

*F. B. Sweetland,
Paper Cutter.*

No. 100,465.

Patented Mar. 1 1870.

Fig. 1.

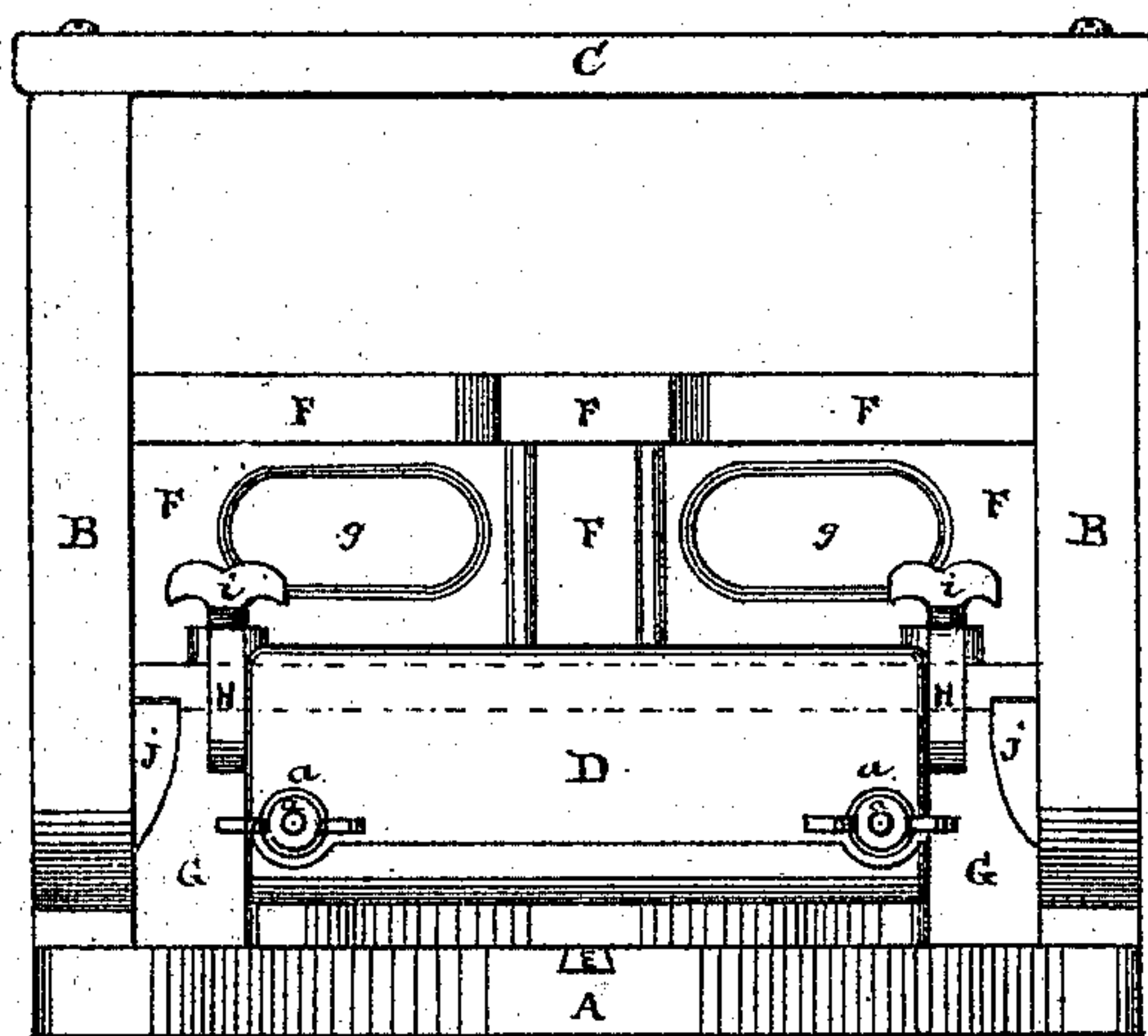


Fig. 2.

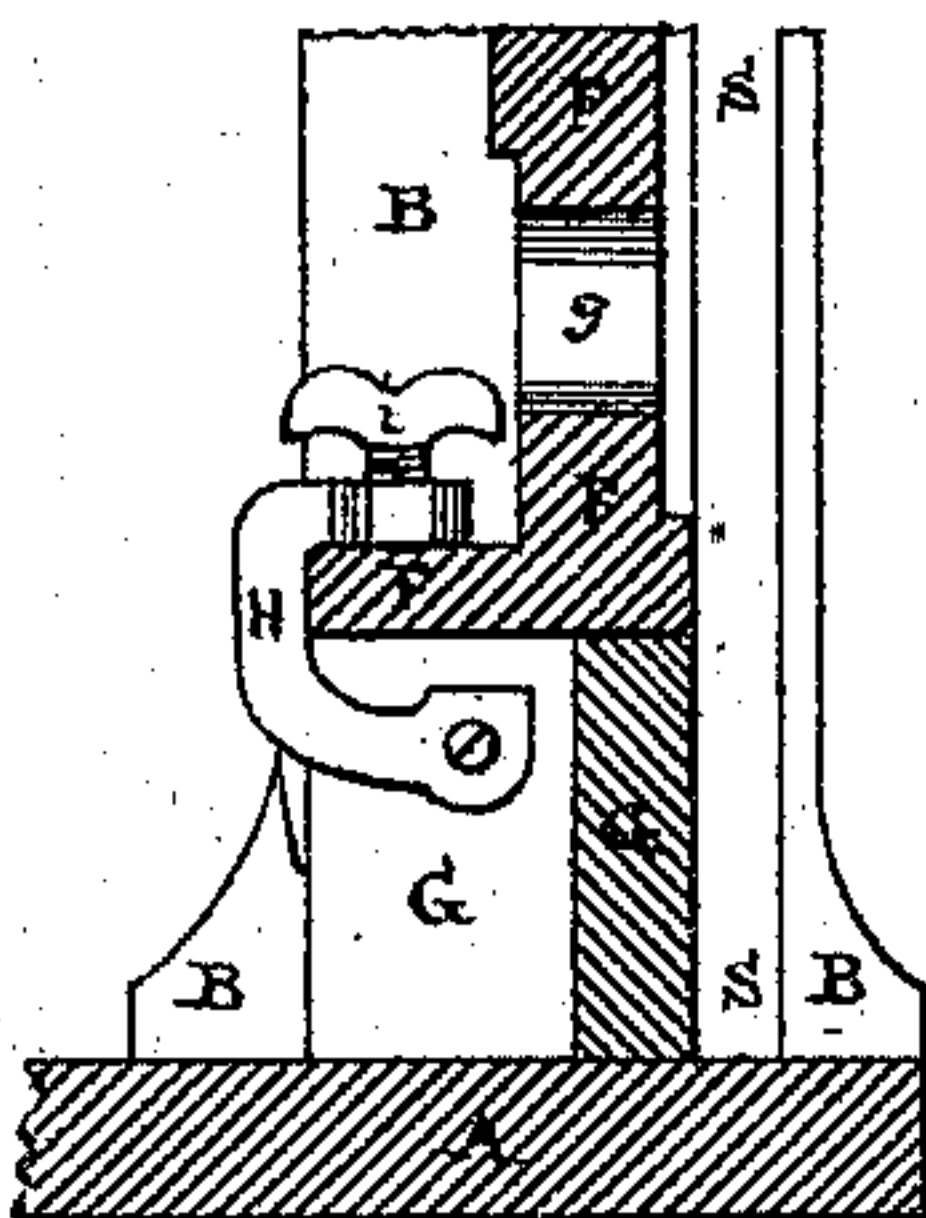


Fig. 4.

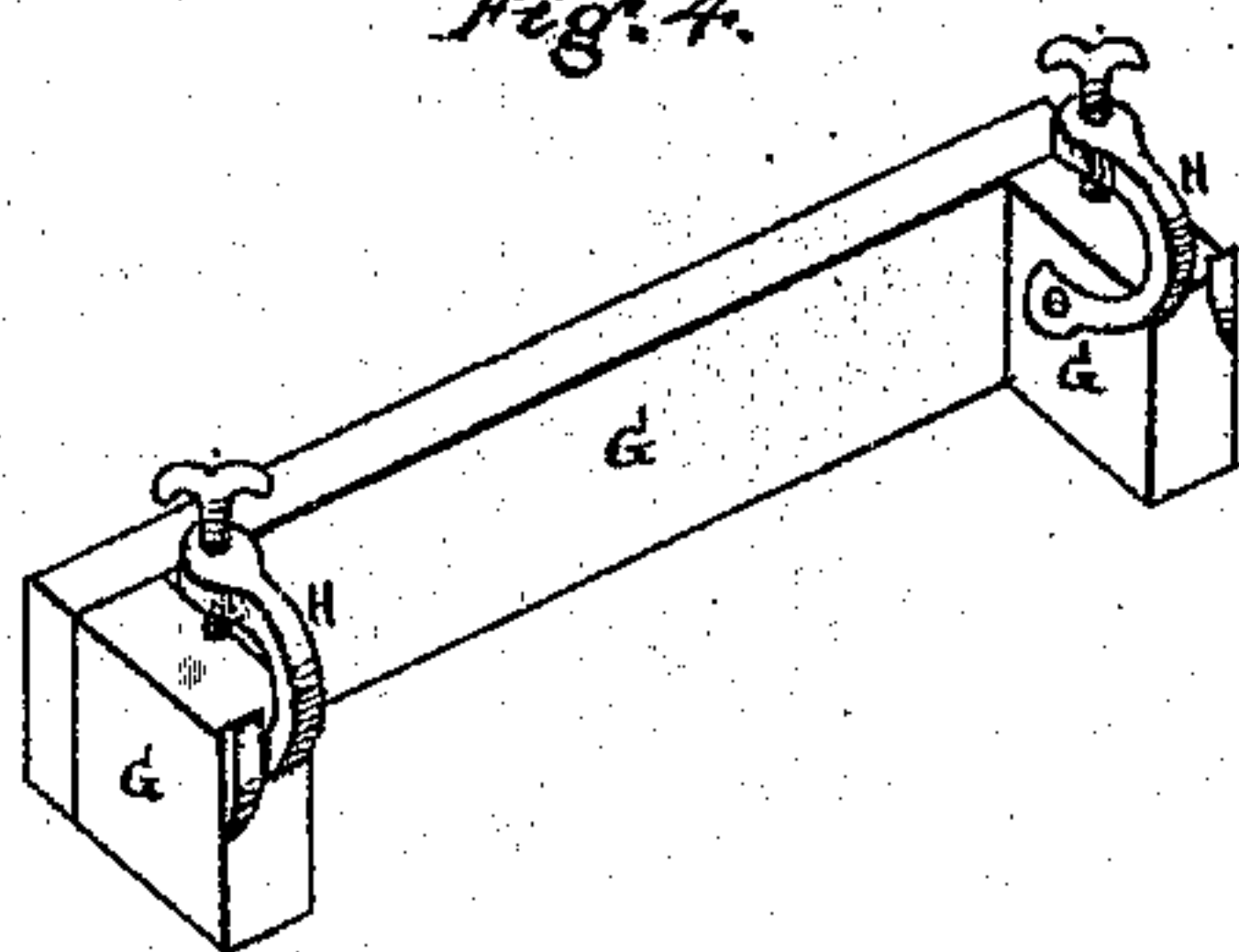


Fig. 5.

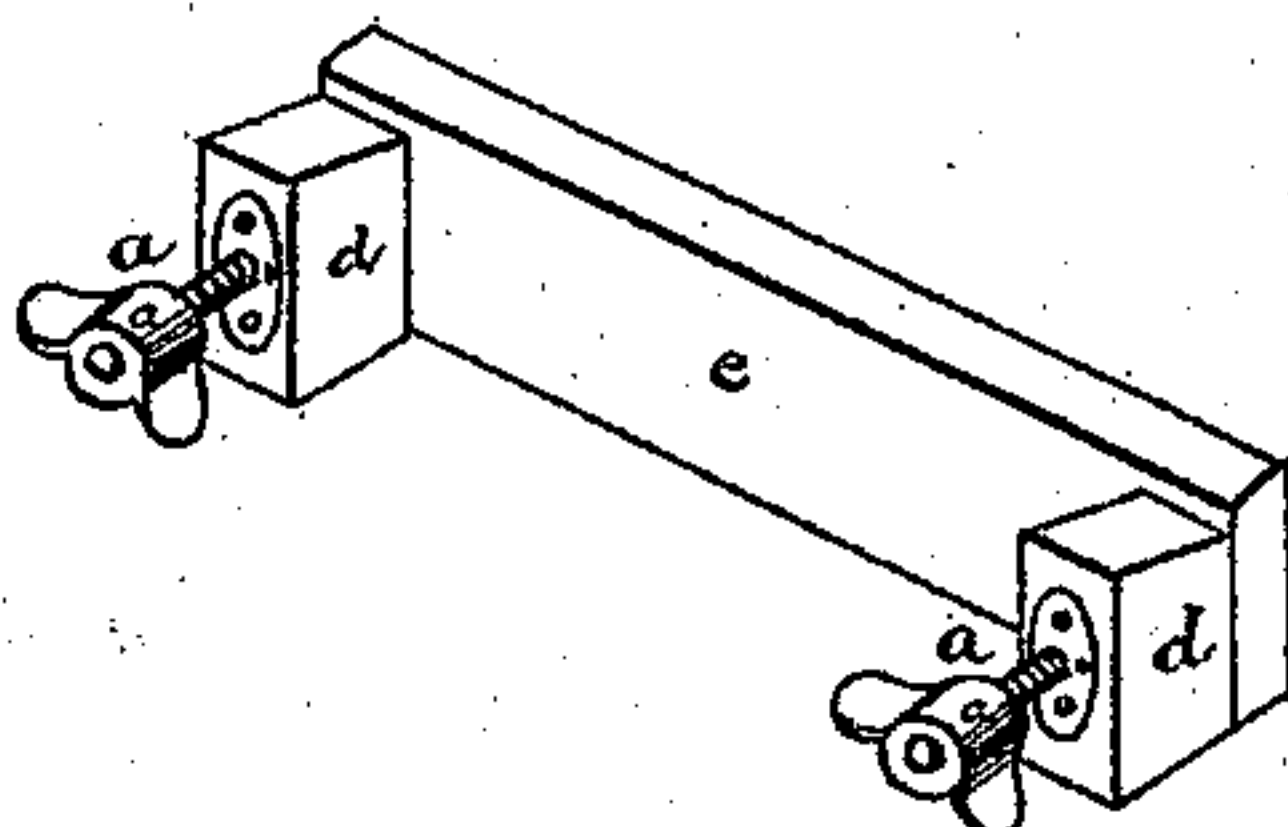
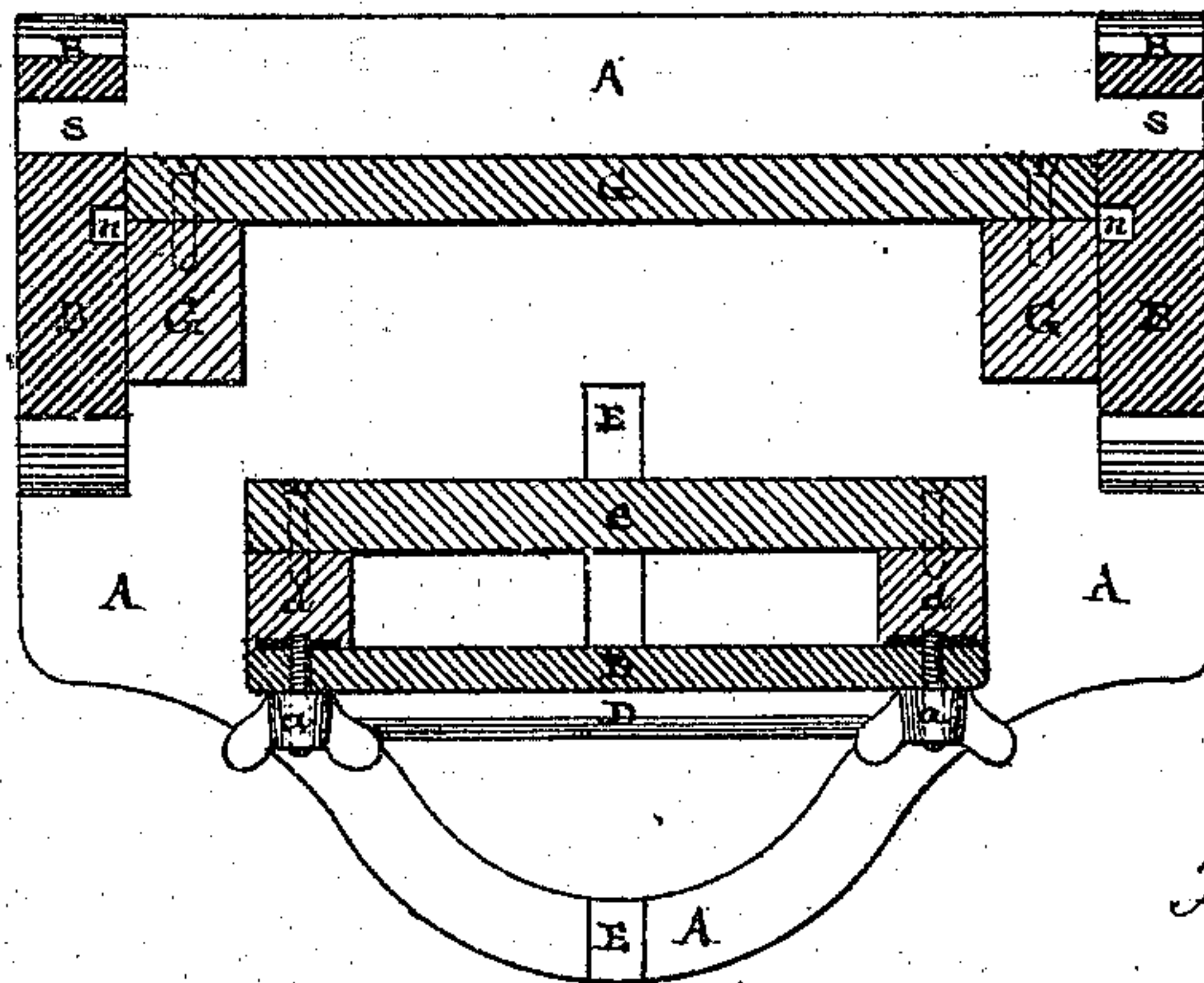


Fig. 3.



Witnesses.

*W. B. Bradley
F. H. Howard*

Inventor.

*F. B. Sweetland
By his Attorney
Chas. F. Mansbury*

United States Patent Office.

FREDERICK B. SWEETLAND, OF NEW HAVEN, CONNECTICUT, ASSIGNOR TO GEORGE H. SANBORN AND JOSEPH S. SANBORN, OF NEW YORK CITY.

Letters Patent No. 100,465, dated March 1, 1870.

IMPROVEMENT IN PAPER-CUTTING MACHINES.

The Schedule referred to in these Letters Patent and making part of the same.

To all whom it may concern:

Be it known that I, F. B. SWEETLAND, of New Haven, in the State of Connecticut, have invented a new and improved Clamp and Gauge for Cutting-Machines; and do hereby declare the following to be a full and correct description of the same, reference being had to the accompanying drawings, in which—

Figure 1 represents a front elevation of my invention as attached to an ordinary paper-cutting machine;

Figure 2 is a transverse vertical section of the same on line *x x* of fig. 1;

Figure 3, a horizontal section on line *y y* of fig. 1;

Figure 4 is a separate perspective view of the attachment to the clamp; and

Figure 5 is a similar view of the attachment to the gauge.

The same part is indicated by the same letter of reference in whatever figure it may occur.

This invention relates to certain improvements in cutting-machines, whereby the paper or other article to be cut may be gauged and held at the required distance from the knife of the machine, to be cut into very narrow strips; and to this end

My invention consists in the employment of peculiar attachments to the ordinary clamping and gauging devices, constructed and arranged as hereinafter more fully set forth.

In the accompanying drawings—

A represents the bed-plate of the machine, into which are mortised the standards B B, which are held together at the top by the cap-piece C, by screws or otherwise.

D is the ordinary gauge, constructed as shown in figs. 1 and 3, and having affixed to it a removable attachment, consisting of the ends *e* and *d*, and back *e*, the said attachment being made removable by means of the screw bolts and nuts *a a*, by which it is affixed to the upright portion D of the gauge.

In the dovetail groove E, made in the upper central portion of bed A, slides a rail of corresponding form, secured to the under side of the horizontal portion of the gauge D.

F designates the clamp for holding the paper or other article while being cut. This clamp is of the usual form, and is operated in the ordinary manner.

G represents the removable attachment intended to be affixed to the clamp F. It consists of a back piece and two end pieces or blocks, secured at right angles to the said back piece, and placed under the lower face of the clamp F.

The attachment G is made adjustable and removable by means of the braces H, one end of each of said braces being secured to one of the end pieces of the attachment G, and the other end furnished with an opening, through which a set-screw, *i i*, passes, entering or pressing against the horizontal portion of the clamp F, as clearly shown in fig. 2.

S S are slots in the sides of the standards B, in which the knife operates, in the usual manner.

n n are grooves for the reception of the ends of the clamp F, to give it proper guidance in the standards B.

j j indicate stops, secured to the outer upper portions of the end pieces of attachment G, and so constructed as to limit the movement of the attachment G in the direction of the knife.

In the ordinary cutting-machines the width of the lower face of the clamp F is the measure of the width of the strip that can be taken from the paper or other article to be trimmed or cut. This results from the fact that the knife plays against one edge of the clamp, and the gauge which feeds the material to the knife abuts against the other edge.

It is frequently desirable to cut strips much narrower than the lower face of the clamp, and the attachments which are hereinbefore described enable this to be done, inasmuch as the attachment to the gauge D is received in between the end pieces of the attachment G, and can feed the material up toward the knife within the thickness of the vertical portion of the attachment G, and this piece may be made as thin as may be desired.

When the nature of the work does not require the material to be cut into narrow strips, the attachments can be removed, and the machine used in its ordinary form.

Having thus fully described my invention,

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

The use of the removable and adjustable attachments *e* and G, in combination with a cutting-machine, said attachments being constructed and operating substantially in the manner described.

The above specification of my said invention signed and witnessed at New Haven, Connecticut, this 16th day of November, A. D. 1869.

F. B. SWEETLAND.

Witnesses:

HENRY ROGERS,
THOS. DORY.