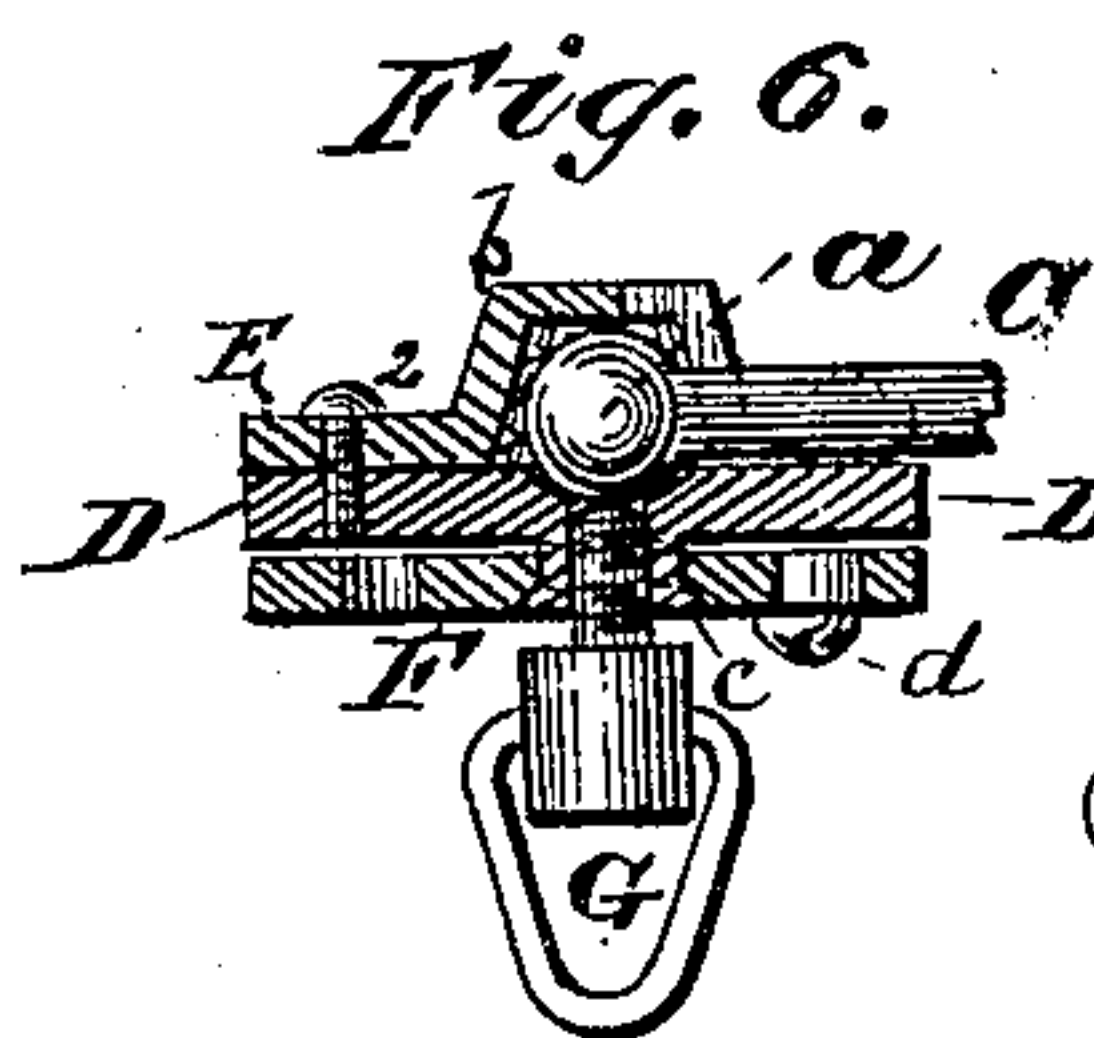
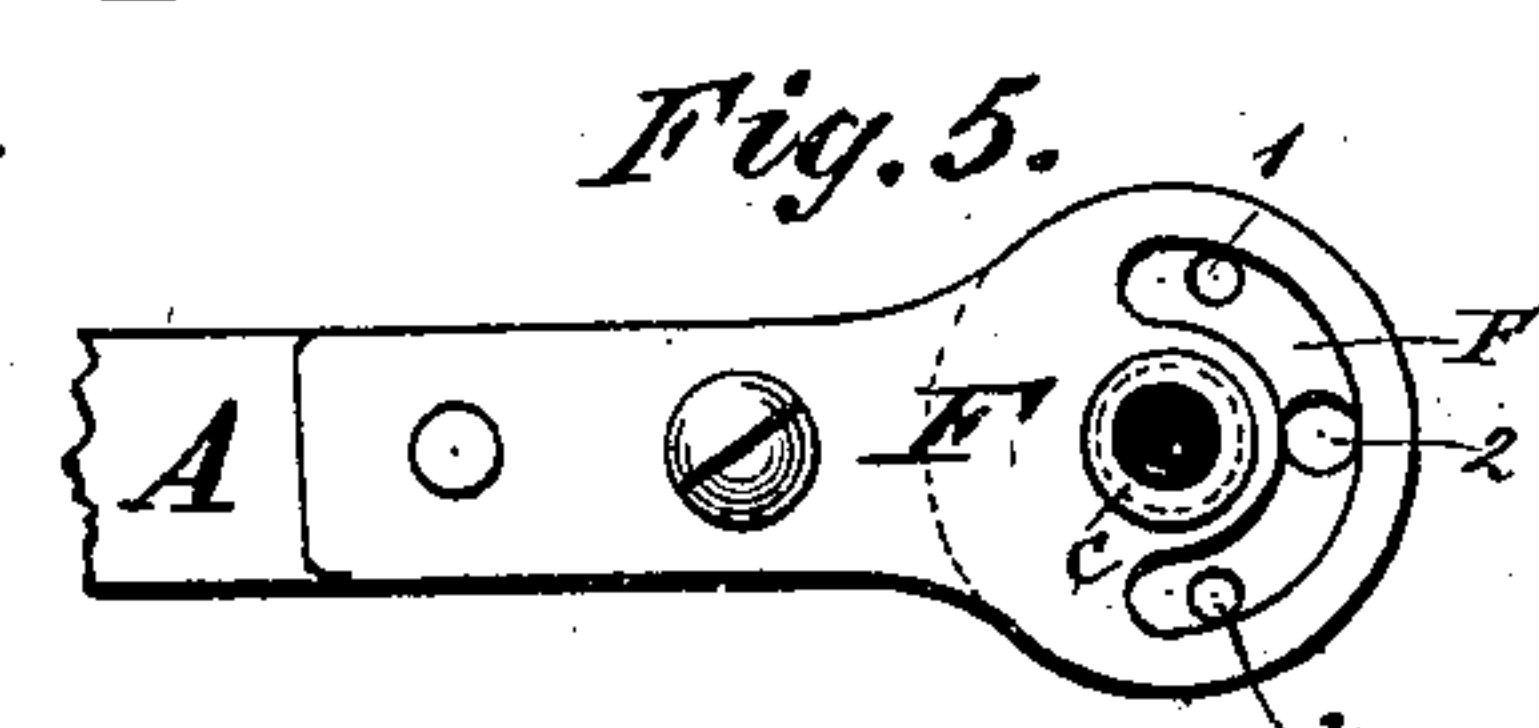
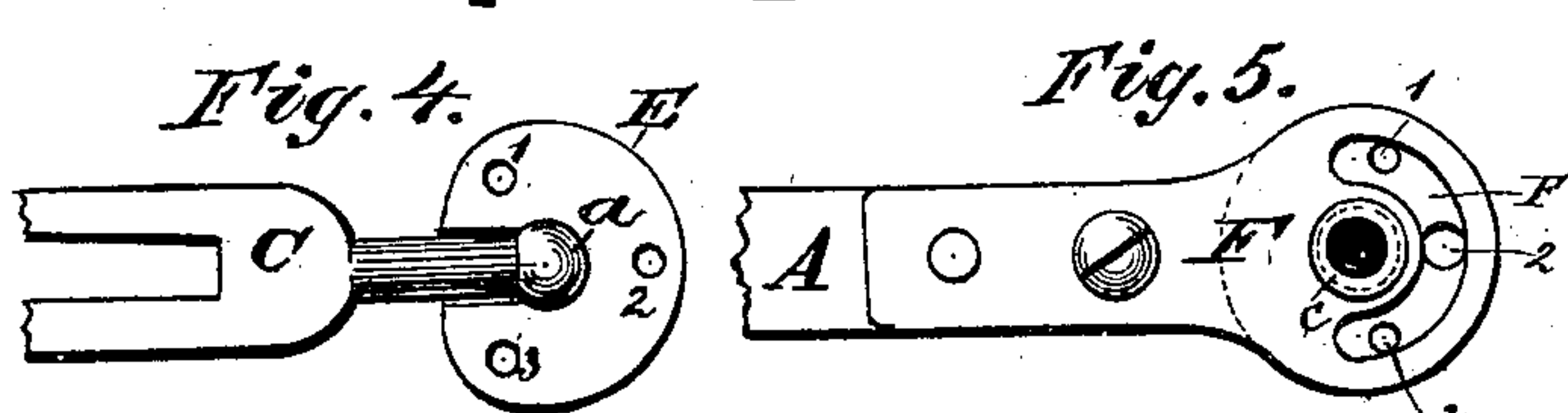
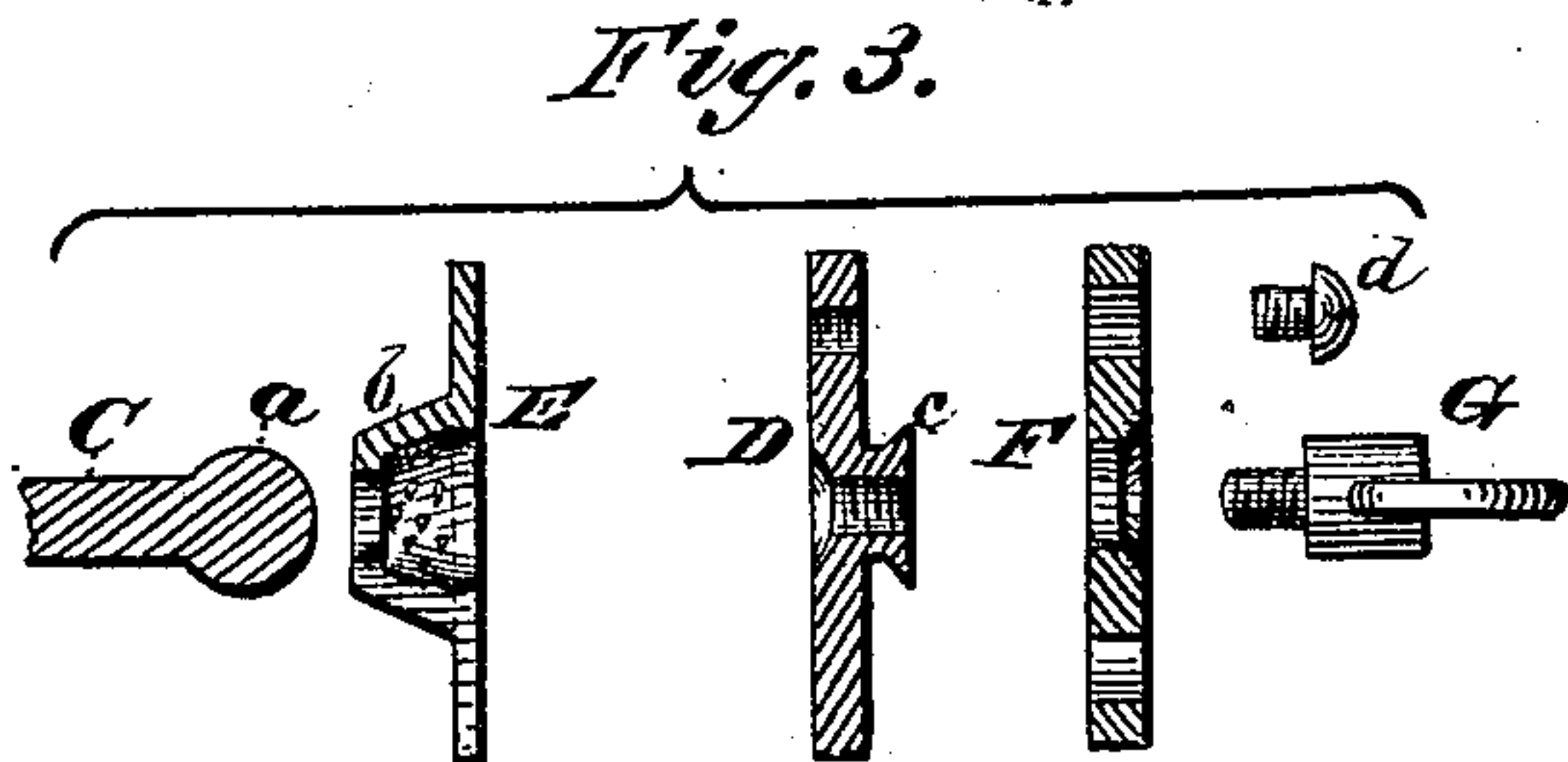
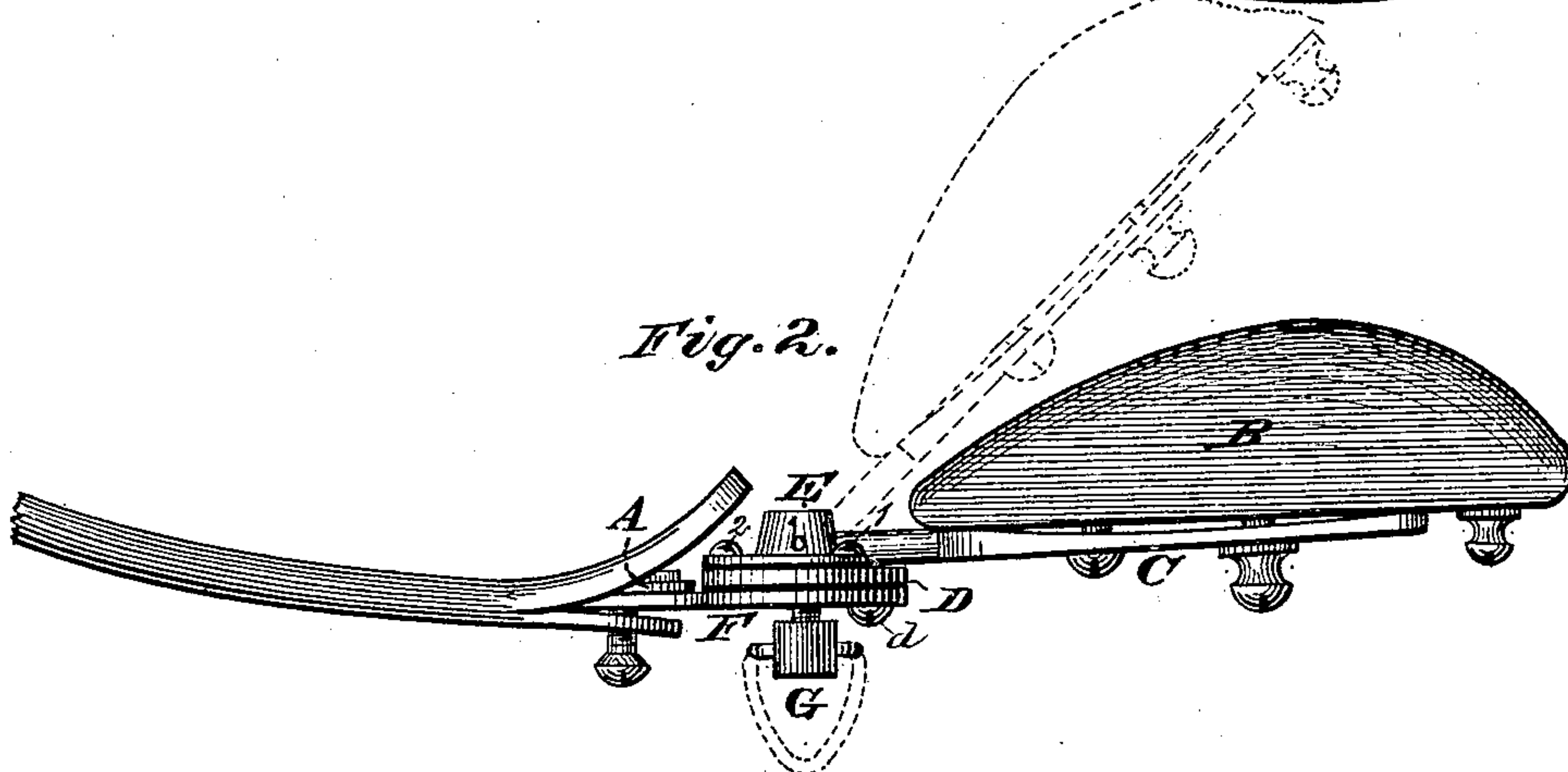
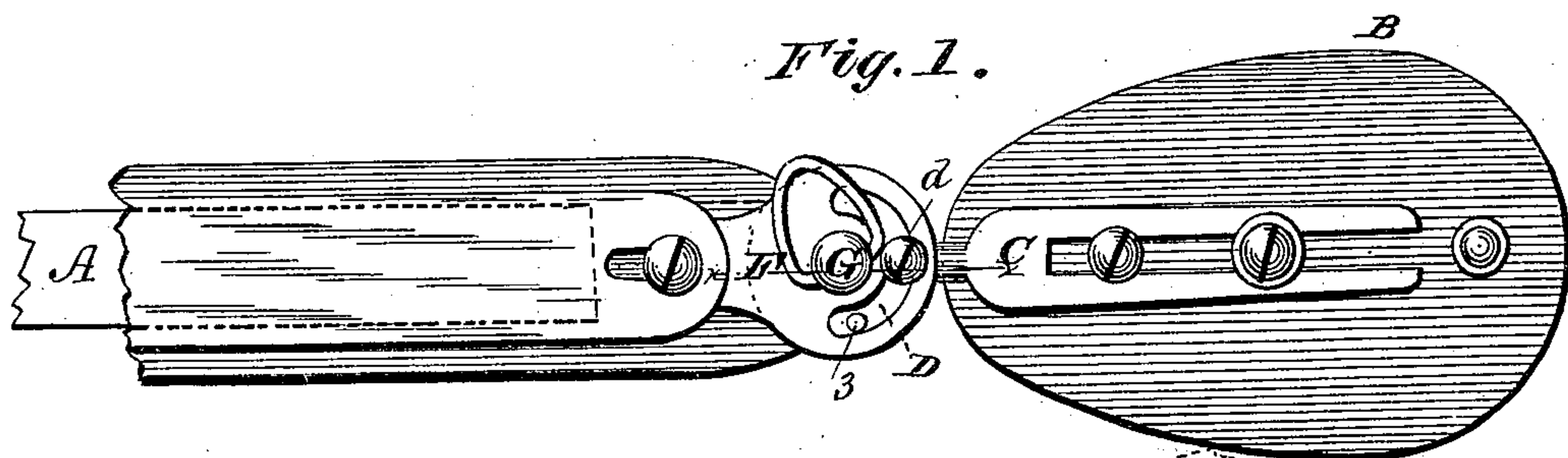


(No Model.)

G. W. ELLIS.  
TRUSS.

No. 245,467.

Patented Aug. 9, 1881.



WITNESSES:

*Frederic G. Dubouché*  
*Amos W. Hart*

INVENTOR:

*Geo. W. Ellis*

BY

*Amos W. Hart*  
ATTORNEYS.

# UNITED STATES PATENT OFFICE.

GEORGE W. ELLIS, OF PHILADELPHIA, PENNSYLVANIA.

## TRUSS.

SPECIFICATION forming part of Letters Patent No. 245,467, dated August 9, 1881.

Application filed May 24, 1881. (No model.)

*To all whom it may concern :*

Be it known that I, GEORGE W. ELLIS, of Philadelphia, in the county of Philadelphia and State of Pennsylvania, have invented a new and Improved Truss; and I do hereby declare that the following is a full, clear, and exact description of the same.

I have received Letters Patent of the United States, No. 222,579, for a truss for reducing hernia, in which the pad is attached to the spring by means of a metal bar having a spherical head that is confined between two clamping plates or jaws, forming a permanent and rigid attachment of the spring.

My present invention is an improvement upon such device, and I will proceed to describe its construction and operation by reference to accompanying drawings, in which—

Figure 1 is a front view, and Fig 2 a top or edge view, of my improved truss, save the body-straps and a portion of the spring. Fig. 3 represents, detached from each other, the several parts constituting the adjustable connection between the pad and spring. Fig. 4 is an inner side view of the pad-bar and socket-disk connected, as required, for use. Fig. 5 is a front view of the slotted plate attached to the truss-spring. Fig. 6 is a horizontal section on line *x x*, Fig. 1.

The spring A is provided with the ordinary leather sheath and body-strap. The pad B is attached to a forked bar, C, which has a spherical head, *a*, that enters a socket formed by and between the circular steel disks D E, which are rigidly connected by screws 1 2 3, and form an attachment of the spring A, or of a plate, F, secured to the latter. To form the said socket the disk D is provided with a countersunk hole in its inner side, and the inner disk, E, has a central conical or hood-shaped projection, *b*, which is notched on one side to accommodate the shank of the pad-holding bar C, and allow adjustment of the same to enable the pad to be placed at various angles. The spherical head *a* of the bar C is thus

confined in a socket of corresponding shape, and it is clamped to hold the pad in any required position by means of a thumb-screw, G, which passes through the tubular pivot of the disk and bears directly on said head, as shown in Fig. 6. To assist in holding the head of bar C the bottom of the socket *b* is provided with short teeth, as shown in Fig. 3. The pivot *c* passes through the center of the circular head of plate F, and is upset so as to secure the two parts D E together, and yet allow the disk to rotate freely to permit the pad A to be shifted vertically. The clamp-screw *d* serves to hold the pad fixed in any vertical adjustment, the same passing through an arc-shaped slot in the head of plate F and entering the disk D.

By means of the two disks D E and the thumb-screw, constructed and connected in the particular manner shown and described, I form a very compact, secure, serviceable, and easily and quickly adjustable clamp, by which the pad-bar C is held at any required angle.

I do not claim the screw and arc slot, they having long been employed for substantially the same purpose as in this instance; nor do I claim, broadly, the application of a screw-clamp for securing a pad-holding bar in different adjustments.

What I do claim is—

The combination, with the pad-holding bar having a spherical head, and the plate F, having a central aperture, of the disks D E, which are rigidly connected so as to rotate together, one of said disks having a hollow tapped pivot-post, and the other a notched and toothed socket, as specified, and the thumb-screw, which enters said post and bears directly on the head of the bar, all as shown and described, to operate as specified.

GEO. W. ELLIS.

Witnesses:

CHAS. A. SCHMIDT,  
FRANK CRAVEN.