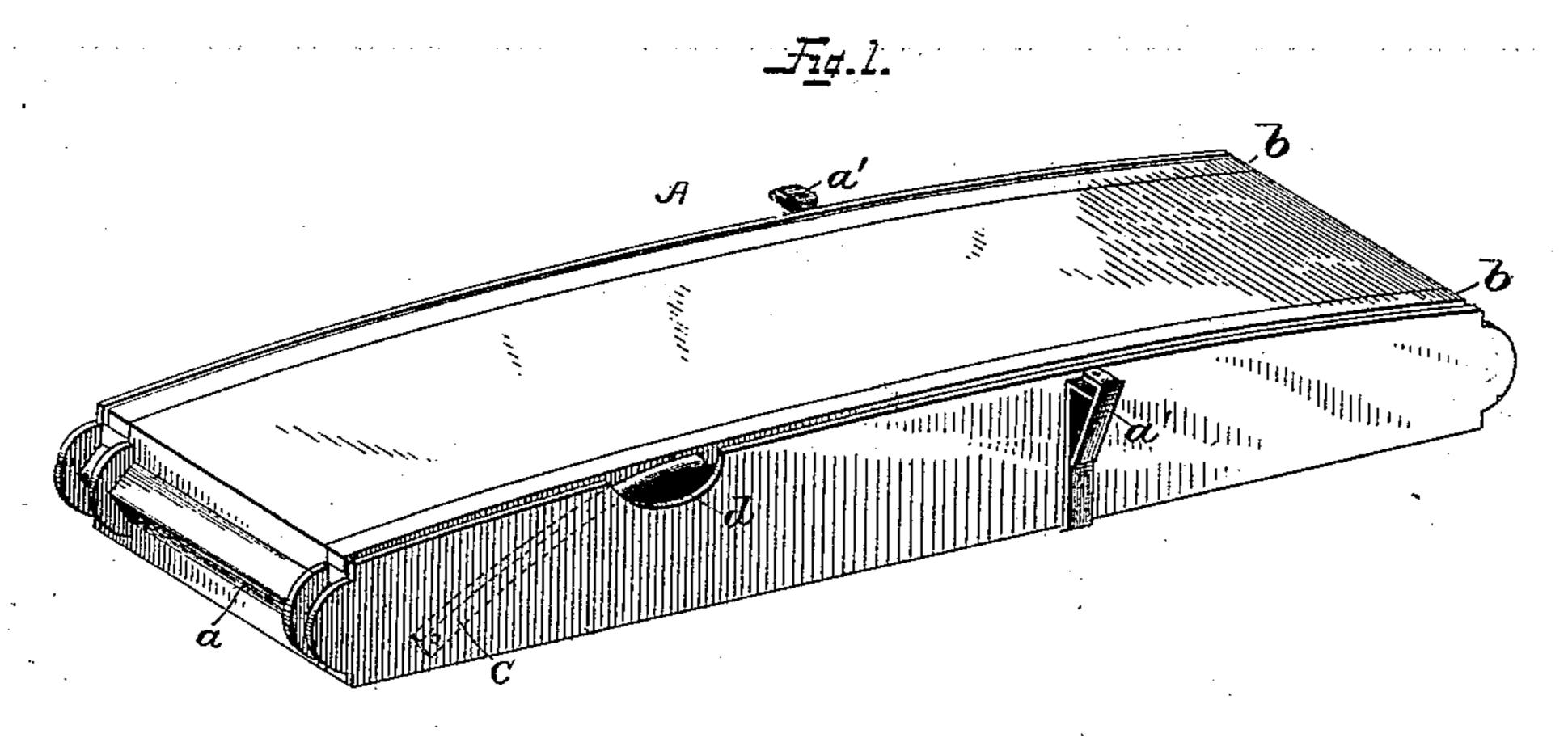
## J. PATIN.

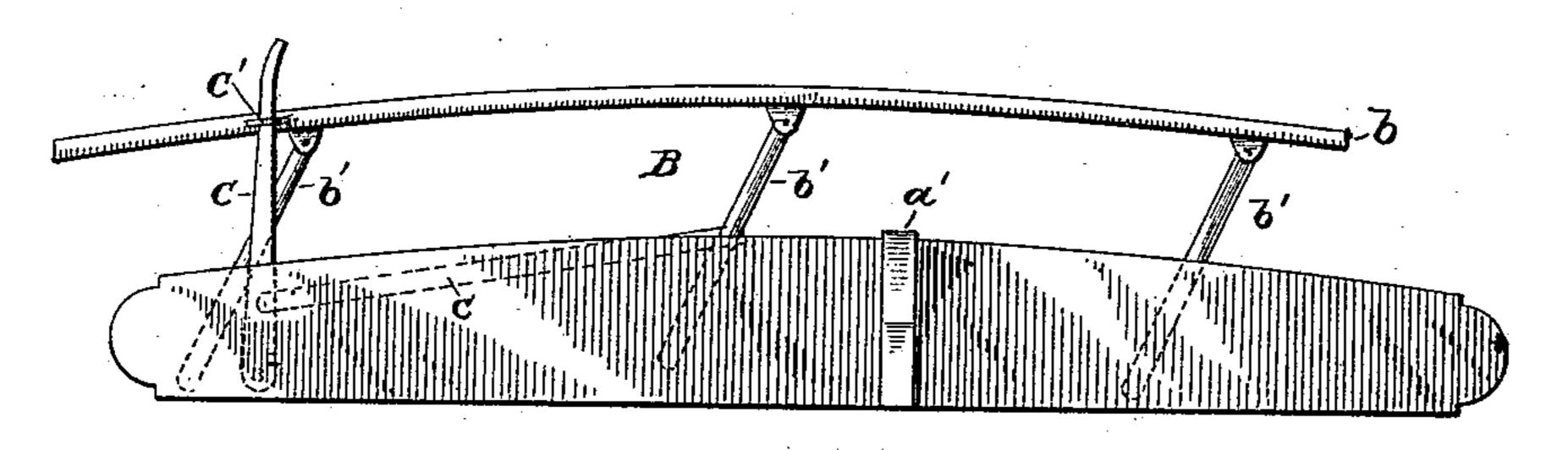
## STEAMBOAT STAGE.

No. 337,281.

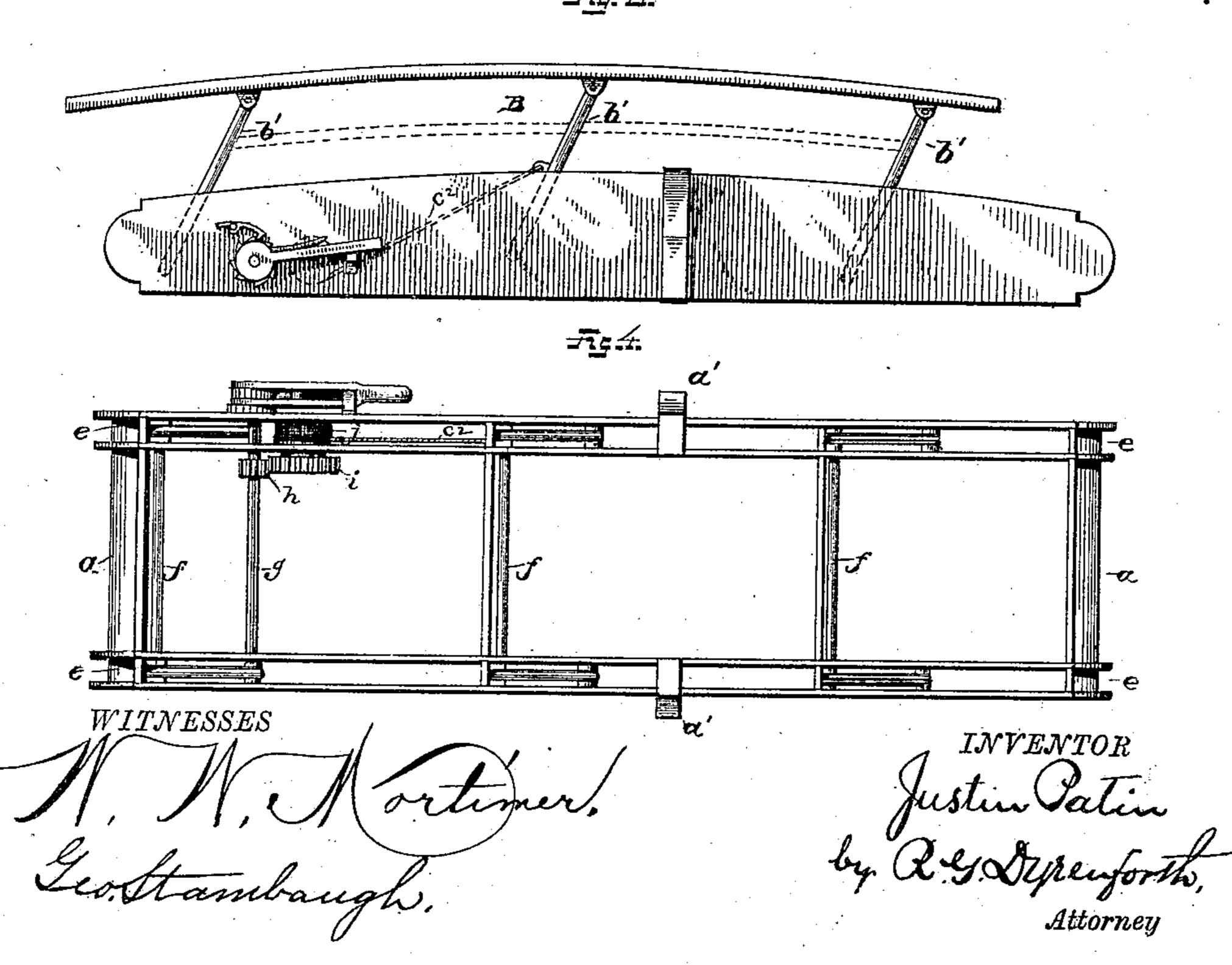
Patented Mar. 2, 1886.



<u> Fig. 2.</u>



7, 3



## United States Patent Office.

JUSTIN PATIN, OF NEW ROADS, ASSIGNOR OF ONE-HALF TO EDOUARD ALPHONSE KOCH, OF WATERLOO, LOUISIANA.

## STEAMBOAT-STAGE.

SPECIFICATION forming part of Letters Patent No. 337,281, dated March 2, 1886.

Application filed July 16, 1885. Serial No. 171,746. (No model.)

To all whom it may concern:

Be it known that I, Justin Patin, a citizen of the United States, residing at New Roads, in the parish of Point Coupée and State of Lousiana, have invented certain new and useful Improvements in Steamboat - Stages; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to gang-planks or stages for steamboats and other vessels. The object is to provide a gang-plank or stage with a side rail attachment, which may be readily raised or adjusted in position to form a guard when this is desirable, but which may be dropped upon the stage, out of the way, when it is not desirable or when the gang-plank or stage is on board.

The invention embodied in a gang-plank or stage provided with longitudinal grooves or spaces at its sides, and side rails folding into said grooves or spaces by means of standards pivoted to the rails and in the grooves or spaces, and a lever and rod connected with said standards for raising and lowering said rails and locking them in position, as will be hereinafter fully set forth.

In the accompanying drawings, forming part of this specification, like letters of reference

indicate corresponding parts.

Figure 1 is a plan view of the improved gang-plank or stage with the rail attachment or guard folded. Fig. 2 is a side view of the same with the guard raised and in position. Fig. 3 is a side view of a modification. Fig. 4 is a plan view showing mechanism for raising the rail attachment and on both sides simultaneously.

The gang-plank or stage A may be of any suitable construction and kind; but I prefer to employ one such as shown, which has rounded ed ends supplied with re-enforcements a, and is provided with lugs, eyes, or other suitable attachments, a', beyond its center toward its outer end, for raising it by means of a derrick. At the sides of the stage, preferably within the side pieces, is hinged the rail attachment or guard B, consisting of the rail b and the standards b', pivoted above to the rail and below to the stage by rigid attachments upon

rods f, passing through the stage from side to side and free to turn. At the vessel end at one side of the stage, preferably covered, when down, by a side piece, excepting where it is 55 to be grasped, is a hand-lever, C, pivoted in the side piece, and has pivoted to it one end of a bar, c, which at its other end is pivoted to one of the standards b', and upon the rail b'there is a catch, c'. The lever C, when cov- 6c ered by the side piece, and when down, rests at its outer end in the notch d, where it is accessible to the hand. To raise the guard, the lever is elevated, when, by means of the bar c, a standard is pulled up, which elevates the 65 rail, and through it the other standards. To retain the rail in an elevated position, the lever is slipped into the catch c'. It will be observed that even when the rail is elevated the standards are not vertical, but lean, so that 70 when the lever is released from the catch the rail may fall by the weight of the parts alone. It is preferred that when down the rail should lie in a longitudinal groove, e, at the side of the stage, filling it up and presenting an even 75 surface for the whole stage.

To raise the rail on the opposite side of the stage simultaneously with the one at which the hand-lever is, the rods f, which are rigidly attached to the lower ends of the standards at 80 the lever side, are also rigidly attached to the lower ends of the standards on the opposite side, whereby any movement of a standard on one side produces corresponding movement of its fellow in the opposite side; or the hand- 85 lever itself may be rigidly attached to a transverse rod free to turn, which transverse rod is to have a rigidly-attached arm projecting from it, which arm is to be pivoted to a bar like c, in turn pivoted to one of the standards, 90 so that the guard attachment on the side opthe lever side, excepting that the lever does not extend much above the point where the bar is pivoted to it. In this case, if it is de 95 sired to raise but one rail, as for passengers, the projecting arm may be detached from the bar, and thus one side only of the guard be raised. Instead of raising both sides by one lever, there may be a hand-lever at each side. Ico Where the stage is to be used for cattle or other stock, and the distance between the rail

337,281

and the stage would be so great that a large and dangerous opening would be left, there may be additional rails placed longitudinally between each pair of standards and pivoted to 5 them, as shown in dotted line in Fig. 3. In this case the recess should be deep enough to hold both the top rail, b, and these side rails. Where the guard is very heavy, it would be difficult to raise it by means of the hand-lever 10 and bar arrangement, and so in such case the latch-lever device shown in Figs. 3 and 4 may be employed. Here the hand-lever is supplanted by a latch-lever, C', loose on a shaft, g, which extends through or nearly through the stage 15 from side to side, turns freely in bearings in the sides of the stage, and has fixed upon it a small pinion, h. The lever being moved freely in one direction on the shaft, which is held from turning by a pawl catching the latch of 20 a ratchet-wheel fixed upon the shaft between the latch-lever and the side of the stage, the little latch upon the lever rides freely over the teeth, but upon return of the lever catches upon them and turns the shaft. The small 25 pinion h on the shaft meshes with a pinion, i, on a short shaft which carries a drum, j. Upon this drum is wound a cord or chain,  $c^2$ , which is attached to one of the standards b'. The cord  $c^2$  has the same function as the bar c. 30 As the shaft g, is turned the pinion h, thereon,

meshing with the pinion *i*, turns the drum, which winds up the cord and raises the standards and rails. Both sides may be raised simultaneously, the same as in the other example. If desirable, there may be a latch-lever 35 device on each side. It will be seen that in either case—that is to say, where either the hand-lever or the latch-lever is employed—the guard-rail may be raised to any desirable height between the horizontal position of the 40 standards and their extreme upright position.

Having thus fully described my invention, what I claim, and desire to secure by Letters

Patent, is—

The improved gang-plank or stage, provided with longitudinal grooves or spaces at its sides, side rails supported by standards which are pivoted to the plank or stage and to the rails, and which, when lowered, rest in said grooves, a lever fulcrumed in the plank or stage, connected with one of the standards by means of a rod or cord, and a catch for temporarily holding said lever in the elevated position of the rails, as set forth.

In testimony whereof I affix my signature in 55

presence of two witnesses.

JUSTIN PATIN.

Witnesses:

H. DIDIETZ, W. M. HAILE.