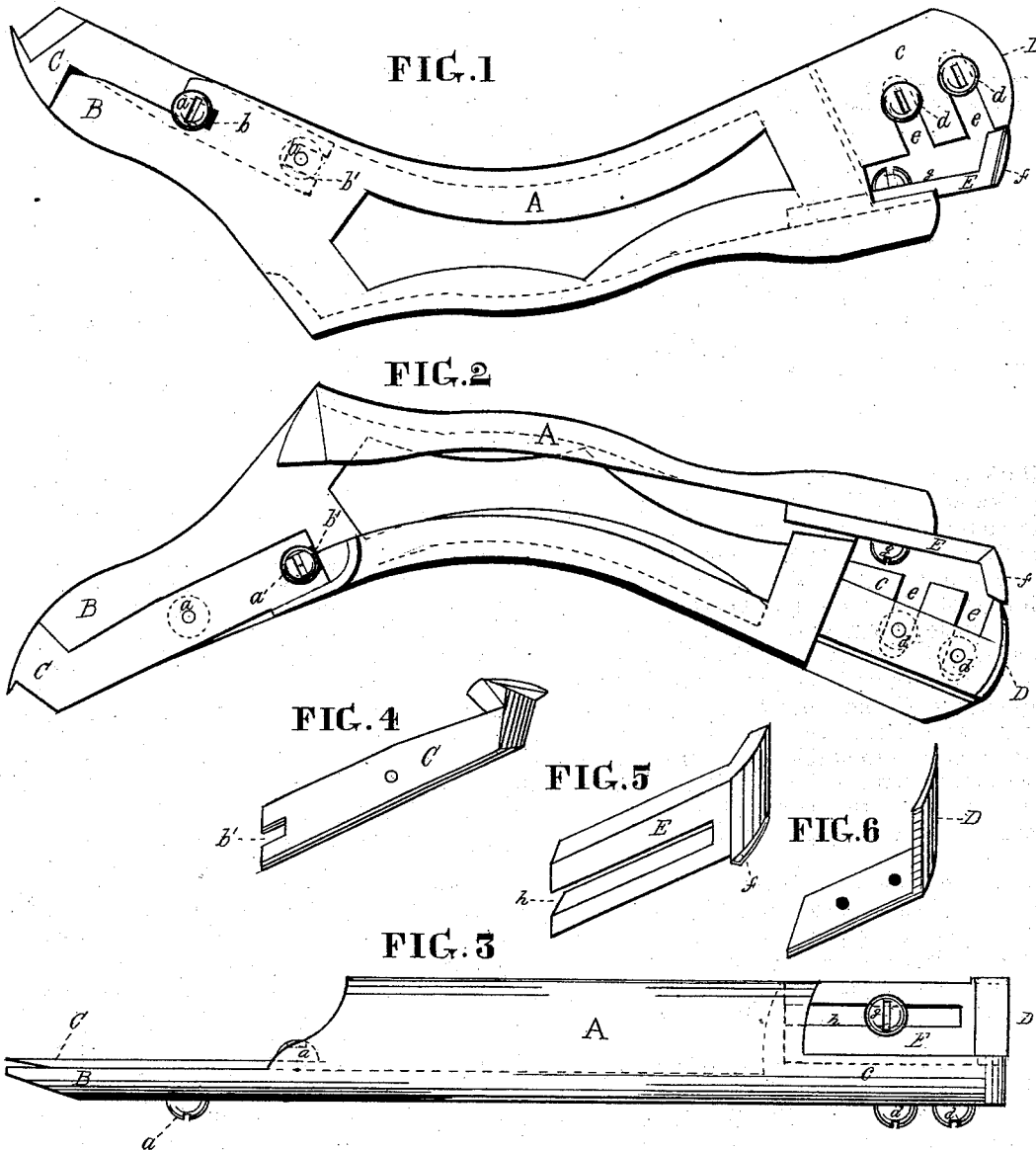


H. VAIL.
Edge-Planes.

No. 155,904.

Patented Oct. 13, 1874.



Witnesses,
Thomas J. Dewley
Isaac Rindge

Inventor,
Henry Vail
By His Attorney
Stephen Vstick

UNITED STATES PATENT OFFICE.

HENRY VAIL, OF EASTON, PENNSYLVANIA.

IMPROVEMENT IN EDGE-PLANES.

Specification forming part of Letters Patent No. **155,904**, dated October 13, 1874; application filed April 8, 1874.

To all whom it may concern:

Be it known that I, HENRY VAIL, of Easton, in the county of Northampton and State of Pennsylvania, have invented a Combined Welt-Plow, Feather-Cutter, and Edge-Shave, of which the following is a specification:

My invention relates to a stock of suitable construction to be used by the hand, having at one end a welt-plow formed in the casting, and an adjustable feather-cutter in combination therewith, and at the other end an edge-shave and gage, both adjustable by means of slots and screws, the end of the stock being open for the passage of the shavings, and to give the operator a view of the action of the cutter.

In the accompanying drawings, Figure 1 is a side view of the improved tool. Fig. 2 is a like view from the opposite side. Fig. 3 is an edge view. Fig. 4 is a perspective view of the feather-cutter C. Fig. 5 is a like view of the edge-shave D. Fig. 6 is a like view of the gage E.

Like letters of reference in all the figures indicate the same parts.

A is the stock, which is hollow to give lightness thereto. It has a welt-plow, B, at one end, formed in the casting, and a feather-cutter, C, in connection therewith. The plow is at a suitable angle with the body of the stock for opening the seam when the stock is held in one hand. The feather-cutter is formed of a plate of steel, and is adjustable by means of the screws *a a*, the slot *b* in the inner end of

the plate, and a slot, *b'*, in the end of the stock A. The plate is readily detached by merely loosening the screws, when the cutter has to be sharpened. The cutter is so arranged with the welt-plow that the latter assists in guiding it, as shown in Figs. 1 and 2. D is the edge-shave, which is confined to the projection *c* of the stock by means of the screws *d d*, which pass through the slots *e e*, whereby it is adjustable in relation to the gage E. The gage is provided with a guiding-lip, *f*, and is confined to the projection *c'* of the stock, at right angles to the projection *c*, by means of the screw *g*, which passes through the longitudinal slot *h* of the gage.

The edge-shave D may be sharpened, without removing it from the stock A, by merely loosening the screw *g*, which confines the gage to the stock, and the withdrawal of the gage.

I claim as my invention—

1. The combination and arrangement of the feather-cutter C with the welt-plow B and stock A, constructed substantially as shown, and for the purpose set forth.

2. The combined tool, consisting of the stock A, welt-plow B, feather-cutter C, edge-shave D, and gage E, all constructed and arranged substantially as shown, and for the purpose stated.

HENRY VAIL.

Witnesses:

CONRADE H. MILLER,
SAML. MOORE.