling-pin, so as to introduce it into the draw-head, and also that the spring can be locked or released at pleasure by the lever; the object being to receive and hold, or release at will, the coupling-pin held in an adjoining draw-head.

In the drawing, the buffer A has the recess B in its upper inside curved or reamed out, to permit the end of the coupling-pin C to play sufficiently when the cars are turning curves. The head or mouth of the buffer A is rounded from the inside to the outside edge to add to this effect. The spring D is securely fastened to the under side of the buffer A by a band, E, and a bolt, F. The band E is used instead of an additional bolt, which would weaken the spring D, the point of which is in the shape of an arrow-head, and curves downwardly. A cross-piece, G, provided with journal-shaped ends, is secured to the under side of the spring D. Recesses H H in the buffer A receive the ends of the cross-piece G when the spring D is locked. A bifurcated lever, I, each fork of which has a slot, J, and a shoulder, K, at its lower end, has its fulcrum at L. A handle, M, unites the forks of the lever I at the power end. A coupling-pin, C, declines from the center toward each end, at which points the hooks N N are placed. The lever I is so constructed that when the handle M rests upon the buffer A the journal-shaped ends of the cross-piece G enter the slots J J

in the lower ends of the forks of the lever I, and lock the spring D.

When the handle M is so elevated as to cause the rounded portions R R of the lever I to force the cross-piece G, and consequently the spring D to which it is attached, to the greatest distance from the buffer A, the coupling-pin C can enter the draw-head and be withdrawn without coupling the cars. When the handle M is drawn forward until the journal-shaped ends of the cross-piece G rest against the shoulders K K, the spring D can be forced down, but will resume its place as soon as the force is withdrawn. The coupling-pin C can be entered into the draw-head at this time, and will couple the cars; but they cannot be uncoupled until the spring D is forced down so as to permit the hook N to drop from the recess B.

A draw-head constructed as herein described is attached to each end of every car. When the cars are moving up to be coupled, one end of the coupling-pin C being secured in one of the draw-heads, the point of the free end strikes the curved point of the spring D, and is guided into the draw-head, where the hook N catches in the recess B and is retained by the spring D. The lever I is now thrown back until the journal-shaped ends of the cross-piece G enter the slots J J, at which time the spring D is locked.

Having thus described my improvement, what I claim as new and useful, and desire to secure by Letters Patent, is—

The buffer A provided with the recess B, in combination with the bifurcated lever I, the forks of which are provided with the slots J J and shoulders K K, and the spring D provided with the curved point and cross-piece G, arranged relatively one to the other, substantially as and for the purpose hereinbefore set forth.

In testimony that I claim the foregoing improvement in car-couplings, as above described, I have hereunto set my hand and seal this 23d day of October, 1872.

JOSEPH L. DE GOOD. [L. S.]

Witnesses:

F. W. McVAY,
W. McEWIN.