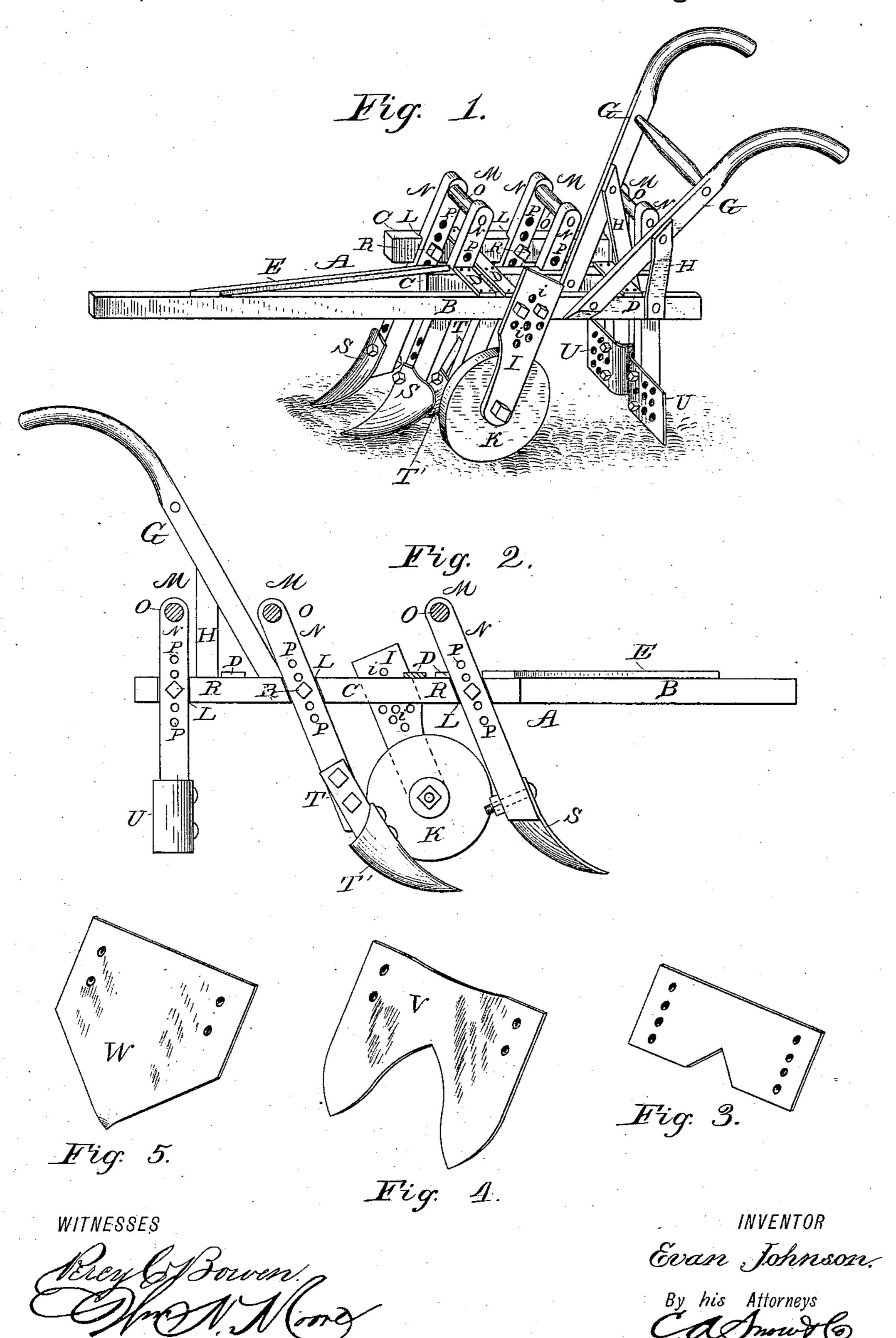
E. JOHNSON.

CULTIVATOR.

No. 324,386.

Patented Aug. 18, 1885.



United States Patent Office.

EVAN JOHNSON, OF ELIZABETHTOWN, NORTH CAROLINA.

CULTIVATOR.

SPECIFICATION forming part of Letters Patent No. 324,386, dated August 18, 1885.

Application filed June 1, 1885. (No model.)

To all whom it may concern:

Be it known that I, Evan Johnson, a citizen of the United States, residing at Elizabethtown, in the county of Bladen and State of 5 North Carolina, have invented a new and useful Improvement in Cultivators, of which the following is a specification, reference being had to the accompanying drawings.

My invention relates to an improvement in 10 cultivators; and it consists in the peculiar construction and combination of devices that will be more fully set forth hereinafter, and partic-

ularly pointed out in the claims.

In the accompanying drawings, Figure 1 is 15 a perspective view of a cultivator embodying my invention. Fig. 2 is a vertical longitudinal sectional view of the same. Figs. 3, 4, and

5 are detailed perspective views.

A represents a frame, which consists of the 20 beam B and the longitudinal bars C, arranged parallel with the beam and on one side thereof, and connected thereto and to each other by the transverse bars D, which are bolted on the beam and longitudinal bars, as shown. 25 The front end of the inner bar, C, is connected to near the front end of the beam B by a diagonally-arranged brace, E. Near the rear end of the beam and of the inner bar are bolted handles G, which are similar to ordinary 30 plow-handles, and are braced by the braces H. To the outer side of the beam B, near its rear end, is bolted a standard, I, which is provided with a number of bolt-holes, i, near its upper end, by means of which the standard 35 may be bolted to the beam at any desired angle thereto. To the lower end of the standard, on the inner side thereof, is journaled a wheel, K. The inner faces of the beams Care provided with inclined mortises L, in which 40 are secured the frames M. These frames consist each of the standards N and the connecting transverse bar O, which connects the upper ends of the standards. Openings P are made in the standards at suitable distances 45 apart, and through these openings pass bolts R for bolting the frames to the mortises in the bars C. By means of the series of openings | P the frames may be secured to the bars C at any desired point, and thereby adjust the teeth 50 that are secured to the lower ends of the standards to work in the ground at any desired

depth.

To the standards of the forward frame M are secured sweep-shovels S, that are adapted to clear away the grass from both sides of the 55 row of vegetables that are being cultivated. Plows T, having curved feet T', are bolted to the standards of the central frame M and are adapted to be secured either to the inner or the outer sides of the standards. The function 60 of these plows is to throw the dirt to the plants. Wings U are bolted to the standards of the rear frame M, and have their inner ends bent rearwardly, as shown. The function of these wings is to level the row after the plows.

The double-shovel attachment V (shown in detail in Fig. 4) is adapted to be used in lieu of the sweep-shovels S, and is for the purpose of clearing the grass from the plants when they are first coming up. The broad centrally- 70 pointed plow W (shown in detail at Fig. 5) is also adapted to be applied to the front frame M in lieu of the sweep-shovels V, and is for

the purpose of opening trenches.

The function of the wheel K is to serve as 75 a support and to guide the cultivator in a straight line on the ridge.

Fig. 3 shows an attachment for forming

ridges.

Having thus described my invention, I 80 claim—

1. The combination of the frame, consisting of the beam B, the bars C C, both upon one side, the connecting transverse bars D, and brace A, with the supporting-wheel K, at- 85 tached to the beam B, and the cultivators or shovels attached to the bars C, substantially as described.

2. The combination of the frame A, consisting of the beam B, the parallel bars C, and the 90 connecting transverse bars D, with the frames M, bolted between the bars D, and having the shovels or scrapers S, the plows T', the curved wings U or sweeps, and the standard I, bolted to the beam B and having the wheel K, sub- 95 stantially as described.

In testimony that I claim the foregoing as my own I have hereto affixed my signature

in presence of two witnesses.

EVAN JOHNSON.

Witnesses:

JNO. A. McDowell, L. M. SMITH.