No. 777,056. PATENTED DEC. 6, 1904.

A. N. EASTMAN.

SHEARS.

APPLICATION FILED AUG. 22, 1904.

NO MODEL.

Fig. 1.

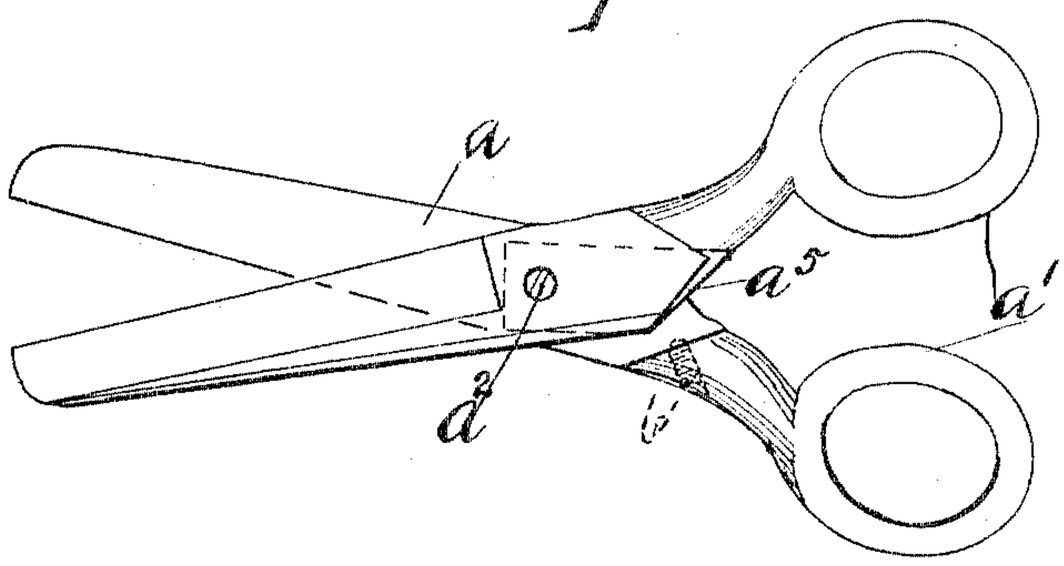


Fig. 2.

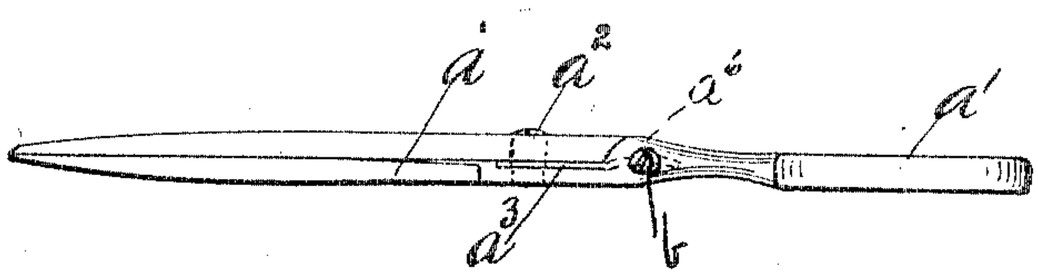
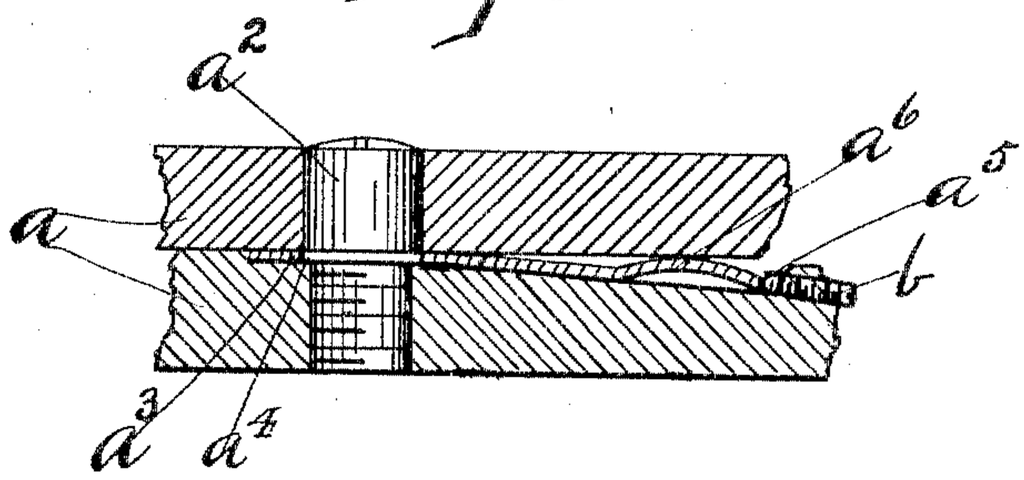


Fig. 3.



WITNESSES:

M. L. Dodson

C. W. Burnam

INVENTOR.

Albert N. Eastman,

BY

Harry Lea Dodson.

ATTORNEY.

No. 777,056. Patented December 6, 1904.

UNITED STATES PATENT OFFICE.

ALBERT N. EASTMAN, OF CHICAGO, ILLINOIS.

SHEARS.

SPECIFICATION forming part of Letters Patent No. 777,056, dated December 6, 1904.

Application filed August 22, 1904. Serial No. 221,686. (No model.)

To all whom it may concern:

Be it known that I, ALBERT N. EASTMAN, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Shears, of which the following is a specification.

My invention relates to those shears having spring-actuated means for causing a shear cut, and has for its object to provide a simple and inexpensive spring which shall be capable of adjustment and which may be used without any material change necessary in the construction of the shears. My method of attaining this object may be more readily understood by having reference to the accompanying drawings, which are hereunto annexed and which are a part of this specification, in which—

Figure 1 is a top or plan view of a pair of shears with my improved attachment. Fig. 2 is an edge view of the same. Fig. 3 is an enlarged detail, partly in section, showing my improved device.

Similar letters refer to similar parts throughout the entire description.

In the drawings, a is a pair of shears constructed in the usual manner, having handles a' connected to the blades by means of the usual shanks. The blades are pivoted by a pivot-screw a^2 of the ordinary construction. Between the two blades, extending from the pivot-pin and back to the shoulder-joint, I insert a flat spring a^3, having a hole a^4 near one end, through which the pivot-screw a^2 passes. An arch a^6 is formed near the other end, a^5. This arch tends to separate the shanks back of the pivot-pin and, conversely, to cause the blades themselves to meet in shear during the cut. In closing the blades the arch a^6 is flattened down, bringing the end a^5 in contact with the shoulder-joint, which prevents its rotating upon the pivot-pin a^2, and as the further closing of the blades compresses the arch a^6 a tension is exerted which produces a shear cut at all times. A screw b is threaded into one shank of the shears and provides for the adjustment of the tension of the spring, an important feature in shear-cut shears, since it permits the operator to regulate the tension for the work.

It will be readily seen that there is no material change in the shears, with the exception of the addition to a pair of shears of my improved spring and the screw b, thereby enabling one to produce a shear-cut shear inexpensively.

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

1. A pair of scissors or shears combined with a flat spring located between the blades of the shears, said spring being formed with an arch near one end and an opening through the other, said opening coinciding with and fitting to the pivot-screw of the shears, means to regulate the tension existing between the blades, said means consisting of a screw threaded into one of the shanks and bearing against the end of said flat spring, for the purpose set forth substantially as described.

2. A pair of scissors or shears combined with a flat spring having an opening near one end through which is passed the pivot-screw of the shears, said spring having an arch near its other end, said arch being formed so as to produce a tension tending to separate the two shanks, a screw threaded into one of the shanks, said screw exerting a lateral pressure against the end of said spring providing means to permit the operator to regulate the said tension, for the purpose set forth substantially as described.

3. A pair of scissors or shears combined with a flat spring located between the blades secured in place by the pivot-pin at one end and the shoulder-joint of the shears at the other, a screw threaded into one of the shanks exerting a lateral pressure against the end of the said flat spring causing the said spring to bow and thereby exert a tension tending to separate the two shanks and thereby produce a shear cut on the blades, for the purpose set forth substantially as described.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

ALBERT N. EASTMAN.

Witnesses:

FRANK WHITE,

ARTHUR G. JONES.