(No Model.)

A. C. PHILLIPS.

TRACK LIFTER AND HOLDER.

No. 266,195. Patented Oct. 17, 1882.

Fig. 1.

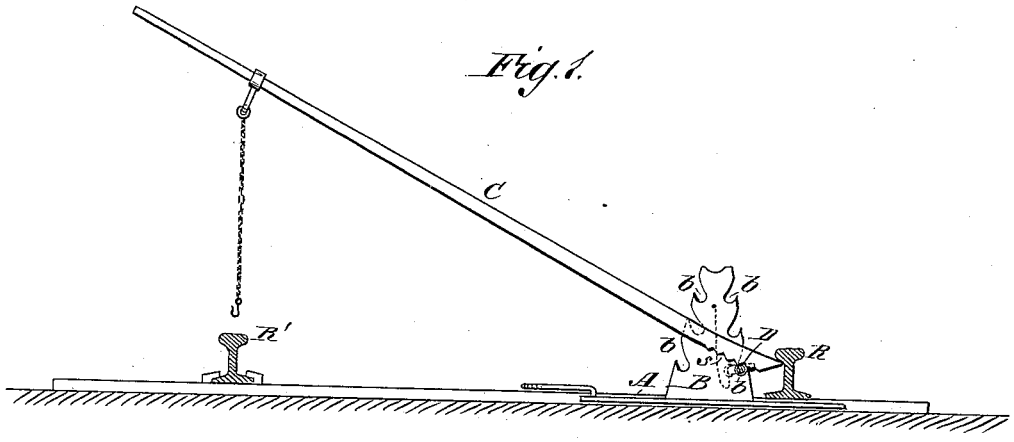


Fig. 2.

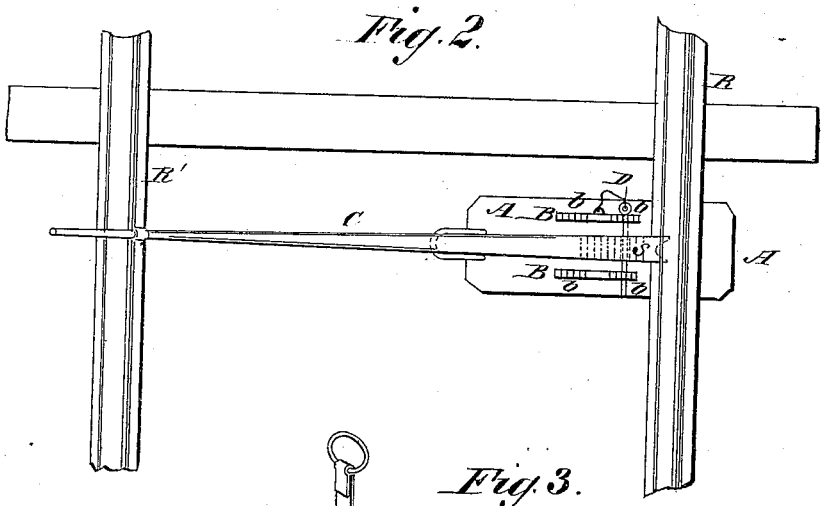
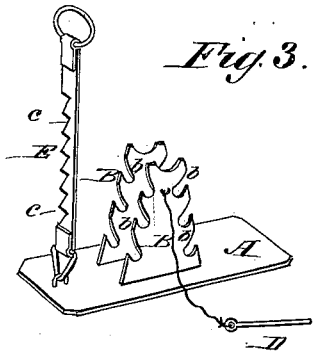


Fig. 3.



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ALEXANDER C. PHILLIPS, OF NEW CASTLE, PENNSYLVANIA.

TRACK LIFTER AND HOLDER.

SPECIFICATION forming part of Letters Patent No. 266,195, dated October 17, 1882.

Application filed March 25, 1882. (No model.)

To all whom it may concern:

Be it known that I, ALEXANDER C. PHILLIPS, of New Castle, in the county of Lawrence and State of Pennsylvania, have invented a new and useful Improvement in Track Lifters and Holders, of which the following is a full, clear, and exact description.

Reference is to be had to the accompanying drawings, forming part of this specification, in which similar letters of reference indicate corresponding parts in all the figures.

Figure 1 represents a side elevation of my invention applied to a line of rails. Fig. 2 is a plan of the same; and Fig. 3, a view in perspective thereof, in part, with a holder of peculiar construction applied.

This invention relates to means for lifting the rails of railroad-tracks and holding them in position while tamping and filling under cross-ties, or when taking out old ties and putting in new ones; and it consists in a lever raising device and stand therefor of peculiar construction, and a notched holder for the lever, whereby increased facilities are afforded for expeditiously performing the work at a largely-reduced cost of labor.

In the drawings, A indicates a metal plate, forming a platform or base, one end of which, as shown in Figs. 1 and 2, is pushed from the inside of the track under the rail R of a line of rails, R R′, to be raised. Projecting upward from said base A is a metallic upright, which it is preferred to construct of two side cheeks or plates, B B, that serve as the fulcrum-support for the lever C, by which the rail is raised. When in use this upright or frame B B is brought into as close proximity as convenient with the rail to be raised for the purpose of obtaining a more effective leverage. The edges of the plates forming said upright have notches *b b* in them, arranged one above the other, to constitute variable fulcrum surfaces or rests, whereby increased facility is afforded for raising the rail or object to be lifted to any desired height.

A fulcrum-pin, D, which may be attached by chain or cord to the fulcrum-stand A B B, is inserted in either pair of opposite notches, *b b*, in the edges of the plates. On this pin, which forms a sharp fulcrum-base, the lever C, near its one or inner end, rests, said lever having a series of parallel grooves or notches, *s s*, on its under side for the purpose, and whereby and by the notches *b b* in both edges of the two plates B B a shorter or longer leverage may be obtained. In this way or by these means the rail R is raised as desired.

The side plates, B B, forming the uprights of the stand, may be made tapering upward, as shown, to provide for sighting on curves in the track.

The lever C may be applied either under the ball or the base of the rail in order to lift it. After the rail R has been lifted, as described, it may be held in its raised position by means of a chain attached at its one end to the rear portion of the lever and provided with a hook at its opposite end, as shown in Fig. 1, by catching said hook on the opposite rail, R′, or by passing it under and over or around said rail and catching it into a link of the chain. It is preferred, however, to use the device shown in Fig. 3 for locking or holding the lever C in position when the rail is raised by it, which device consists of a toothed or notched bar or holder, E, attached to the base A of the variable fulcrum-stand formed by the base A and notched plates B B. This toothed holder E is hinged or loosely connected by a staple and link with the base A, so that it may be moved backward or forward to engage it with or disengage it from the lever by one or other of its teeth *c*, the same serving when hooked over the lever to hold the rail or object lifted at any desired height, and when not required to be used it may be laid down out of the way. Said holder may be constructed and attached to the base A to hold the lever on either side of its fulcrum, and be provided at its top or outer end with a ring to handle it by.

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

1. The variable fulcrum-stand composed of a base, A, and notched upright or plates B B, erected upon the base, with the notches *b b*, arranged one above the other, for changing the fulcrum-surfaces of the stand to different altitudes, substantially as specified.

2. The plates B B of the variable fulcrum-stand, made of diminishing tapering construction in an upward direction, essentially as

specified, to facilitate the sighting of the track on curves, essentially as described.

3. The plates B B of the variable fulcrum-stand, having notches *b b* arranged one above the other on both edges of each of said plates, to provide for varying both the altitude of the fulcrum and length of the leverage or distance of the fulcrum from the work, substantially as specified.

4. The combination of the lever C and fulcrum-pin D with the fulcrum-stand A B B, having notches *b b*, arranged one above the other, for varying the position of the fulcrum, essentially as shown and described.

5. The movable toothed or notched lever-holder E, in combination with the variable fulcrum-stand A B B, to which said holder is attached, substantially as specified.

ALEXANDER C. PHILLIPS.

Witnesses:

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