

S. SMITH.  
SAW-SET.

No. 174,585.

Patented March 7, 1876.

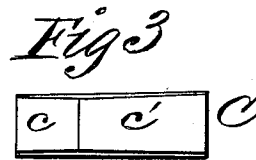
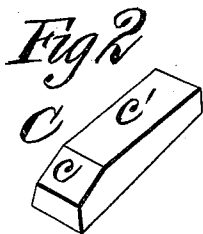
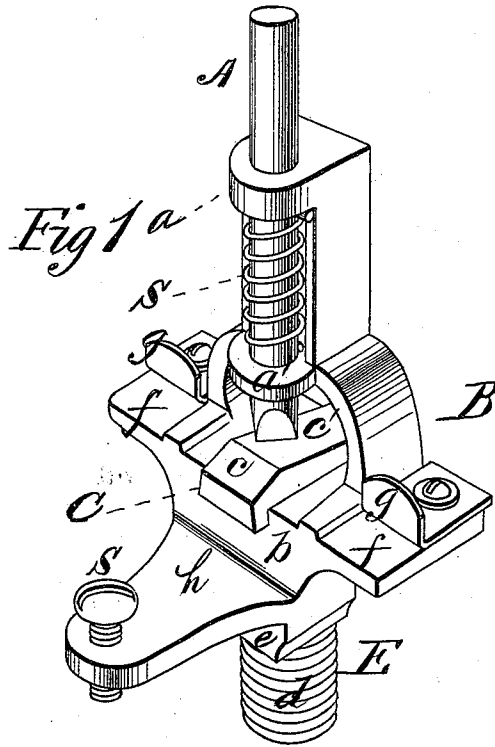


Fig 4 and 5



WITNESSES  
*Robert Emmett*  
*Francis J. Hasi*

INVENTOR  
*Seymour Smith*  
*Gilmore & Co.*  
ATTORNEYS

# UNITED STATES PATENT OFFICE.

SEYMOUR SMITH, OF OAKVILLE, CONNECTICUT.

## IMPROVEMENT IN SAW-SETS.

Specification forming part of Letters Patent No. **174,585**, dated March 7, 1876; application filed January 29, 1876.

### *To all whom it may concern:*

Be it known that I, SEYMOUR SMITH, of Oakville, in the county of New Haven and State of Connecticut, have invented a new and valuable Improvement in Saw-Sets; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figure 1 of the drawings is a representation of a perspective view of my saw-set; and Figs. 2, 3, 4, and 5 are detail views thereof.

This invention has relation to improvements in saw-sets; and it consists in the novel construction and arrangement of the parts, as will be hereinafter more fully set forth, and pointed out in the claim.

In the annexed drawings, the letter A designates a preferably cylindrical setting-tool, which is arranged in guides *a a'* upon a metallic frame, B, and is retracted after each stroke by the recoil of a helical spring, S. The lower end of this tool is cut away in converging lines, so as to form a sector of the same general shape as a saw-tooth, and its lower edge is beveled from the point downward for a purpose hereinafter explained. C represents a detachable anvil-plate, which is, preferably, made of steel, and is seated in the base-plate *b* of the frame. This anvil is passed into its seat from the rear, and is provided upon its upper edge with oppositely-inclined faces *c c'*, the latter inclining from front to rear downwardly, the angle of the incline being the same as the bevel of the setting-tool, so that when they are brought together their contacting surfaces will exactly conform. It is also of wedge form, and is in the shape of a dovetail tenon, being wider at its base than at its upper part, and wider at its heel than at its toe. The seat in which this anvil-plate is seated is of corresponding form, being dovetailed and

wedge-shaped from rear to front, so that when the anvil-plate is pushed into its seat it can go a certain distance and no farther, and when the setting-tool, the inclined face of which is to the front, comes in contact with the inclined face *c'* of the anvil, which is to the rear, the effect will be instead of driving the said anvil off its seat to hold it therein. The base *b* of the frame will be provided with a projection, B, the lower end of which will be screw-threaded, as shown at *d*, and its upper part provided with two or more parallel faces, *e*, so that the device may be clamped in a vise or screwed into a work-bench or block, as may be most convenient. It will also be provided with wings *f*, upon which will be placed adjustable guides *g*, which will serve to regulate the point at which the setting-tool shall strike the saw, so as not to extend inward thereon beyond the teeth, and adapt the same to a different tool for setting teeth of different sizes. There will also be a wing, *h*, at right angles and intermediate to wings *f*, which will be provided with an adjusting-screw, S, designed to hold the saw in a horizontal position.

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

In a saw-setting machine, the frame A, having a wedge-shaped dovetailed seat, a prismatic part, *e*, and a screw-threaded projection, *d*, in combination with a removable anvil, C, provided with a downwardly and rearwardly inclined face *c'*, and the setting-tool A, having an oppositely-inclined face, *i*, substantially as described, and for the purpose set forth.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

SEYMOUR SMITH.

Witnesses:

GEO. F. HUNGERFORD,  
N. T. WARNER.