

R. E. STEPHENS.

GATES.

No. 184,555.

Patented Nov. 21, 1876.

Fig. 1.

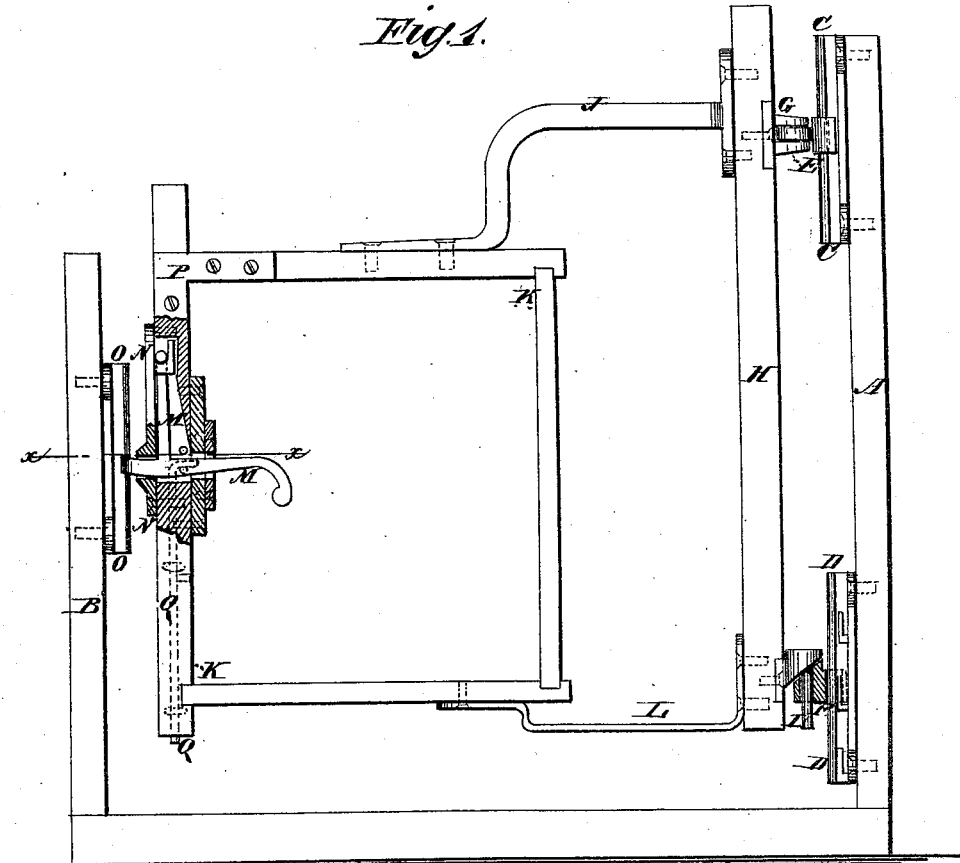


Fig. 2.

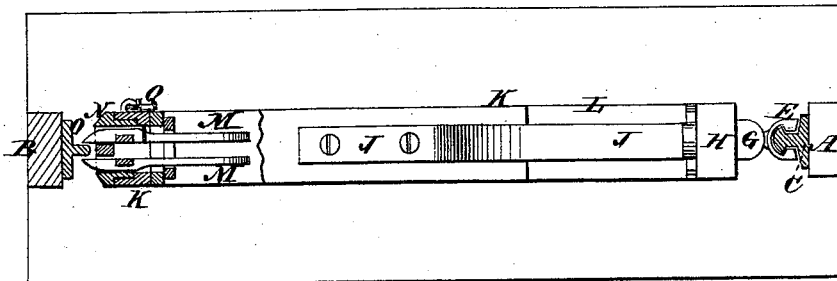


Fig. 3.

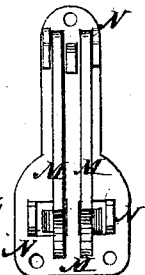
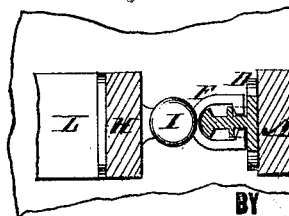


Fig. 4.



WITNESSES:

Francis McAuley,
John Getchals

INVENTOR:

R. E. Stephens.

BY

Attorneys.

ATTORNEYS.

UNITED STATES PATENT OFFICE.

ROBERT E. STEPHENS, OF OWEN SOUND, ONTARIO, CANADA.

IMPROVEMENT IN GATES.

Specification forming part of Letters Patent No. 184,555, dated November 21, 1876; application filed August 14, 1876.

To all whom it may concern:

Be it known that I, ROBERT E. STEPHENS, of Owen Sound, in the county of Grey, Province of Ontario, and Dominion of Canada, have invented a new and useful Improvement in Gates, of which the following is a specification:

Figure 1 is a side view of my improved gate, parts being broken away to show the construction. Fig. 2 is a top view of the same, partly in horizontal section through the line *xx*, Fig. 1. Fig. 3 is a detail view of the latches and latch-plate detached from the gate. Fig. 4 is a detail top view of the lower hinge.

Similar letters of reference indicate corresponding parts.

The object of this invention is to furnish a gate which shall be so constructed that it may be conveniently adjusted higher or lower to adapt it for winter or summer use, which will not sag, which may be opened in either direction and will fasten itself as it swings shut, and which will receive a small or wicket gate within it.

The invention consists in the construction of the gate-frame and the manner of hanging the same, so that it can be adjusted vertically, as will be hereinafter more fully described.

A is the rear or hinge post, and B is the front or latch post of the gate. To the upper and lower parts of the post A are attached plates C D, having T-ribs formed longitudinally upon their forward sides to receive the hinge-blocks E F. The blocks E F have grooves formed longitudinally upon their outer sides to receive the T-ribs of the plates C D. The rib of the lower plate D has three, more or less, recesses formed upon the rear parts of the sides of its T-rib to receive the flanges of the block F, to support the gate at different heights from the ground, space being left between said recesses for the flanges of the block F to pass out and in, and space being left between said recesses and the flanges of the rib to allow the flanges of the block to slide up and down. Upon the rear side of the block E is formed a lug to fit between the two lugs formed upon the plate G attached to the bar H of the gate-frame. The three lugs are pivoted together by a rivet or bolt. Upon the outer side of the block F is formed a socket

to receive the pintle I attached to or formed upon the plate attached to the lower part of the gate-bar H. The upper end of the socket of the block F is beveled to fit against the beveled shoulder formed upon the base of the pintle I, so that the gate will rise a little as it is swung open. To the forward side of the upper part of the bar H is attached the outer end of a bar, J, the forward part of which is bent downward and then forward, and its forward end is bolted to the top bar of the gate K. To the lower part of the forward side of the bar H is attached the rear end of the bar L, the forward part of which is bent upward and forward, and its end is bolted to the bottom bar of the gate K. By this construction a space is formed between the bar H and the rear bar of the gate K to receive a small or wicket gate. M are two three-armed bars, which form the latches. The ends of the rear arms of the bars M pass through a mortise in the front bar of the gate K, and through a guide-plate attached to said bars, and are curved downward to serve as handles for unlatching the gate. The upper arms of the bars M pass up through a groove or recess in the forward side of the front bar of the gate K, and have outwardly-projecting pins formed upon or attached to their upper ends to hook upon hooks formed upon or attached to the upper part of the latch-plate N, which is secured to the forward side of the front bar of the gate K. The ends of the forward arms of the bars M are beveled off upon the outer sides, so that the forward bar may be pushed back by striking against the catch, as the gate is swung shut in either direction, causing the gate to fasten itself.

To the forward or latch post B is attached a plate, O, which is provided with a longitudinal rib for the forward ends of the latch-bars M to catch upon, and which is made of a length corresponding with the length of the ribbed plates C D of the hinges, so that the gate may latch itself at whatever height above the ground it may be adjusted.

To the upper forward corner of the gate K is attached a right-angled bar or plate, P, to make the gate rigid, and thus prevent it from sagging. Q is a rod, which slides up and down in staples attached to the side of the

front bar of the gate K. The upper end of the rod Q is bent to one side to form a handle, and also to form a hook to be hooked over a pin attached to the bar of the gate to hold the said rod suspended. With this construction, when the gate has been opened to any desired extent, the rod Q may be dropped to the ground to hold the gate in place.

The latch mechanism or locking devices described and illustrated in connection with the gate will form the subject-matter of a separate application for a patent.

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

1. The combination of the two bars J L with the bar H of the gate-frame, and with the top and bottom bars of the gate K, to form a space for a small or wicket gate, substantially as herein shown and described.

2. The combination of the grooved and lugged block F, ribbed plate E, and lugged plate G, with the vertically-adjustable gate and latch, substantially as and for the purpose set forth.

3. The combination of the grooved block F, provided with the socket having a beveled upper end, with the ribbed plate D, provided with the recesses upon the sides of its rib, and the pintle I having a beveled shoulder at its base, in combination with the vertically-adjustable gate and latch, substantially as herein shown and described.

ROBERT E. STEPHENS.

Witnesses:

JAMES MASSON,
WILLIAM MASSON.