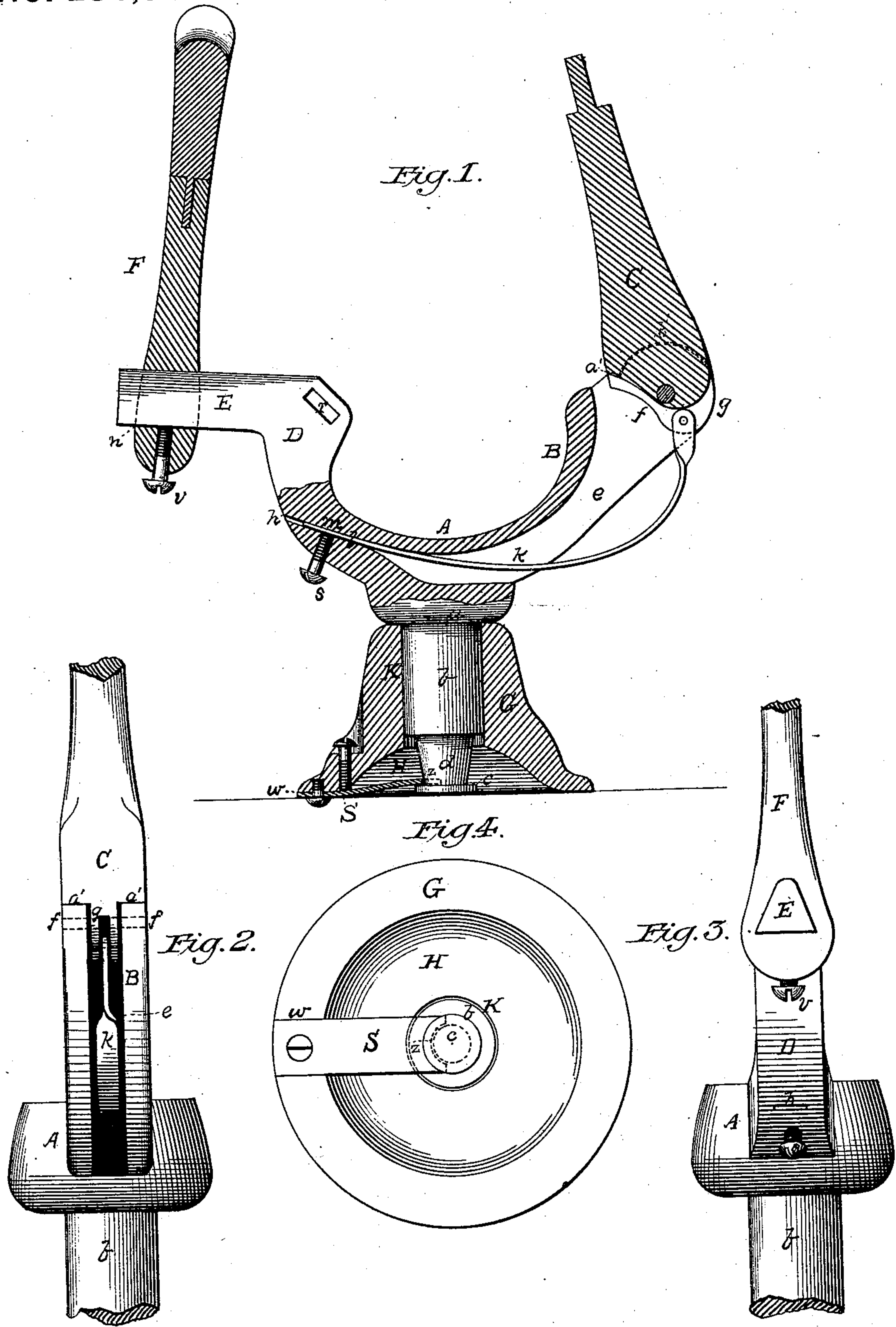


(Model.)

C. E. CLARK.  
Lasting Jack.

No. 234,960.

Patented Nov. 30, 1880.



WITNESSES

*John A. Allen.*  
*Philip M. Case.*

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# UNITED STATES PATENT OFFICE.

CHARLES E. CLARK, OF ROCHESTER, NEW HAMPSHIRE.

## LASTING-JACK.

SPECIFICATION forming part of Letters Patent No. 234,960, dated November 30, 1880.

Application filed August 31, 1880. (Model.)

*To all whom it may concern:*

Be it known that I, CHARLES E. CLARK, of Rochester, in the county of Strafford and State of New Hampshire, have invented a new and valuable Improvement in Self-Jacking Lasting-Jacks; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a vertical central section of this invention. Fig. 2 is a partial end view, showing the spring-connection. Fig. 3 is a partial front view, and Fig. 4 is a bottom view, of the base.

This invention has relation to lasting-jacks; and it consists in the construction and novel arrangement of the elliptic spring pivoted to the bottom of the spindle-arm and adjustable to increase or lessen the tension by means of a slotway and set-screw above the base-plate; also, of the downwardly-extended and headed pivot of the body portion, journaled in a vertical seat in the base-plate, the concave end spring attached to the base-plate and bearing on the head of the pivot, and the set-screw through the base-plate, to regulate the bearing pressure of the spring on the spindle-head, all as hereinafter shown and described.

The object of this invention is to provide a lasting-jack which, by simple adjustments, produced by varying the tension of the springs which hold the parts to their work, can be adapted for light or heavy work.

In the accompanying drawings, the letter A designates the body of the jack, which is made with an under shoulder or bearing, *a*, and a vertical pivot portion, *b*, extending centrally downward and having on its end a collar or head, *c*, below a neck, *d*, which is of circular form.

From one side of the body portion extends upward a curved arm, B, which is channeled centrally in its under portion, as indicated at *e*, this channel terminating at one end in the fork-bearing *f*, in which the joint-tongue *g* at the lower end of the spindle-arm C is seated, and at the other end in a recess or slot, *h*, made through the body portion, as shown

in the drawings. In this channel is seated the flat pressure-spring *k*, which regulates the throw of the spindle-arm, it being pivoted by one end to the joint-tongue of the spindle-arm, and having its other end, *l*, arranged to slide on a bearing, *m*, in the slot of the body portion A in such a manner as to be adjustable, the adjustment being secured by means of a set-screw, *s*, bearing on the spring. The margins of the fork branches of the arm B are circularly curved, and stops *a'* are provided at their ends to limit the movement of the spindle-arm, which is made with curved concave shoulders *b'*, corresponding to the curvature of the fork branches.

From the other side of the body portion extends upward an arm, D, which is turned outward in angular form at E, this outward branch being triangular in cross-section and inclined slightly upward, as shown in the drawings, and being designed to receive the angular eye *n* at the lower end of the toe-supporting arm F, which is adjustable thereon, according to the length of the last. A slot, *r*, is made through the angular portion of the arm D for fastening purposes. The adjustment of the arm F is secured by means of a set-screw *v*, extending upward through the end of said arm and bearing against the lower face of the angular guide-arm E.

The base G is made with a conical or rounded top portion and is concave underneath, as shown at H. A central bearing-aperture, K, is made through it vertically to receive the pivot or journal *b* of the body, this journal extending through the aperture into the concavity H. A rectangular seat, *w*, is made in the outer portion of the bottom of the base to receive the outer end of the broad spring S, which is secured to said seat by means of a screw. This spring extends radially to the central portion of the concave base, and is made with a concave bearing end, *z*, which is designed to fit the neck *d* of the journal *b* and to bear against its head *c*, the pressure being regulated by means of a set-screw, L, extending through the base downward to the spring S, as shown in the drawings. In this manner the bearing-friction of the jack-body on the top of the base is increased or lessened, so that the jack will turn with greater or less facility, according to

the requirement of light or heavy work. So, also, the adjustment of the spring *k* of the spindle-arm is designed to increase or lessen the stress of said arm toward the toe-support, 5 to suit heavy or light work, as the case may be.

I am aware that heretofore there have been lasting-jacks constructed in which the parts were adjustable for lasts of different sizes, but it is proposed to accomplish this by special de- 10 vices; also, that there is one in which the spring which holds the pivot to the socket is held by a lock-nut, which might be used to increase the tension on the spring, though no such object is alleged. I lay no claim to any 15 such devices; but I am not aware that any means have been devised for varying the distance between the toe and heel rest by varying the tension on the spring which holds them toward each other.

20 Having described this invention, what I

claim, and desire to secure by Letters Patent, is—

In a lasting-jack having both arms adjustable, the combination of the base *G*, spring *S*, and adjusting-screw, the revolving shank *b d*, 25 having annular head *c*, spring *k*, secured to arm *C* and adjusted at will by set-screw *s* through the slot *h*, the arm *D E*, having socket *n* and tying-slot *r*, and the standard *F*, rendered adjustable by set-screw *v*, all constructed, ar- 30 ranged, adapted, and combined to be operated as and for the purposes specified.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

CHARLES EVERETT CLARK.

Witnesses:

THOMAS E. BURNHAM,  
HENRY KIMBALL.