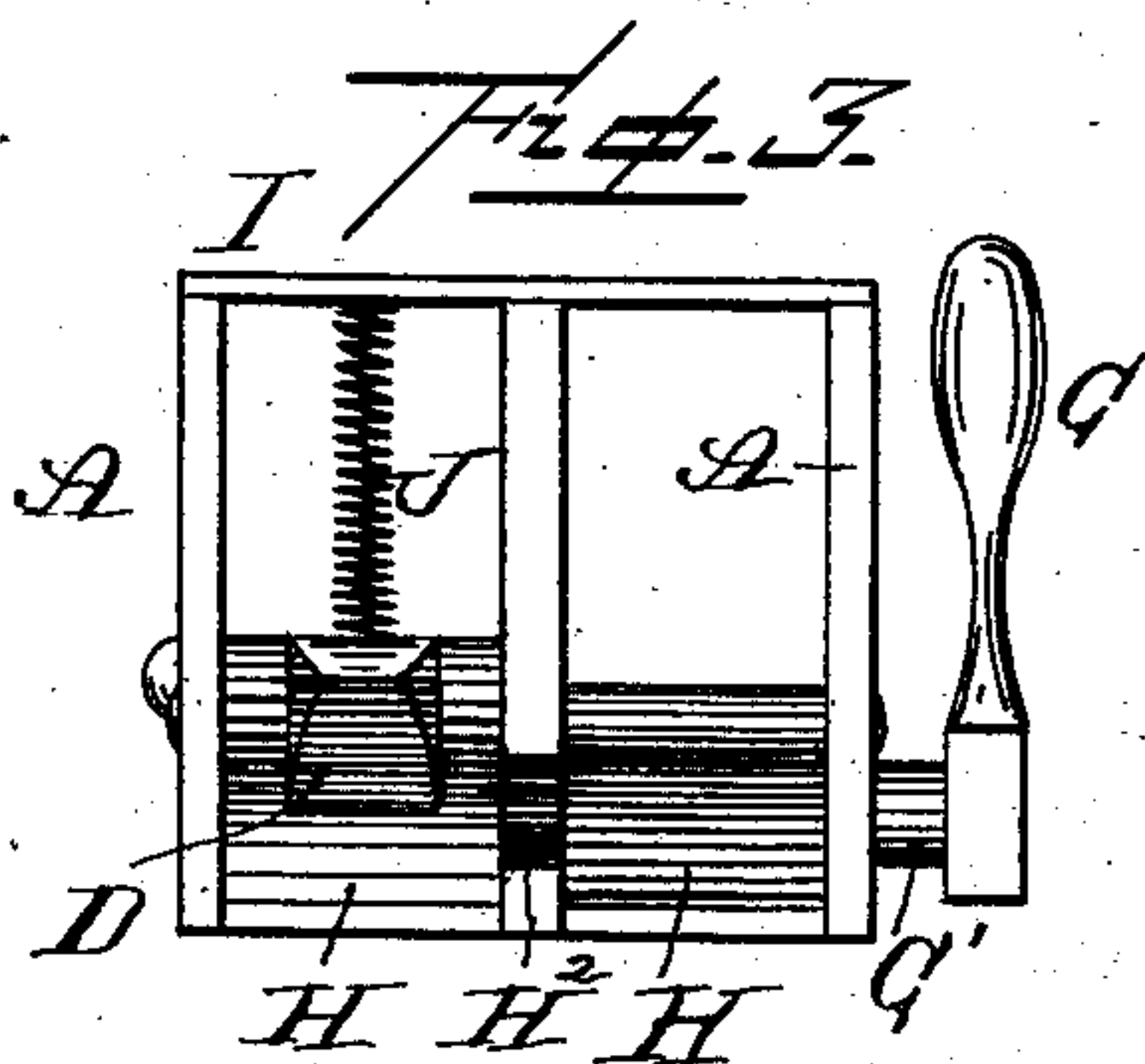
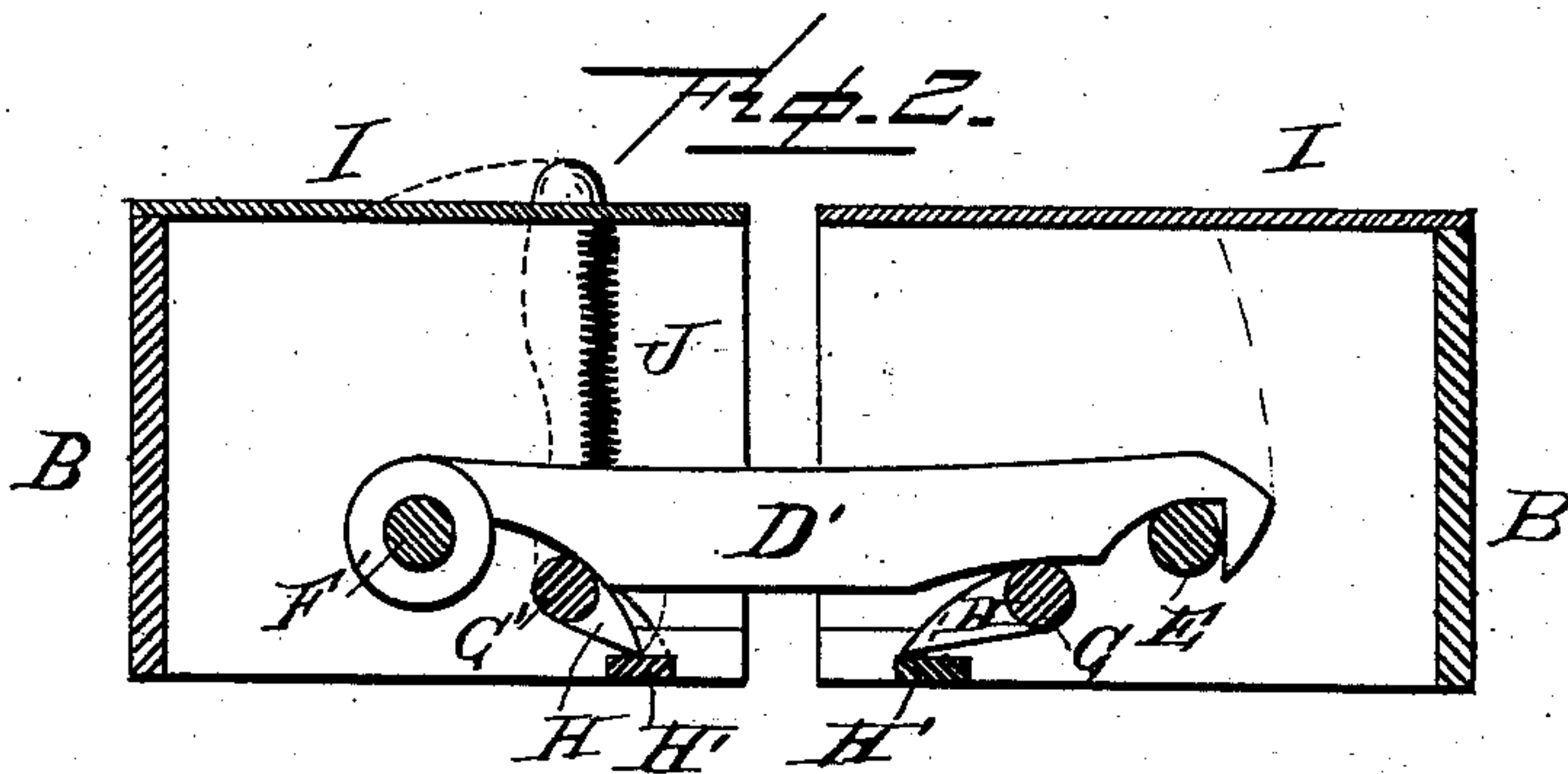
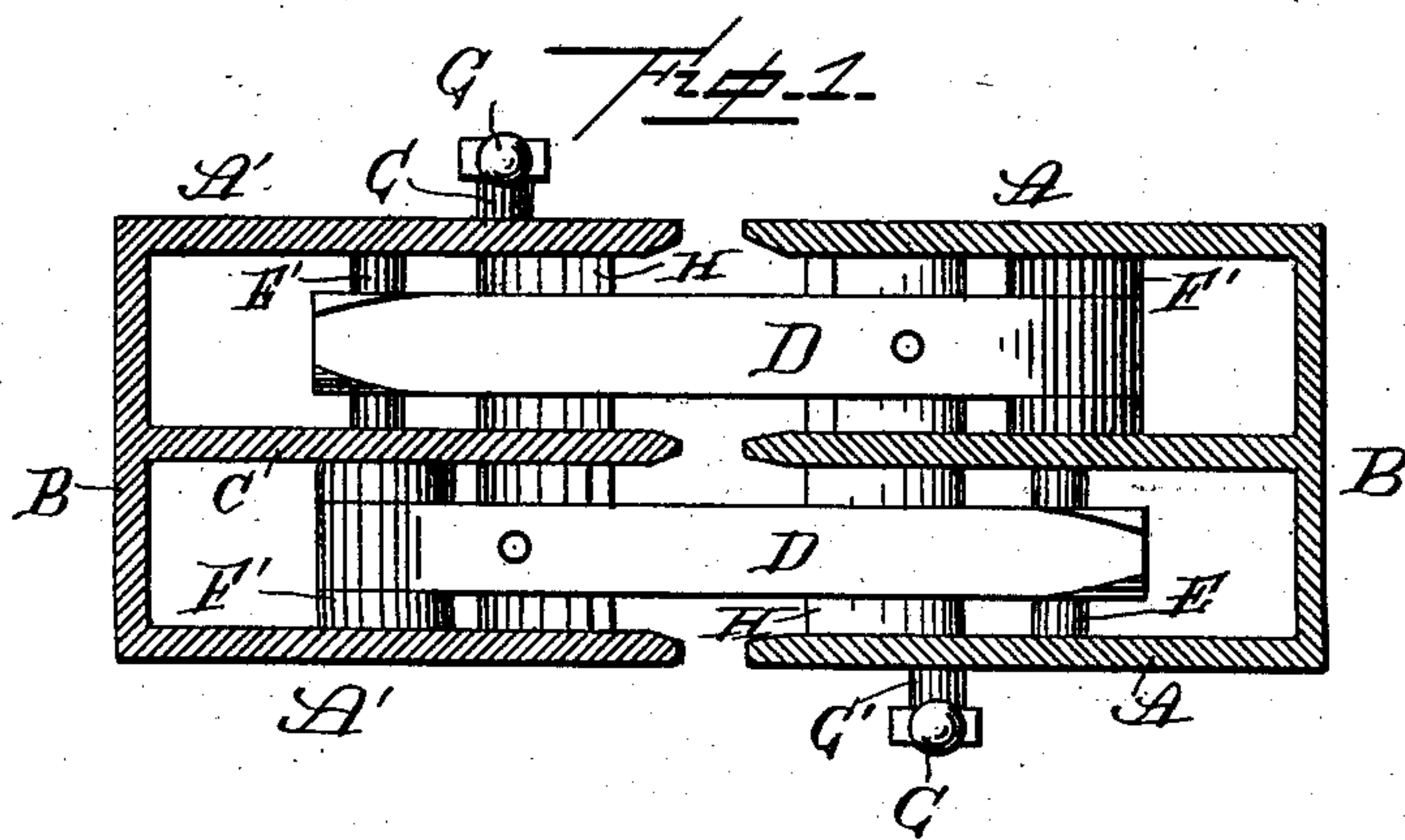


(No Model.)

A. C. LONG.
CAR COUPLING.

No. 281,535.

Patented July 17, 1883.



WITNESSES:

W. S. D. Gaines
Wm. B. Robison

INVENTOR:

Alfred C. Long
by
Howard A. Snow
his Atty

UNITED STATES PATENT OFFICE.

ALFERD C. LONG, OF FLORA DALE, PENNSYLVANIA.

CAR-COUPLING.

SPECIFICATION forming part of Letters Patent No. 281,535, dated July 17, 1883.

Application filed April 3, 1883. (No model.)

To all whom it may concern:

Be it known that I, ALFERD C. LONG, of Flora Dale, county of Adams, and State of Pennsylvania, have invented a new and useful Improvement in Car-Couplings; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use it, reference being had to the accompanying drawings, forming a part thereof.

My invention relates to car-couplers; and it consists in the parts which will be hereinafter described, and pointed out in the claims.

In the accompanying drawings, Figure 1 represents a plan view of two of my couplers united. Fig. 2 is a longitudinal section taken on the line X X of Fig. 1. Fig. 3 is a front view of one of the couplers.

Like letters indicate like parts throughout the several views.

A represents the sides of the box containing the coupling mechanism, and A' are similar parts of the connecting draw-head.

B B are the backs of the boxes.

C C are partitions.

D is a link or hook pivoted in box A, and D' is a like link in box A'.

E is a cross-bar in box A, adapted to receive and secure the loose end of link D'. The cross-bar E runs through the box from side to side. It also passes through the pivoted end F of the link D. E' and F' are the counterparts of E and F.

G is a handle by means of which the uncoupling is effected, and G' is a spindle connected therewith.

H H are lips rigidly united by the piece H². The spindle G' is rigidly connected to the lip H, which is nearest thereto. It will thus be seen that by turning back either one of the handles G the lips in the box to which it is

attached will be raised, which action will raise the hooks on links D D' off the cross-bars to which they may be secured, respectively.

H' are cross-pieces in the bottom of the boxes, upon which the loose end of the lips H rest. The lips H serve as a guide for the hook end of the links D D' while said lips are entering the boxes. The hook end of the links in entering the box are brought into contact with the upper surfaces of the lips H, and thereby slightly raised, so that they will pass over the tops of the cross-bars E E' and hook therein. It will thus be seen that the coupler is automatic in its operation, and that the uncoupling is effected without danger by means of the handles G.

I is a cross-strip over the tops of the boxes, (shown in Figs. 2 and 3,) and J is a spiral spring resting on the under side of said cross-strip and against the upper side of one of the links. This cross-strip and spring are only used when the coupling is connected to a car with the sides on top and bottom, as it were.

When the device is operated as is shown in the plan view, Fig. 1, the weight of the links D D' would hold them in position; but when the boxes are fitted to cars with the links D D', one above the other, the springs are necessary to hold said links in place.

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

In a car-coupler, the combination of the box A B, partition C, cross-bar E, pivoted link D, handle G, lips H, cross-bar I, and spring J, substantially as described, and for the purposes set forth.

In testimony that I claim the foregoing I append my signature.

ALFERD C. LONG.

Witnesses:

J. C. MARKLEY,
MICHAEL LONG.