(Model.)

G. D. ROWELL.

SEED BAR TOOTH.

No. 287,171. Patented Oct. 23, 1883.

Fig. 1.

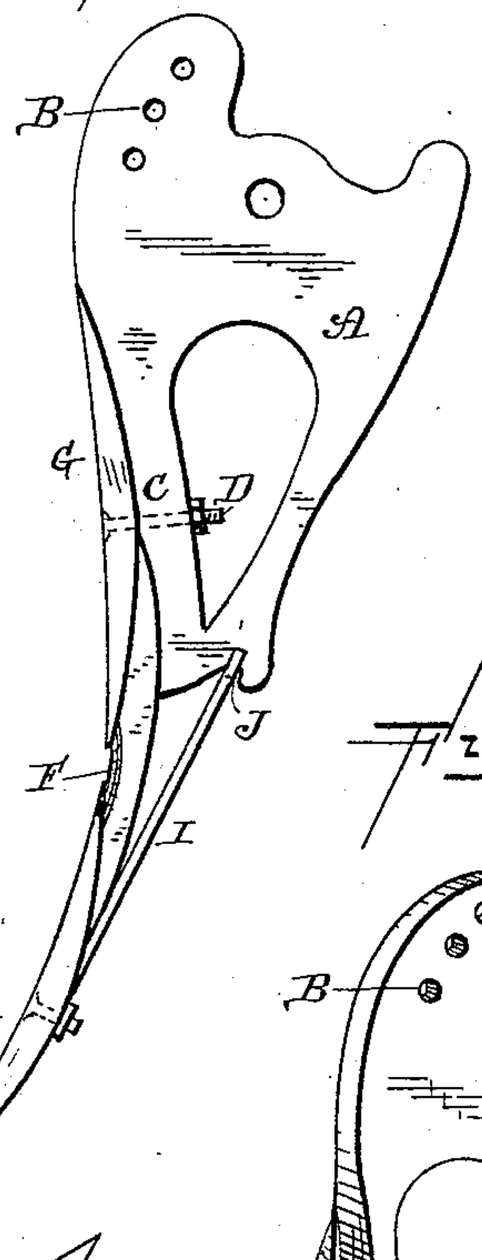


Fig. 2.

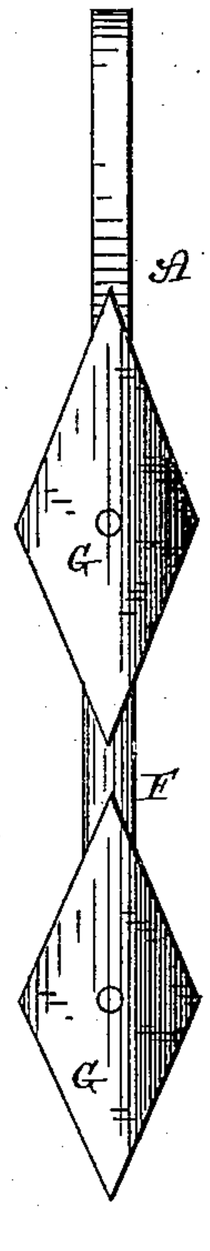


Fig. 3.

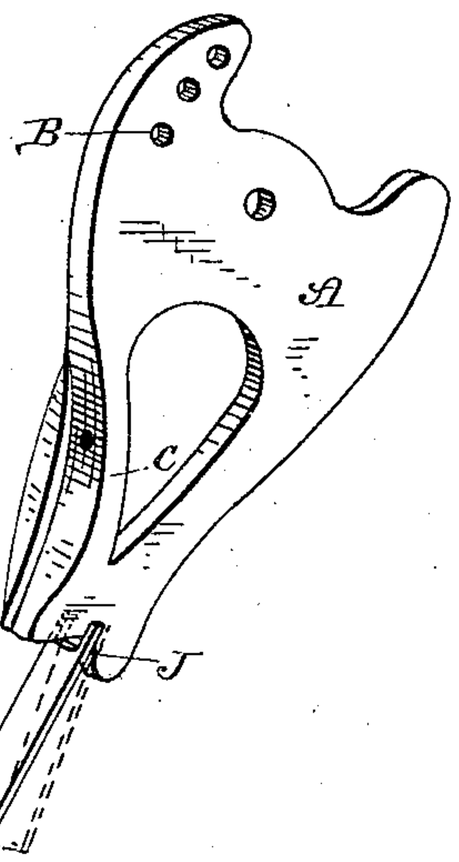
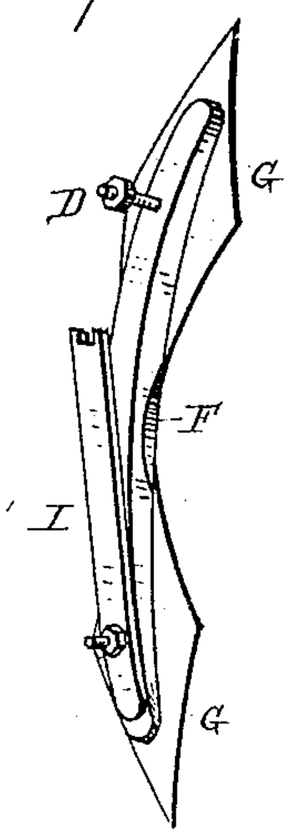


Fig. 4.



Witnesses.

Louis F. Gardner

J. W. Garner

Inventor.

G. D. Rowell,

per

J. A. Lehmann, atty

UNITED STATES PATENT OFFICE.

GUILFORD D. ROWELL, OF APPLETON, WISCONSIN.

SEED-BAR TOOTH.

SPECIFICATION forming part of Letters Patent No. 287,171, dated October 23, 1883.

Application filed July 25, 1883. (Model.)

To all whom it may concern:

Be it known that I, GUILFORD D. ROWELL, of Appleton, in the county of Outagamie and State of Wisconsin, have invented certain new and useful Improvements in Seed-Bar Teeth; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to an improvement in seed-bar teeth; and it consists, first, in the combination of a suitable friction-block, which is to be applied to the end of the drag-bar, with a standard or bar which is clamped thereto, and a brace which has its upper end to bear against the block and its lower end secured to the bar or standard, so as to form a continuous brace; second, in the combination of the friction-block, the bar or rod which is secured thereto, the brace which is placed between the lower end of the bar and the lower end of the block, and reversible shovels, which are applied to the bar, as will be more fully described hereinafter.

Figure 1 is a side elevation of seed-bar tooth embodying my invention complete. Fig. 2 is a front elevation of the same. Fig. 3 is a perspective of the block. Fig. 4 is a perspective of the bar.

A represents the friction-block, which is to be pivoted in between the slotted end of the drag-bar, and which is provided with the holes B upon its front upper corner, through which the holding-pin is passed. This block is intended to be held in position by frictional contact until the tooth strikes against an obstruction, when the friction against the sides of the block is overcome, and the block turns upon its pivot, so as to allow the teeth to ride over the obstruction. The front lower side of this block is widened out, as shown at C, so as to form a bearing-point for the bar, and upon the front side of this widened-out portion C may be formed suitable flanges or projections, which will catch upon one or both sides of the bar and prevent it from turning upon the bolt D, by which it is clamped to the block. The bar F, to which the reversible teeth G are clamped, is made curved or rounding upon its rear side, and both ends are shaped alike, so that either one will fit equally as well against the widened-out portion C. This bar is intended to be reversible, and hence it is only necessary to remove the clamping-bolts, when the ends of the bar can be reversed. The central portion of the bar is rounded away, as shown, so as to afford as little room for clogs and trash to catch against the front of the bar as possible. When rounded, as shown, it is almost impossible to clog the teeth when in use. The upper end of this bar is secured to the block by means of the clamping-bolt, which serves to both clamp the bar in position and clamp the reversible teeth upon the bar at the same time. To each end of the bar is clamped a reversible tooth, G, which will preferably have their ends shaped alike, but which, if so preferred, may be somewhat differently shaped. When one end of the lower tooth has become dulled, it is only necessary to loosen the clamping-bolt which holds it in place, reverse the tooth, and the device is again ready for use, as in the first instance. When both ends of the lower tooth have become dulled, then the two clamping-bolts are loosened, the bar freed from both the block A and its brace, and the ends of the bar reversed in position, so as to bring the upper tooth in play. After the lower end of this tooth has become dulled, the tooth is reversed in position, so as to bring its other end in place. In this manner it will be seen that each bar is provided with four separate and distinct points, which can be used one after the other, as occasion may require. In order to brace the bar in position, the brace I is clamped to the lower end of the bar by means of the same bolt which holds the reversible teeth in position upon the bar. The upper end of this brace is notched, and catches loosely in a recess, J, which is formed in the lower end of the block A. The upper end of the brace catches loosely in the block, so as to allow the brace and the standard a slight vibration, and thus cause a shaking of the parts to assist in pulverizing the soil. This brace extends backward at such an angle as to afford the greatest strength to the bar, and forms a brace for the lower end of the bar, as if the lower end of the block had been extended downward.

Although this invention has been described above as being intended for seed-bar teeth, yet it will readily be seen that it can be used

in connection with cultivators and agricultural implements of all kinds by shaping the upper end of the block in such a manner that it can be attached readily to the beam.

Having thus described my invention, I claim—

1. The combination of the block with the bar and the brace which extends between the lower end of the block and the lower end of the bar, substantially as described.

2. The combination of the block, the reversible bars secured thereto, and provided with reversible teeth at each end, and the brace placed between the lower end of the block and the lower end of the bar, substantially as set forth.

3. The combination of the block having a recess in its lower end, the standard bolted thereto, and the brace notched at its upper end, the brace and block being brought loosely in contact with each other, so as to allow the standard a slight vibration, substantially as specified.

In testimony whereof I affix my signature in presence of two witnesses.

GUILFORD D. ROWELL.

Witnesses:
O. GEO. HEISLER,
D. G. ROWELL.