

B. F. STEPHENS.
Detachable Vise-Jaws.

Patented Oct. 20, 1874.

No. 156,105.

Fig. 2.

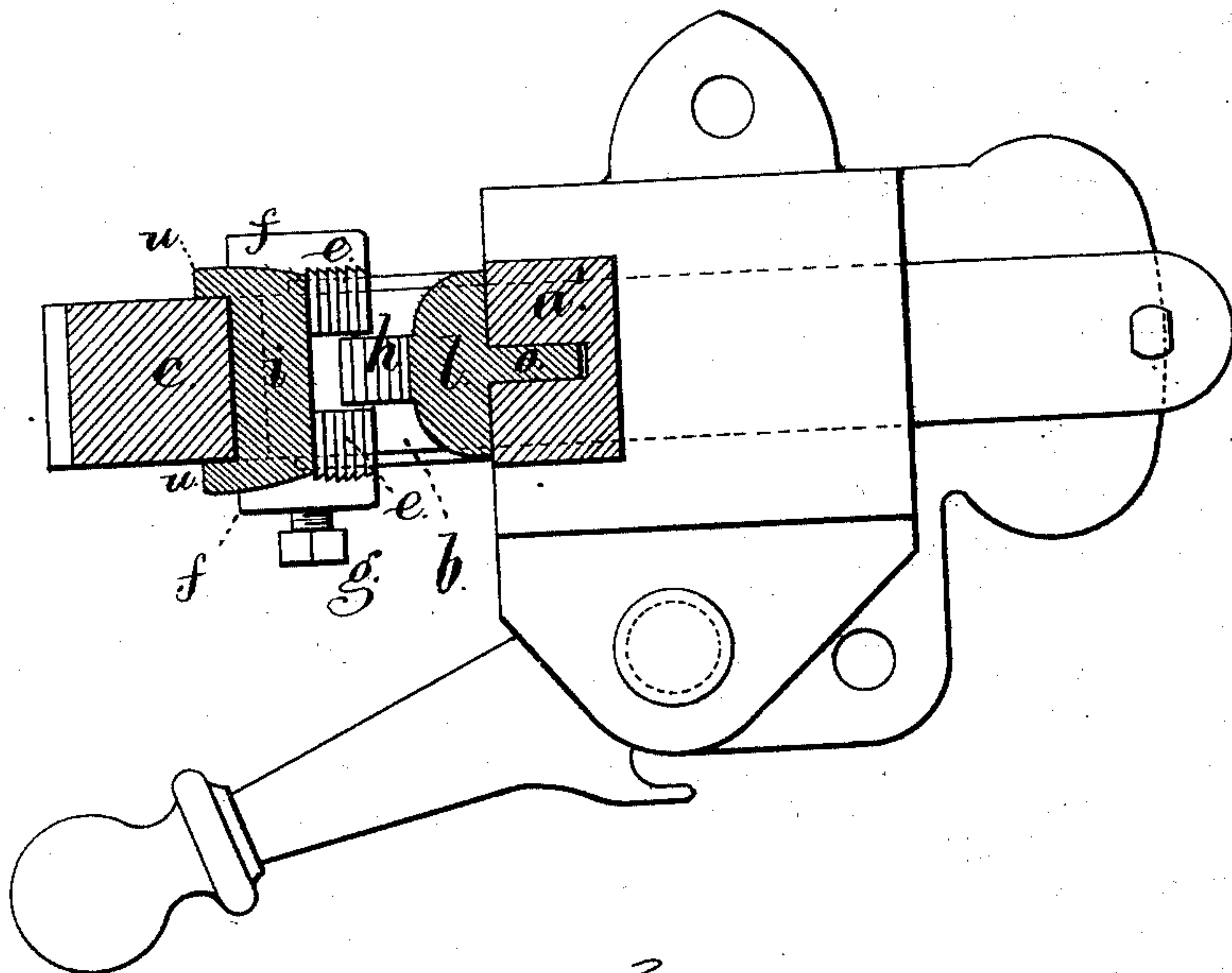
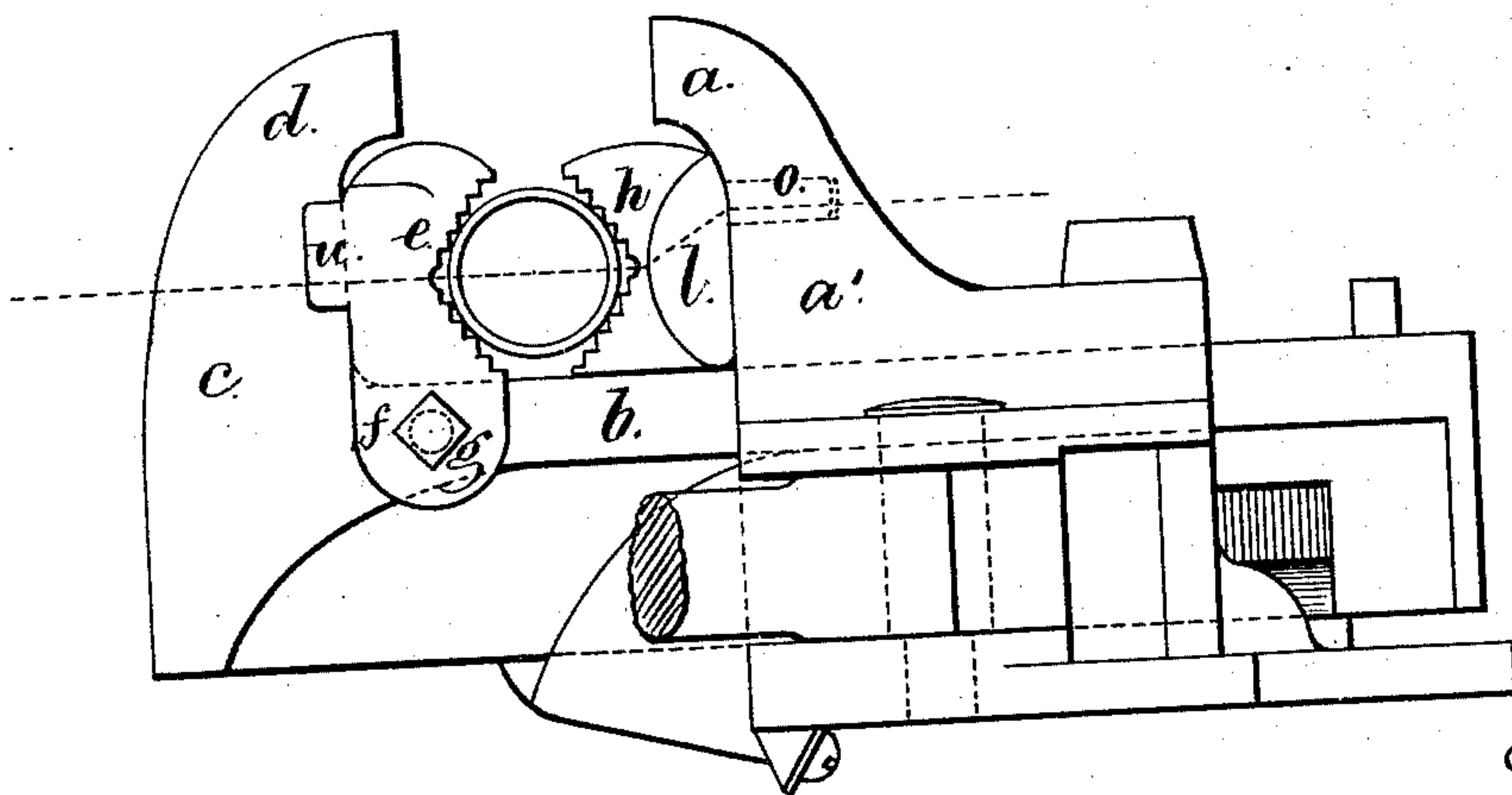


Fig. 1.



Witnesses,

Chas. H. Smith
Geo. T. Quickeney

Inventor

Benjamin F. Stephens
per Lemuel W. Perrell
att'y.

UNITED STATES PATENT OFFICE.

BENJAMIN F. STEPHENS, OF BROOKLYN, NEW YORK, ASSIGNOR TO THE
STEPHENS PATENT VISE COMPANY, OF NEW YORK, N. Y.

IMPROVEMENT IN DETACHABLE VISE-JAWS.

Specification forming part of Letters Patent No. **156,105**, dated October 20, 1874; application filed
January 27, 1874.

To all whom it may concern:

Be it known that I, BENJAMIN F. STEPHENS, of Brooklyn, in the county of Kings and State of New York, have invented an Improvement in Vise Attachments, of which the following is a specification:

V-shaped jaws with corrugated surfaces have been used for holding pipes and other cylindrical articles, and one jaw has passed between two other jaws, and these jaws have been applied to the parallel and vertical stocks of ordinary vises, below the heads or jaws.

My improvement is made for facilitating the connection of such jaws to the vise stocks or their removal from the same.

In the drawing, Figure 1 is a side view of such jaws as applied to a vise, and Fig. 2 is a sectional plan of the same.

The stationary jaw *a*, with its stock *a'*, are of usual character, and through the metal thereof the slide-bar *b* passes, and at its outer end this bar *b* carries the stock *c* of the jaw *d*. The mechanism for moving the jaw *d* toward the jaw *a* may be of any usual character. The double V-jaws *e* are connected by a back, *i*, that rests against the vertical face of the stock *c*, and there are also ears *f f* that project downwardly from the jaws *e*, so as to set outside the bar *b*, and through one of these ears *f* there is a clamping-screw, *g*. The single V-jaw *h* is made with a back, *l*, that rests against the vertical face of the stock *a'*, and it is held in place by means of a suspended pin,

o, made with or attached firmly to the upper back part of this jaw, and said pin passes freely into a nearly horizontal hole in the stock *a'*, and there may be a spring in the hole or upon the pin, to prevent injury to the pin by allowing it to yield slightly in the hole in the stock when under pressure.

This construction is cheap and reliable, and the pipe-jaws can be removed from the vise with great rapidity or replaced, and the jaws are not weakened by the employment of this device.

The projecting lugs *u u* at the back portions of the jaws *e* pass at each side of the stock *c*, and serve to hold the said jaw more steadily in place under the strain to which it may be subjected.

These vise-jaws may be made of cast or wrought metal, and the teeth upon the surfaces should be of steel or hardened.

I claim as my invention—

The double V-jaws *e*, connected by a back, *i*, and provided with ears *f* and lugs *u*, to fit upon the bar *b* and stock *c*, below the grasping-face of the vise-jaw, in combination with the single V-jaw *h*, sustained by the pin *o*, that passes into a hole in the stock *a'* of the vise, substantially as set forth.

Signed by me this 23d day of January, A. D. 1874.

BENJ. F. STEPHENS.

Witnesses:

GEO. T. PINCKNEY,
CHAS. H. SMITH.