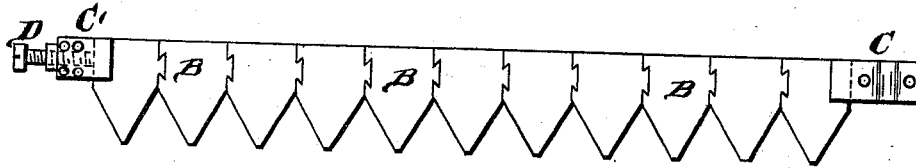


C. N. SWART.  
Harvester-Cutter.

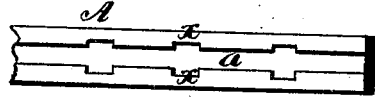
No. 196,952.

Patented Nov. 6, 1877.

*Fig. 1.*



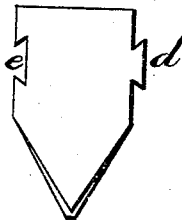
*Fig. 2.*



*Fig. 3.*



*Fig. 4.*



*Fig. 5.*



WITNESSES

*Robert Swartz*  
*George E. Upshaw*

INVENTOR.

*Charles N. Swart*  
*Fluore. Smith & Co*

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# UNITED STATES PATENT OFFICE.

CHARLES N. SWART, OF ELMIRA, NEW YORK.

## IMPROVEMENT IN HARVESTER-CUTTERS.

Specification forming part of Letters Patent No. **196,952**, dated November 6, 1877; application filed August 18, 1877.

*To all whom it may concern:*

Be it known that I, CHARLES N. SWART, of Elmira, in the county of Chemung and State of New York, have invented a new and valuable Improvement in Cutter-Bars; 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 side view of my cutter-bar; and Figs. 2, 3, 4, and 5 are details thereof.

The nature of my invention consists in the construction and arrangement of a cutter-bar for harvesters, as will be hereinafter more fully set forth.

The annexed drawing, to which reference is made, fully illustrates my invention.

A represents the bar to which the knives B are attached. The knife-bar A is at one end provided with a head, C, grooved or recessed in such a manner that the first knife at that end passes under the same. At the other end of the bar A is a similar head, C', for the same purpose; but through this latter head is passed a screw, D, to bear against the side of the knife at that end to press all the knives together.

In the top of the bar is a longitudinal dovetailed groove, *a*, and at suitable intervals the sides of said groove are cut away, as shown at *x x*.

Each knife B is provided on its under side with a dovetailed lug or projection, *b*, of such size as to pass through the notches *x x* into the dovetailed groove *a* in the bar, and by any lat-

eral movement of the knife it becomes firmly held by the lug or tenon to said bar.

In addition to this fastening, each knife or section is on one side formed with a projecting dovetailed lug, *d*, and in the other side a corresponding recess or notch, *e*, so that when put together the knives will not only lock with the bar A, but will also interlock with each other, and when the screw D is then run up to tighten the knives they become firmly united together, the same as if they were all in one piece. The knives or sections, or any one or more of them, can be easily removed, when required, for sharpening or other purposes.

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

1. In a cutter-bar, the combination of the bar A, provided with a longitudinal dovetailed groove, *a*, having notches *x x* formed in the sides of said groove at suitable intervals, and the knife-sections B, formed with dovetailed lugs or projections *b* on their under sides, substantially as and for the purposes herein set forth.

2. The combination of a longitudinally-grooved cutter-bar with a series of cutters, each having a projection on its lower face, and a projection and a recess on its sides, 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.

CHARLES N. SWART.

Witnesses:

L. D. HURLBURT,  
EDWIN BROWN.