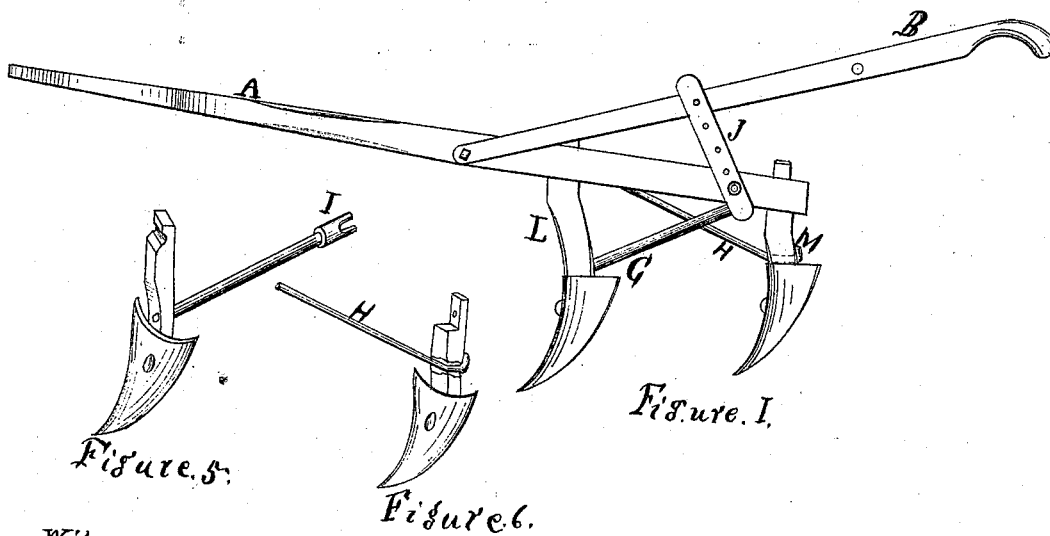
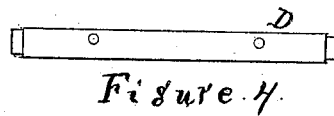
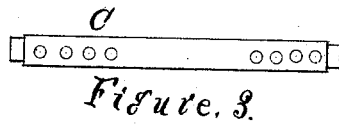
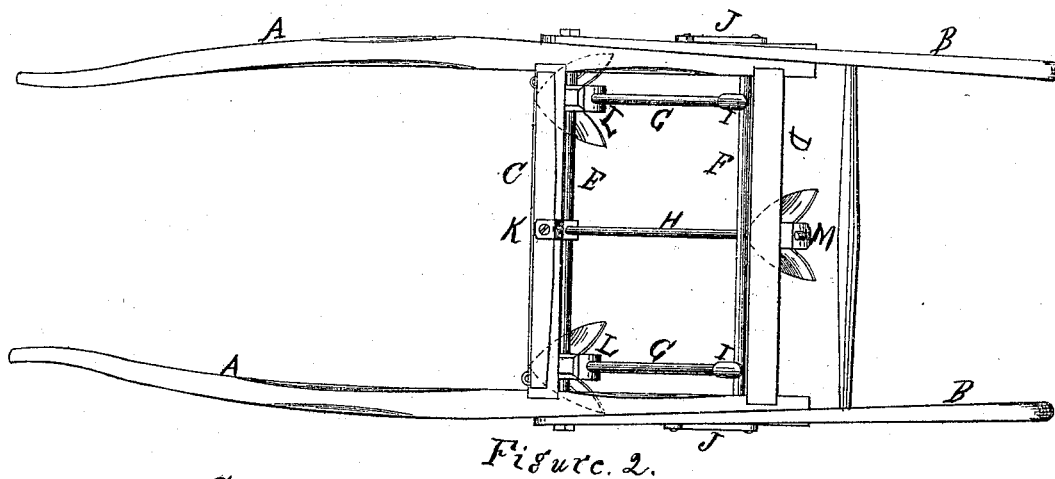


A. H. Kennedy,

Cultivator.

No. 113306.

Patented Apr. 4, 1871.



Witnesses.
Chas. H. Denfield
Charles E. Finney

Inventor:
Albert H. Kennedy.

UNITED STATES PATENT OFFICE.

ALBERT H. KENNEDY, OF OBERLIN, OHIO.

IMPROVEMENT IN CULTIVATORS.

Specification forming part of Letters Patent No. **113,306**, dated April 4, 1871.

To all whom it may concern:

Be it known that I, ALBERT H. KENNEDY, of Oberlin, in the county of Lorain and State of Ohio, have invented certain Improvements in Cultivators, of which the following is a specification.

The first part of my invention relates to the combination of connecting-rods in such a manner that the said rods hold the different parts of the machine together in the simplest and strongest manner possible.

The second part of my invention relates to the attachment of the handles by which the machine is guided when in operation. This is done in such a manner that they can be adjusted to suit the height of the operator.

The third part of my invention relates to the manner of attaching the knees and the bracing of the same, so that they are adjustable to the width of the row, and interchangeable to throw the soil to or from the row, as desired.

The fourth part of my invention relates to the manner of bracing the handles and constructing the joints between the beams and thills.

In the accompanying drawings, Figure 1 is a side elevation. Fig. 2 is a plan of the same. Fig. 3 is the front beam. Fig. 4 is the rear beam. Fig. 5 is one of the front knees with its tooth and accompanying brace. Fig. 6 is the rear knee with its tooth and supporting-rod.

A A are the thills, which are held in their position by the connecting-rods.

B B are the handles, which are capable of a perpendicular motion.

C is the front beam. Fig. 3 shows the tenons and the holes, through which (the holes) the bolts pass which secure the front knees.

D is the rear beam.

E is the front connecting-rod, which holds the handles and the thills in their proper position.

F is the rear rod, which secures the braces J J, which support the handles in their proper position.

G G are the braces, either of wood or iron, which support the front knees.

H is the rod, which supports the rear knee and the whiffletree by means of the strap K.

I I are the slides, in which the braces are inserted. They may slide upon the rod F, and for this purpose they may be provided with either slots or holes through which the rod F may freely pass.

J J are the braces, secured firmly to the frame by the rod F, which support the handles at any desired height.

I claim as my invention—

The combination of the rod F with the slides I I and the braces G G, substantially as and for the purpose hereinbefore set forth.

ALBERT H. KENNEDY.

Witnesses:

CHAS. H. PENFIELD,
CHARLES G. FINNEY.