(No Model.)

E. B. GRIFFIN.

LIFTING JACK.

No. 370,253. Patented Sept. 20, 1887.

Fig. 1.

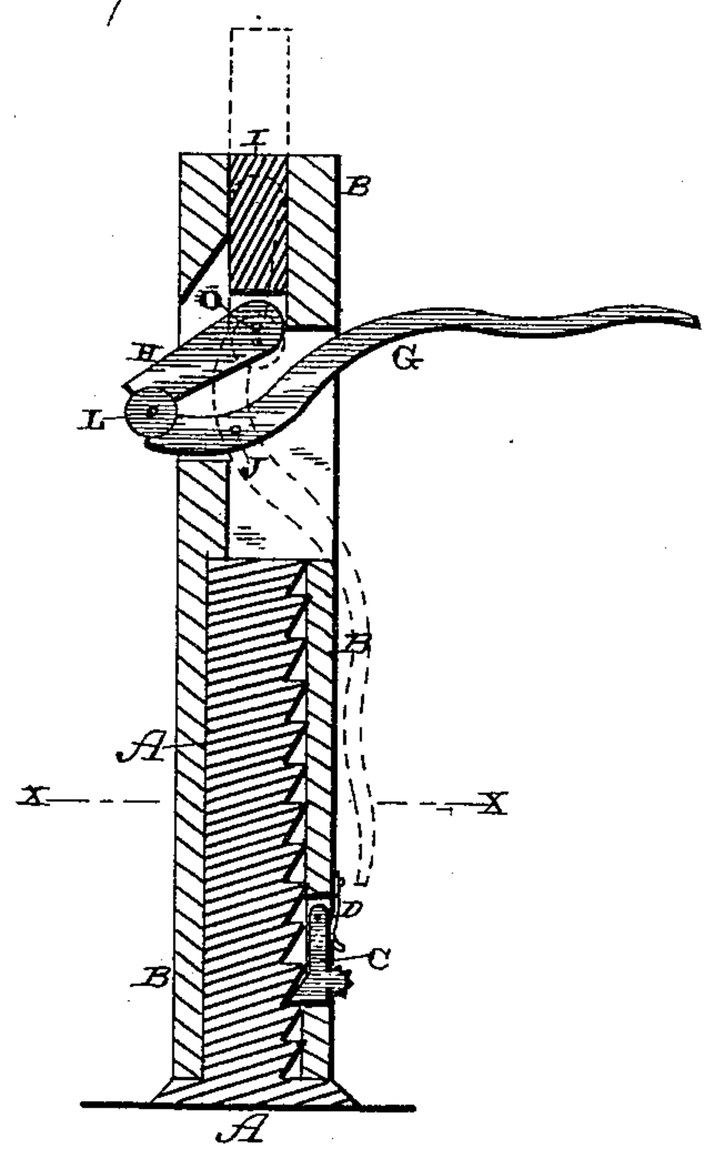
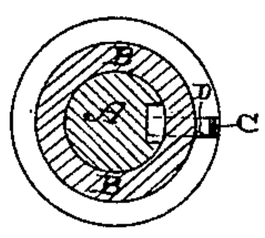


Fig. 2.



Witnesses.
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UNITED STATES PATENT OFFICE.

EDWARD B. GRIFFIN, OF FREEDOM, PENNSYLVANIA.

LIFTING-JACK.

SPECIFICATION forming part of Letters Patent No. 370,253, dated September 20, 1887.

Application filed July 11, 1887. Serial No. 244,012. (No model.)

To all whom it may concern:

Be it known that I, EDWARD B. GRIFFIN, of Freedom, in the county of Beaver and State of Pennsylvania, have invented certain new and useful Improvements in Lifting-Jacks; 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 pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to an improvement in lifting-jacks; and it consists in the combination of a suitable base or support having ratchet-teeth in its side with the frame placed thereon, and which is made vertically adjustable and provided with a spring-actuated ratchet for engaging with the ratchet-teeth in the base, the pivoted lever, the arm connected thereto, and the lifting-rod, all of which will be more fully described hereinafter.

The object of my invention is to provide a lifting-jack in which the frame-work is made vertically adjustable, and in which the lifting-rod is operated by means of an intermediate arm which is connected to the inner end of the operating-shaft.

Figure 1 is a vertical section of a lifting-jack embodying my invention. Fig. 2 is a horizontal section, taken through Fig. 1, on the lines X X.

A represents a suitable support, which is suitably enlarged at its lower end, so as to form a sufficiently large base to prevent the jack from being easily upset. The upper portion of this support is preferably made round in cross-section its whole length where it fits inside of the frame B, and has a vertical groove made in one side, and in this grooved portion are formed ratchet-teeth in which the spring-actuated pawl C is made to catch. The frame B can be moved freely upward upon the support A, but can only be lowered by the operator catching hold of the ratchet and drawing it outward, so that it can slip downward past the ratchet-teeth. The spring D keeps the ratchet forced inward constantly in contact with the ratchet-teeth, and allows the ratchet to slip freely backward over the inclined surfaces of the teeth as the frame is adjusted upward. The vertical groove in the support A catches over opposite edges of the pawl C, and prevents the frame from turning around upon the support. By this construction the ratchet and the teeth are always kept in a line with each other ready for operation.

Pivoted at J, in an opening which is made in the upper portion of the frame, is the operating-lever G, which has fastened to its shorter end at L the arm H. To the upper end of this arm is fastened at O the lifting-rod I, which moves vertically through an opening through the top of the frame. The lower end of this rod I is grooved, so that the upper end of the arm can be pivoted therein, so that its lower end will straddle over the lifting-lever and rest on the lever-pivot when the rod is lowered, so that its upper end comes flush with the upper end of the frame. When the upper end of the lever G is depressed, the rod I is forced upward, and when the pivotal point between the end of the lever and the lower end of the arm passes beyond the pivot upon which the lever turns, the projecting faces at the circumference of the elbow-joint on lever and arm meet, and any weight which can be placed upon the upper end of the rod I cannot force the rod downward because of said lock, because the lower edge of the lever strikes against the side of the frame and thus locks doubly the parts rigidly in position. When the outer end of the lever is raised upward until its upper edge strikes the side of the frame, the rod I and lever G are dropped downward into their lowest position.

It will be seen from the construction here shown and described that the parts are few and simple, not likely to get out of order, and that the jack is adapted to be used not only for elevating vehicles but other such objects.

Having thus described my invention, I claim—

The combination of the support A, provided with a vertical groove and ratchet-teeth, with the frame which fits thereon and is provided with a spring-actuated pawl, the lever G, pivoted in the upper portion of the frame, the arm H, and the rod I, substantially as shown and described.

In testimony whereof I affix my signature in presence of two witnesses.

EDWARD B. GRIFFIN.

Witnesses:
M. F. MECKLEM,
THOMPSON JACKSON.