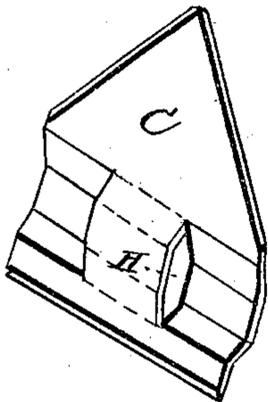


G. L. Du LANEY.  
Harvester Cutter.

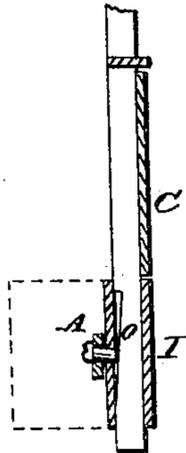
No. 97,062.

Patented Nov. 23, 1869.

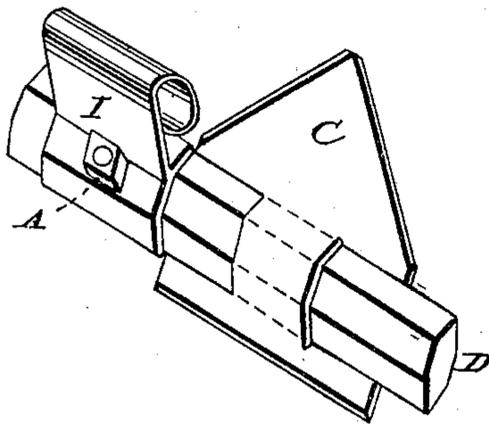
*Fig. 2*



*Fig. 3*



*Fig. 1*



*Witnesses*  
*Joseph Leas*  
*James W. Dulaney*

*Inventor*  
*G. L. DuLaney*

# United States Patent Office.

G. L. DU LANEY, OF MECHANICSBURG, PENNSYLVANIA.

Letters Patent No. 97,062, dated November 23, 1869.

## IMPROVEMENT IN HARVESTER-CUTTERS.

The Schedule referred to in these Letters Patent and making part of the same.

### To all whom it may concern:

Be it known that I, G. L. DU LANEY, of Mechanicsburg, in the county of Cumberland, and State of Pennsylvania, have invented new and useful Improvements in Harvester-Cutters; and I do hereby declare that the following is a full and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon.

Figure 1 is a perspective sectional view of the cutter-bar, showing the position of the blade and heel-piece when on the bar.

Figure 2 is a perspective view of one of the cutter-blades, showing the position of the eye or socket that receives the cutter-bar.

Figure 3 is a diagram, showing the inclined nick at the end of the bar that receives the heel-piece.

The object of this improvement is to give increased security by a more simple construction, as well as to increase the durability, and reduce the liability to get out of order, that class of harvester-cutters in which the cutter-bar and blades are so constructed, relatively to each other, as to secure the greatest possible facility of attaching the cutter-blades to, and detaching them from the cutter-bar.

The most peculiar feature of this invention consists in so forming an eye, socket, or receptacle in the cutter-blades as will admit of the cutter-bar being thrust in, and the blades secured in a substantial manner to the bar, so as to entirely dispense with the use of rivets, screws, or any other secondary appliances such as have been used heretofore to secure the blades or sections to the bar. Also, to admit of the blades being detached at will, when any occasion may occur requiring their detachment.

To enable others skilled in the art to make and use my improvement, I will proceed to describe its construction and operation.

The cutter-blade C is formed of one single piece of steel, and is provided with an eye or socket, H, about its centre.

The eye or socket H may be accurately and easily formed by means of a properly-shaped die, that will separate the central portion of the blade from the edges, and at the same time, and with the same action, deflect the separated portions in opposite directions, thus forming a proper receptacle for the admission of the cutter-bar D.

By this means, or plan of construction, I secure the advantages of a united overlapping or continuous surrounding eye or socket, by which a much more permanent and substantial manner of securing the

blades to the bar is secured than the ordinary means of forming a lip, flange, or deflections of parts of the blade, in which the parts are separated to secure a proper receptacle for the admission of the bar.

The cutter-bar D is constructed of iron or steel, and of form or shape to correspond to that of the eye or socket in the blade C.

It may be constructed much lighter than the ordinary cutter-bar, and at the same time possess equal strength, as it is entirely free from rivet or screw-holes.

The bar D is further provided with an incline nick, O, sloping inward from its heel-end, the object of which is to receive the end of the set-screw A, and cause the adjustable heel-piece I to rest heavily against the blade C.

The adjustable heel-piece I is provided with an eye or socket to correspond to, and exactly fit over the bar D, and is further provided with a set-screw, A, said screw having a corresponding incline to that of the nick O in the end of the bar D.

In the employment of the adjustable heel-piece I, together with the set-screw A, a very easy and effectual method of securing the blades C to the bar D is secured; also, by its adjustability, is capable of being moved in or out, to adapt itself to the varied sizes of different blades, thus entirely obviating the difficulty experienced in fixed, or stationary heel-pieces, as used heretofore.

After all the parts have been prepared, as above described, the blades C are slipped on the bar D; the adjustable heel-piece I is also slipped on to the nicked end of the bar D, and the set-screw A drawn, when the whole is held firmly, yet any one of the blades can be reached and removed when occasion requires.

Having fully set forth and described my improvement,

What I claim, and desire to secure by Letters Patent of the United States, is—

1. The cutter-blade C, when constructed with an eye or socket, as shown and described, and for the purpose specified.

2. The cutter-bar D, when constructed as described, and used in combination with the cutter-blade C.

3. The adjustable heel-piece I, together with the set-screw A, when used in combination with the blade C and bar D, as shown and described, and for the purpose set forth.

G. L. DU LANEY.

Witnesses:

JOSEPH LEAS,  
JAMES W. DULANEY.