

(No Model.)

T. G. COOK
SPRING HARROW TOOTH.

No. 322,351.

Patented July 14, 1885.

Fig. 1.

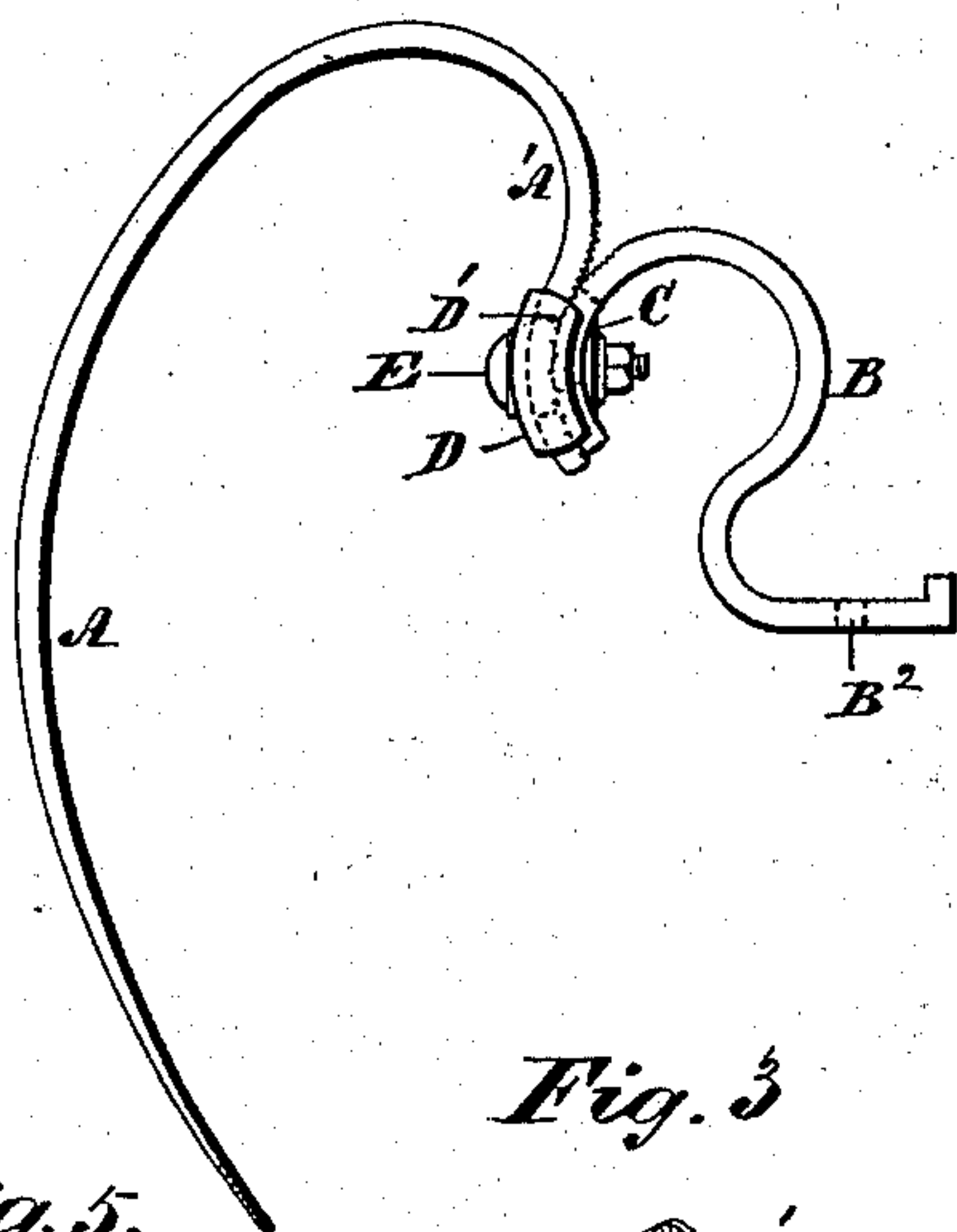


Fig. 5.



Fig. 3.

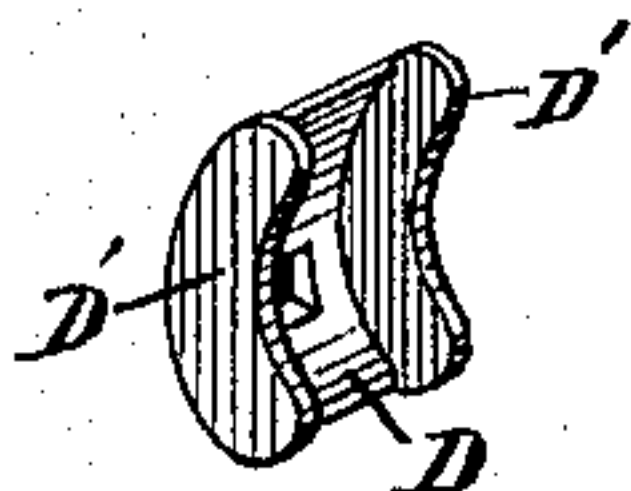


Fig. 4.

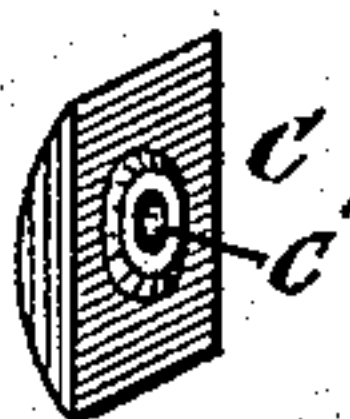
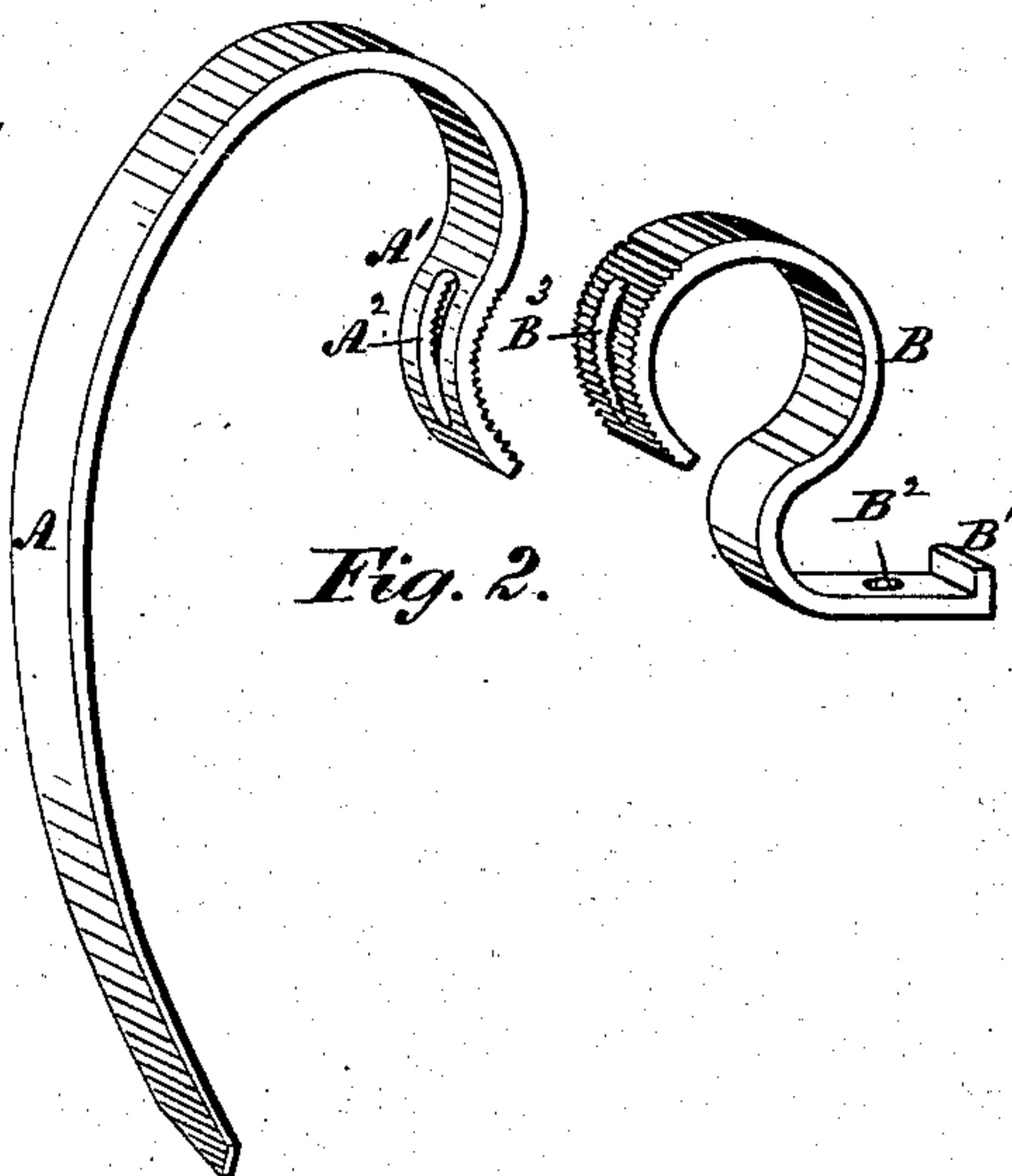


Fig. 2.



Witnesses:

John Grist
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Inventor:

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UNITED STATES PATENT OFFICE.

THOMAS GRIER COOK, OF BROCKVILLE, ONTARIO, CANADA, ASSIGNOR OF
ONE-HALF TO VANRANSSELLER MARSHALL AND JAMES A. PUBLOW,
BOTH OF SAME PLACE.

SPRING HARROW-TOOTH.

SPECIFICATION forming part of Letters Patent No. 322,351, dated July 14, 1885.

Application filed March 21, 1885. (No model.)

To all whom it may concern:

Be it known that I, THOMAS GRIER COOK, of Brockville, in the Province of Ontario, in the Dominion of Canada, have invented certain new and useful Improvements in Spring Harrow-Teeth; and I do hereby declare that the following is a full, clear, and exact description of the same.

My invention relates to curved spring harrow-teeth composed of two sections clamped together, and has for its object to cause the tooth-section when excessively strained to bodily rise by the straightening of the holder-section to prevent breakage, and the pitch and penetration of the tooth-section simultaneously adjusted to suit the character of the ground.

Figure 1 is a side view of my improved tooth-holder and tooth clamped together. Fig. 2 is a perspective view of my tooth-holder and tooth detached. Figs. 3, 4, and 5 are views of the clamping devices.

A is a flat spring-tooth curved from the point to the heel, the heel having an arc curve, A', which is provided with a longitudinal slot, A², and serrated across the greater curve of the arc.

B is a flat spring-tooth holder, circularly curved at one end and curved reversely at the other end, which is straight, to bolt the holder to the bar of the harrow-frame, and which end is provided with a flange, B', to prevent the tooth-holder skewing when fastened to the bar by a bolt passing through a hole, B². The circular curved end of the tooth-holder is provided with a longitudinal slot, B³, and is serrated across the greater curve. The serrated curves of the tooth and tooth-holder fit together, both being correspondingly curved to allow of the tooth being set higher or lower on the curve of the holder to adjust the point of the tooth to greater or less penetration, and to incline the tooth forwardly, whereby it will hold in the ground, and the tooth-holder will yield when the tooth meets with obstinate resistance to prevent straining the tooth.

C is a metal block, fitted to the lesser arc of the tooth-holder, and provided with a bolt-hole, C'.

D is a curved plate, having side flanges, D', the lesser arc of the curve fitted to the greater arc of the heel of the tooth, and provided with a bolt-hole. The flanges overlap the edges of the tooth and tooth-holder when the plate is adjusted against the greater arc at the heel of the tooth, to prevent the plate twisting on its seat.

E is a screw-bolt passed through the hole in plate D, slots in tooth A, holder B, and hole in block C, to clamp the parts together by screwing the nut. The curved plate D re-enforces the curved heel of the tooth, and block C strengthens the curve of the tooth-holder and compensates for lessening the strength of the tooth and tooth-holder by cutting slots therein.

I claim as my invention—

1. The herein-described harrow-tooth, consisting of a spring-tooth-holder section, B, of flat steel bent circularly at one end and oppositely turned at the other end, a spring-tooth section, A, curved at the heel to coincide with the circular bend or section B, and a bolt or clamp holding both sections together at the meeting parts, whereby the holder-section will straighten and lift the tooth-section when excessively strained and the pitch and depth of penetration of the tooth-section may be adjusted at one operation, as set forth.

2. The combination, with the curved spring-tooth section A, having an arc curve at the heel slotted longitudinally, of the flat spring-tooth-holder section B, circularly curved and slotted at one end and turned outwardly at the opposite end, block C, curved flange-plate D, and nutted bolt E, whereby both sections are re-enforced at the slotted curves, as set forth.

THOMAS GRIER COOK.

Witnesses:

E. J. REYNOLDS,
O. K. FRASER.