No. 649,846. Patented May 15, 1900.

J. W. HORTH.

DEVICE FOR PROVIDING LEVEL BEARINGS FOR JAWS OF JACKS.

(Application filed Aug. 18, 1899.)

(No Model.)

Fig. 4.

Fig. 1.

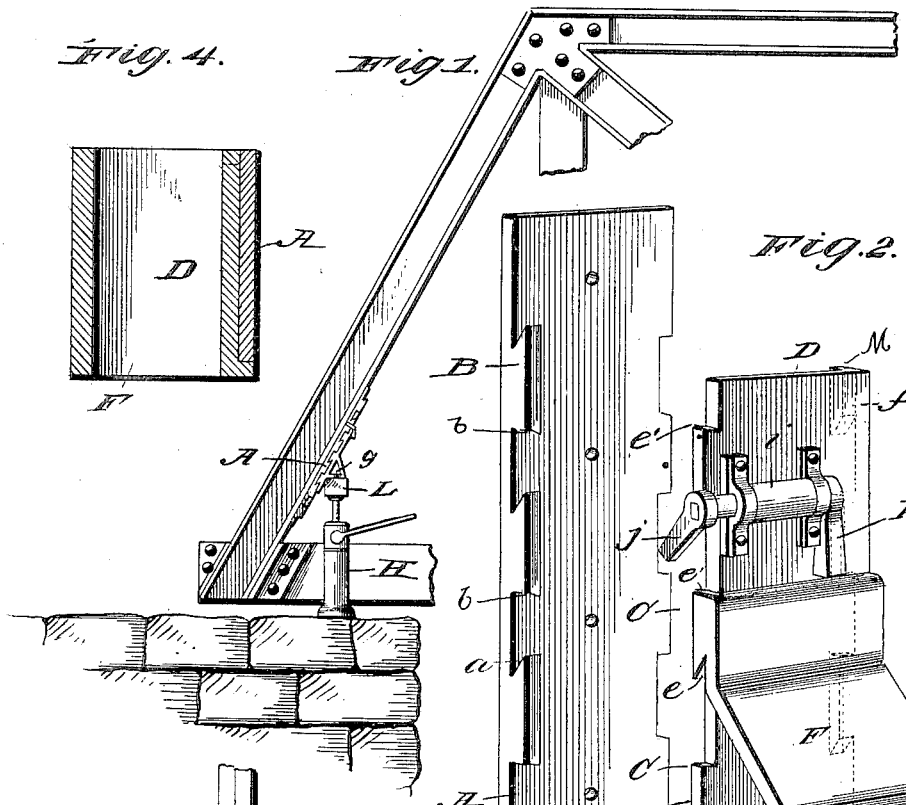


Fig. 2.

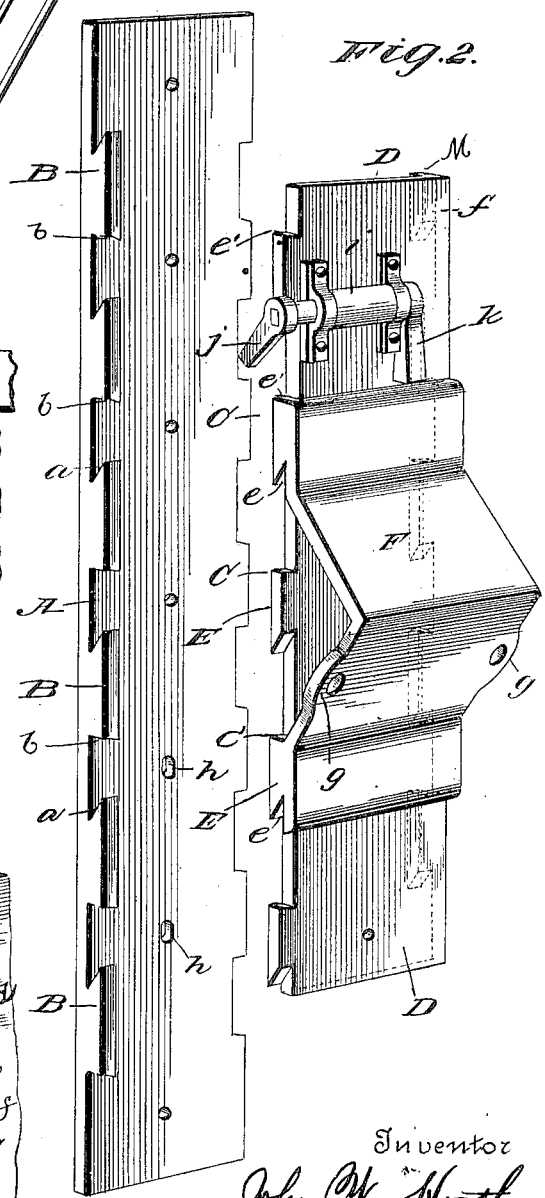
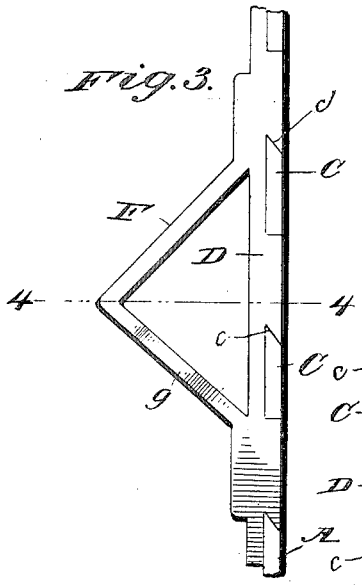


Fig. 3.



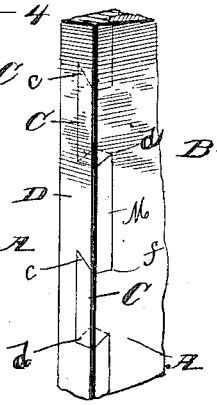


Fig. 5.

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UNITED STATES PATENT OFFICE.

JOHN WILLIAM HORTH, OF SALAMANCA, NEW YORK.

DEVICE FOR PROVIDING LEVEL BEARINGS FOR JAWS OF JACKS.

SPECIFICATION forming part of Letters Patent No. 649,846, dated May 15, 1900.

Application filed August 18, 1899. Serial No. 727,653. (No model.)

To all whom it may concern:

Be it known that I, JOHN WILLIAM HORTH, a citizen of the United States, residing at Salamanca, in the county of Cattaraugus and State of New York, have invented certain new and useful Improvements in Devices for Providing Level Bearings for Jaws of Jacks; and I do 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.

This invention relates to a device for providing a substantial and level bearing for the jaws of jacks in raising weights where the object or article to be raised affords only an inclined surface for the application of the jaw of the jack, as in the case of truss-bridges; and it has for its object to provide a simple, durable, and inexpensive device adapted to be easily and quickly applied to the object to be lifted or raised and to afford a level bearing for the jaw of the jack; and it consists in the parts and combinations of parts hereinafter described and claimed.

In the accompanying drawings, forming a part of this specification, Figure 1 is a side elevation of one end of a bridge and its supporting masonry, showing my invention in connection with a jack in position for use; Fig. 2, a perspective view of the angle-plate or jaw-bearing and the securing-plate; Fig. 3, a detail side elevation showing the angle-plate and securing-plate connected together; Fig. 4, a section on the line 4 4, Fig. 3; and Fig. 5 a detail perspective view.

Similar letters refer to similar parts throughout all the views.

Referring to the drawings, A represents a plate or bar, preferably of metal, having the lugs B cast or otherwise secured along one edge or side thereof and projecting at right angles therefrom and on the opposite side or edge having the lugs C formed thereon, which extend laterally from and in the same plane as the plate. As clearly shown in Fig. 2, the lugs B at one end are inclined, as at *a*, toward the bar or plate A and at the other end are slightly beveled or inclined from their inner edges to their outer edges, as at *b*, while the lugs C, as best shown in Fig. 5, are inclined or beveled from the top or upper surface of the bar or plate A to the bottom or lower surface thereof, as at *c*, and the other ends of said lugs are beveled or inclined inwardly or toward the edge of the plate or bar, as at *d*, for a purpose to be described.

The angled plate or jaw-bearing consists of a plate or bar having at one side or edge the lugs E, projecting laterally therefrom, said lugs being similar to the lugs C, with the exception that their ends are inclined or beveled in a direction opposite to that of the lugs C, as at *e e'*, and at the other side or edge the plate D is formed with lugs M at right angles thereto, which are similar to the lugs B, excepting that they project in the opposite direction or downwardly from the plate and that their ends are beveled or inclined in a direction opposite that of said lugs B, as clearly shown in dotted lines, Fig. 2, and at *f*, Fig. 5. About midway of the plate or bar D is cast an angle-plate or bearing F, the two walls of which project toward each other from said plate or bar D at an angle, in this instance, of forty-five degrees and the lower wall of which is formed with perforated lugs *g* at each side. The angled plate or jaw-bearing is secured to the plate or bar A by simply sliding said plate onto plate A until their respective lugs interlock at each side, as shown in Figs. 1, 3, and 5, somewhat similar to a dovetail joint.

The plate A is secured to the object to be lifted or raised by bolts or rivets through perforations therein, and the angled plate or jaw-bearing may be further secured to the plate A, if desired, by a bolt through a perforation in said jaw-bearing and an elongated opening or perforation *h*, formed in the plate A.

In order to hold the parts together when not in use, I mount a short shaft *i* in bearings secured to the plate D and having one end overlapping the plate, and to this end I secure a bar or arm *j* at right angles, which is adapted, when the shaft is turned by the handle *k* at the opposite end of the shaft, to form a bar against the separation of the plates A and D.

The peculiar formation of the lugs B and C enables the secure connection of the plates A and D together without the use of bolts and renders them easily and quickly separable, and as the plate A may be of any desired length, with a proportionate increase of lugs B, the angle-plate D may be adjusted

up or down thereon, as desired, without requiring the removal of plate A from the part to which it is secured when it is found necessary or desirable to change the height of the angled plate.

In the drawings the device is shown in position on a bridge, and the jack H is shown as resting on the masonry of the bridge (although a suitable foundation may be erected therefor, if found necessary) and its jaw adjusted against a timber L, secured to the perforated lugs *g* of the angled plate. The greater the pressure applied the greater security between plates A and D, as the lugs on the latter are forced into more intimate contact with those on the plate A, owing to the peculiar angles of the lugs.

While I have described the jaw-bearing F as preferably cast with the plate D, I do not desire to be restricted to such construction, as it is evident it may be formed separately and secured thereto in any desired manner. Also it will be understood that the jaw-bearing F, whether formed integral with plate D or not, may be made to project from said plate at different degrees of angles in order to accommodate its use to different degrees of inclination of the bridge-trusses or weights to be raised.

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

1. A device for providing a level bearing for jacks comprising a plate having an angled jaw-bearing projecting therefrom, and means for securing said plate to the object to be elevated.

2. A device for providing a level bearing for jacks comprising two plates having interlocking lugs, one of said plates having an angled jaw-bearing projecting therefrom.

3. A device for providing a level bearing for the jaws of jacks, comprising two plates having lugs projecting in opposite directions from and at right angles to said plates, laterally-projecting lugs on each of said plates arranged to interlock with said right-angled lugs, and an angled jaw-bearing projecting from one of said plates.

4. A device for providing level bearings for the jaws of jacks consisting of two plates provided with lugs at right angles thereto, the lugs on one plate projecting in a direction opposite to that of those on the other plate, and with laterally-projecting lugs, the ends of the lugs on one plate being beveled or inclined in directions opposite to the ends of those of the other, a jaw-bearing projecting from one of said plates, and means for securing said plates against lateral displacement.

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

JOHN WILLIAM HORTH.

Witnesses:

J. B. SWAN,

L. B. HALL.