

(No Model.)

H. H. HITCHCOCK.

SAW SET.

No. 256,217.

Patented Apr. 11, 1882.

Fig. 1.

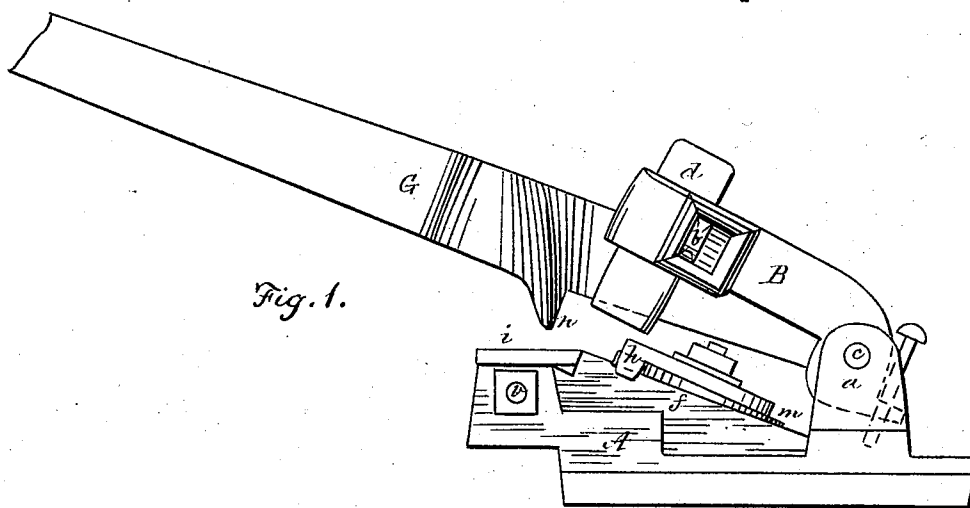


Fig. 2.

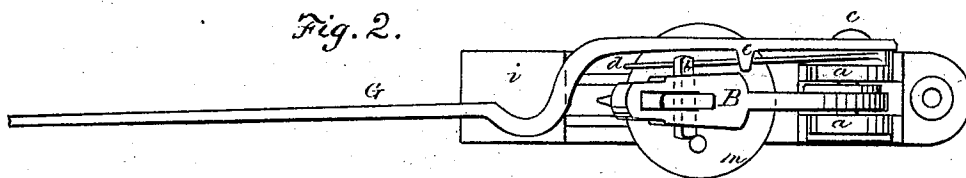


Fig. 4.

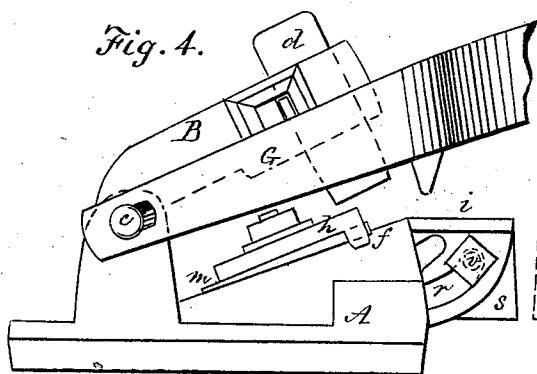


Fig. 3.

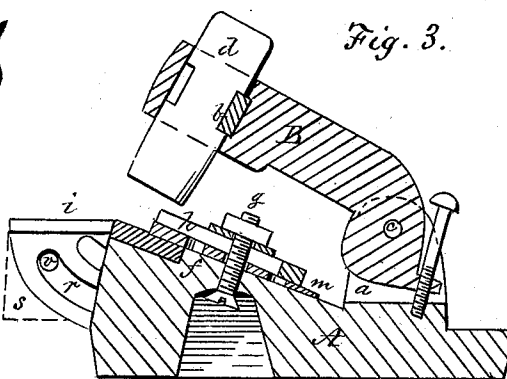


Fig. 5.



Witnesses

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HIRAM H. HITCHCOCK, OF IONIA, MICHIGAN.

SAW-SET.

SPECIFICATION forming part of Letters Patent No. 256,217, dated April 11, 1882.

Application filed December 23, 1881. (No model.)

To all whom it may concern:

Be it known that I, HIRAM H. HITCHCOCK, of Ionia, in the county of Ionia and State of Michigan, have invented Improvements in Saw-Sets, of which the following is a specification.

This invention may be regarded as an improvement on my patent of May 9, 1876, No. 177,246; and it consists, first, in an improvement in the construction of the rest and adjustment of the inclines to give the desired set to the tooth; secondly, in the insertion of a rotating steel disk of uneven thickness at its periphery, corresponding with the varying thickness of blades, so arranged as to receive the shock of the punch when struck, and prevent mashing or swaging of the tooth; thirdly, in a reversible die formed to suit a coarse or fine tooth; fourthly, in the slotted or forked fulcrum of the holding-lever to allow the clamp to be brought closer to or farther from the base of the tooth to suit a narrow or wide blade.

In the accompanying drawings, Figure 1 represents a side elevation of my improved saw-set; Fig. 2, a plan or top view; Fig. 3, a central longitudinal section, and Fig. 4 a reverse side elevation in part; Fig. 5, end of die. The same letters occurring on the several figures indicate like parts.

A represents the bed-stock of the saw-set, which is constructed so as to be secured by a screw to the bench or other support, or to be secured in a vise. This stock is provided with two standards, *a a*, to which the set B and clamping-lever G are pivoted by a bolt, *c*. The set B is held up by a spring, *d*, which also supports the clamping-lever G by passing around the pivot-bolt *c* and under the lug *e* on said lever and the projecting key *b*, which secures the reversible die *d* of the set. This reversible die is formed with one edge of its face sharp or V-shaped and the other round or U-shaped, to suit a fine or coarse toothed saw.

On the incline *f* of the stock are secured, by a bolt, *g*, a steel disk, *m*, of uneven thickness, or wedge-shaped across its diameter, and a gage, *h*; and in extension of the incline *f* is an adjustable incline, *i*. This incline is to be secured to the stock A at such variation from the incline *f* as to give the desired set to the tooth. The steel disk *m* is to be rotated until it presents an edge of about even thickness with that of the

tooth to be set, and the gage *h* is to be adjusted to the length of the tooth from the junction of the inclines *f* and *i*, so that the saw-blade, being clamped by the lip *n* of the lever G on the incline *i*, cannot be bent beyond the root of the tooth, while in striking the die to set the tooth the steel disk *m* receives the shock, limiting its motion to prevent swaging the tooth.

The incline *i* is constructed with a curvilinear slot, *r*, through which and a projection, *s*, of the stock A, a bolt, *v*, passes, to secure the former in any desired position, and whereby the edges of the two inclines *f* and *i* may be in close contact and level with each other.

In setting the saw, the desired pitch of the inclines *f i* having been attained, the gage *h* set to the proper distance from their angle to suit the length of the tooth, and the disk *m* arranged in accordance with the thickness of the blade, the saw is to be clamped on the incline *i* by the lip *n* of the lever G, with its teeth resting against the gage *h*. The die *d* is then to be struck with a hammer or mallet, which will set the tooth to the angle of the inclines. The disk *m*, receiving the inner edge of the die, prevents the possibility of bruising the tooth.

The lever G has a slotted bearing on the pivot *c* to allow the lip *n* to be brought nearer to or farther from the junction of the inclines *f i*, to adapt it to wide or narrow blades.

What is here claimed as new, and desired to be secured by Letters Patent, is—

1. The rest *i*, connected by means of a curvilinear slot, *r*, and bolt *v* to the stock A, in combination with the fixed inclined portion *f* of the bed A, substantially as described.

2. The steel disk of uneven thickness, in combination with the inclined surfaces *f* and *i* of the bed A, as and for the purpose specified.

3. The reversible die *d*, in combination with the inclined surfaces *f* and *i* of the bed A, and disk *m*, as and for the purpose specified.

4. The lever G, provided with an elongated hole for the fulcrum-pin, and having the clamping-lip *n*, in combination with the inclined surface *i*, as shown and described.

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Witnesses:

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