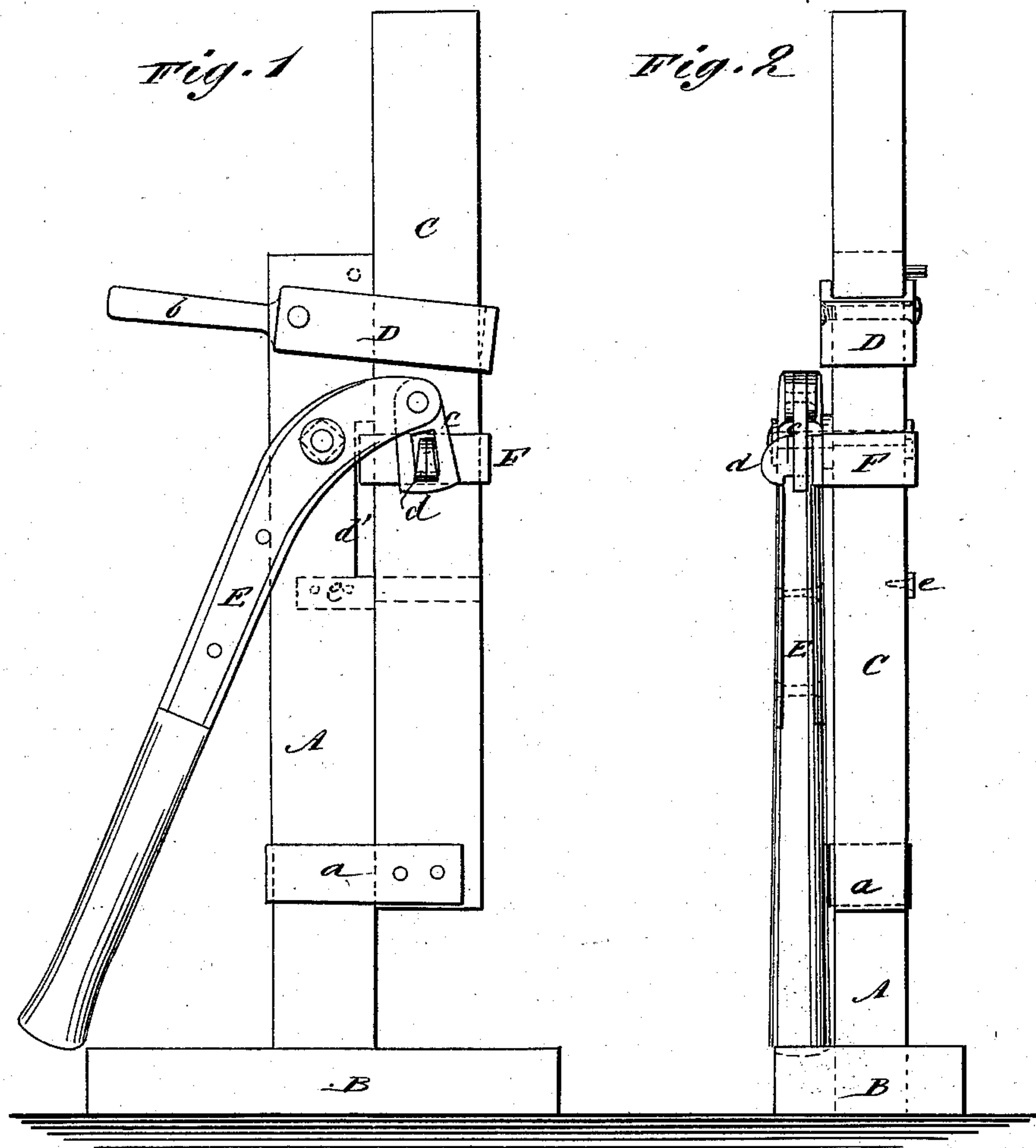


J. S. BLACKBURN & S. G. BROSIUS.  
Lifting-Jack.

No. 219,676.

Patented Sept. 16, 1879.



WITNESSES:

*C. Naveux*  
*C. Sedgwick*

INVENTOR:

*J. S. Blackburn*  
BY *S. G. Brosius*  
*Mumford*  
ATTORNEYS.

# UNITED STATES PATENT OFFICE.

JOSEPH S. BLACKBURN AND SAMUEL G. BROSIUS, OF BELOIT, OHIO.

## IMPROVEMENT IN LIFTING-JACKS.

Specification forming part of Letters Patent No. **219,676**, dated September 16, 1879; application filed May 28, 1879.

*To all whom it may concern:*

Be it known that we, JOSEPH S. BLACKBURN and SAMUEL G. BROSIUS, of Beloit, in the county of Mahoning and State of Ohio, have invented a new and Improved Lifting-Jack, of which the following is a specification.

The object of this invention is to provide a jack for raising wagons to remove the wheels, and for other similar purposes, in which the lifting-bar is operated and secured in place by friction-clasps.

It consists of a lifting-bar having on its lower end a socket-piece, which is passed over the standard, while at the upper end of the standard is a pivoted strap, through which the bar is passed.

A metal collar is placed over the lifting-bar and connected by a link with a lever fulcrumed in the standard. By moving this collar up it clasps the bar and lifts it, and as soon as its support is withdrawn the bar draws the strap down against it, so that it is clasped between the strap and the standard and securely held.

In the accompanying drawings, Figure 1 is a side elevation of our improvement. Fig. 2 is a front view of the same.

Similar letters of reference indicate corresponding parts.

Referring to the drawings, A is the standard of the jack, rising from the base B, and C is the lifting-bar. On the lower end of the bar is a fixed socket, *a*, through which the standard is passed, so that the bar will move easily up and down. At the top of the standard a strap, D, bent into a rectangular loop, has its ends pivoted to the standard, while a short handle, *b*, projects backward from one end. Through the rectangular loop the lifting-bar is passed.

The strap is permitted to turn on its pivot slightly, assuming a position at right angles or at an obtuse angle to the bar. In the latter position it clasps the lifting-bar closely against the face of the standard, and holds it securely against slipping down by the friction alone.

E is a lever, fulcrumed on the side of the standard, and having on its short arm a link, *c*. The latter is looped over the hooked projections *d* on the collar F, clasped loosely around the lifting-bar. A recess, *d'*, is made in the face of the standard, to give space for the collar to move freely up and down.

The operation of this device is as follows: By lifting the lever the collar is lowered; it slips down the bar freely. Then reversing the movement of the lever, the collar is thrown in an oblique position relatively to the bar, and, clasping it, lifts it with it. At the same time the strap is thrown up by the movement of the bar, and thus allows it to slip up freely; but when the collar is lowered again the slight backward movement of the bar throws the strap down and causes it to clasp it closely against the face of the standard and hold it securely.

To lower the bar, the strap is moved by the handle *b* so as to relieve the bar of any restraint, and the collar is placed in a similar situation, when the bar drops by its own weight. On one side of the standard is a guard, *e*, to limit the upward movement of the bar by coming in contact with the socket *a*.

The upper end of the bar should be shod with iron, to prevent it from splitting or bruising from contact with and the weight of the objects it is used to lift.

Having thus described our invention, we claim as new and desire to secure by Letters Patent—

The combination, in a lifting-jack, with the support A B, of the lifting-bar C, connected with the loop *a*, the lever-strap D, pivoted to standard A, and having an end loop, through which passes bar C, the end-curved lever E, pivoted to said standard, the link *c*, and the loose collar F, having projections working in recess *d'* of standard, all constructed and arranged substantially as shown and described.

JOSEPH STANLEY BLACKBURN.

SAMUEL GATCHELL BROSIUS.

Witnesses:

AMASA COBB,

F. W. McCLEERY.