M. T. SKINNER.

Combined Cotton Cultivator and Planter.

No. 198,254. **Patented Dec. 18, 1877.**

Fig. 1

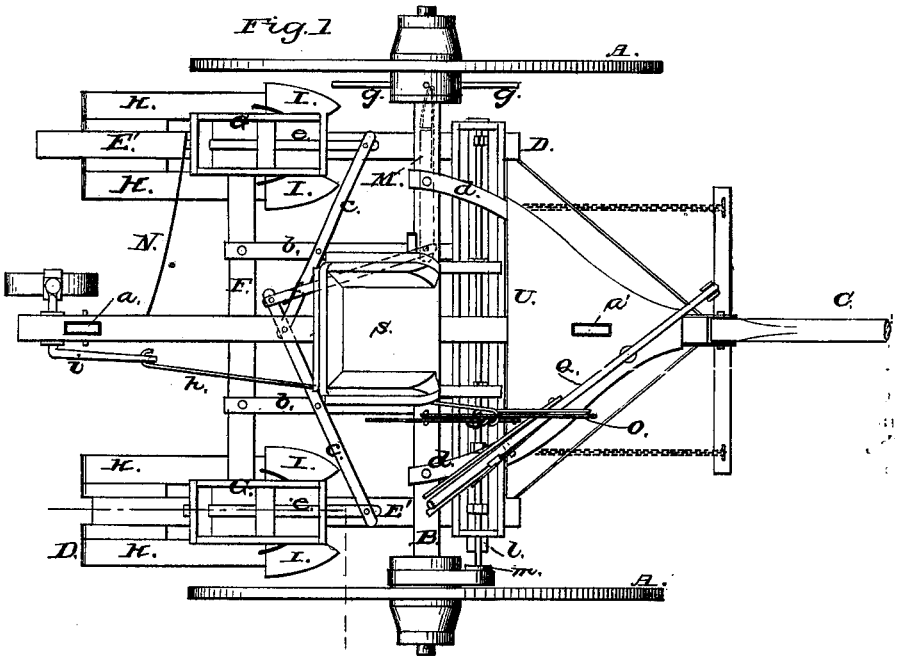


Fig. 2.

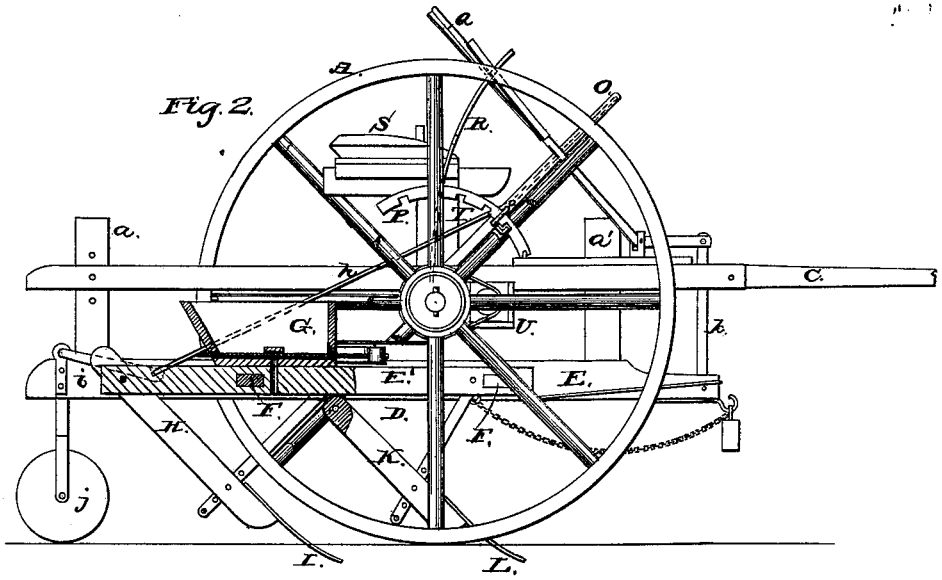
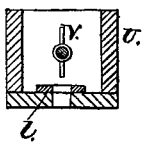


Fig. 3.



Attest:

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UNITED STATES PATENT OFFICE.

MILES T. SKINNER, OF WHITE ROCK, TEXAS.

IMPROVEMENT IN COMBINED COTTON CULTIVATOR AND PLANTER.

Specification forming part of Letters Patent No. **198,254**, dated December 18, 1877; application filed May 9, 1877.

To all whom it may concern:

Be it known that I, MILES T. SKINNER, of White Rock, in the county of McLennan and State of Texas, have invented a new and useful Improvement in a Combined Corn and Cotton Planter and Cultivator, which I term "The Skinner Combination;" 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, forming a part of this specification, and in which—

Figure 1 is a plan view of the machine; Fig. 2 a longitudinal sectional view of the same; and Fig. 3 is a detail sectional view of the drill or seed box.

In the drawings, to which reference is made, A represents the wheels, B the axle, and C the tongue of a carriage having my improvements attached. Suitable hounds *d d* are provided for the tongue, which extends a short distance in the rear of the axle, and is slotted to receive the upper end of a standard, *a*, secured upon the rear end of central beam E of the frame D, which is suspended below the axle. On the forward end of the beam E is secured a standard, *a'*, whose upper end passes through a slot formed in the tongue in front of the axle B, said standard being free to move up and down in the slot. The rear standard *a* is provided with several holes, through any one of which, and through a hole in the rear extension of the tongue C, passes a pin, by means of which the rear portion of the frame D is secured to the machine.

The frame D is composed of a central rigid beam, E, and two adjustable side beams, E' E', connected together by two transverse bars, F, and secured thereto in such a manner as to admit of their being moved nearer together or farther apart upon said bars. On each of the beams E' is placed a seed-box, G, having an opening in its bottom for the passage of seed. To the beams E' E', in rear of the seed-boxes, are attached standards H H, provided with plows or shovels I I, and to the under side of each of said beams, forward of the seed-boxes, is secured a standard, K, provided with a shovel or opener, L.

To the bars F are secured two bars, *b b*, to which are pivoted the levers *c c*, having their outer ends pivoted to the seed-slides *e e*, leaving apertures to receive the seed. The inner ends of the levers *c c* are hinged together, and a bar, *f*, connects said ends to the inner end of a lever, M, pivoted at its center to one of the beams E', and having its outer end extending within reach of the pins *g*, secured to the hub of one of the wheels A.

A spring, N, is attached at one end to the beam E, and its other end is attached to the rear end of one of the seed-slides *e*.

A lever, O, pivoted to the axle B, is, by means of a rod, *h*, connected to the forwardly-extended arm of a crank-lever, *i*, placed in bearings upon the rear end of the beam E, and having the shank of the caster-wheel *j* pivoted to its rear downwardly-extended arm. The lever O is provided with a suitable device for securing it upon the rack-bar P.

A bent lever, Q, is pivoted at its angle upon the machine, and has attached to its short forward arm the upper end of a connecting-bar, *k*, the lower end of which is secured to the front end of the beam E. The lever Q is held in position upon the upright bar R, secured upon the top of the axle B by any suitable device.

The driver's seat S is arranged to slide back and forth upon the bars which are secured to the tops of the standards T mounted upon the axle B. The seed or drill box U is secured to the tongue and hounds immediately in front of the axle, and is provided with an adjustable slide, *l*, having slots for the passage of the seed through the slotted bottom of the seed-box. The slide *l* may be moved so as to diminish or increase the size of the holes in the bottom of the seed-box, to regulate the quantity of seed to be sown. Through the longitudinal center of the seed-box passes an agitating-rod, V, having on one of its ends a pulley, *m*, over which, and the hub of one of the wheels A, is passed a band, through which motion is imparted from the wheel to the agitating-rod during the operation of the machine.

Operation: As the machine is drawn forward, the pins *g* in the wheel-hub alternately strike the lever M, moving the seed-slide *l* backward, so as to receive corn in the holes with which the slides are provided, and, as the lever is disengaged by any one of the pins, the

spring N, attached to the beam E and the end of one of the slides, forces the slides forward again under the brushes in the bottoms of the seed-boxes G, and directly over the hole in the bottom of each box. The corn contained in the holes in the slides is then loosed and falls into the furrows made by the shovels L, and is covered by the shovels I I. When the machine is in operation the lever Q is raised to the top notch of the rack R, thereby lowering the front end of beam E, and lever O is drawn backward, thereby raising the caster-wheel at the rear end of beam E, by which means the plows are lowered to the proper depths for working.

The cotton-planter is operated in the same manner, except that the slides *e e* are replaced by slides having larger holes.

The small-grain planter may be understood by the following: Displace the spring N, slides *e e*, levers *c c*, bar *f*, seed-boxes G, and lever M. Move each of the inside shovels I on the beams E′ forward to the point of attachment of the shovels L, which remove and secure to the beam E in line with the said shovels I. Place a band around the pulley M on the agitating-rod and around the hub of the wheel A on the same side of the machine. The machine is now ready to plant small grain.

The cultivator is formed by displacing the seed or drill box U, removing the fastenings of beams E′ E′ to the bars F F, sliding them inward toward beam E any desirable distance, and securing them as before. The shovels L L may be detached if but four plows are desired by the operator.

The gang-plow is formed by removing all the shovels, and securing plows of any desired description to the rear ends of beams E E′ E′, and sliding beams E′ E′ to their proper places, according to the size of the plows used. If but two plows are used, the one upon the beam E may be removed, or if one plow only is required, the beams E′ E′ and bars F F may be removed, and only the plow upon beam E used.

Having thus described my invention, I claim as new and desire to secure by Letters Patent—

1. In combination with the vehicle A B C, the frame D, composed of the rigid central bar E, having standards *a a′*, adjustable side bars E′ E′, and transverse bars F, the lever Q, upright bar R, connecting-bar *k*, the lever O, rack-bar P, rod *h*, crank-lever *i*, and caster-wheel *j*, all constructed and arranged to operate substantially as herein set forth.

2. In combination with the vehicle A B C, frame D, shovels I I, and openers L L, the seed-boxes G G, seed-slides *e e*, levers *c c*, connecting-bar *f*, lever *m*, pins *g*, and spring N, substantially as shown and described.

M. T. SKINNER.

Attest:
J. F. DAVIS,
WM. MARTIN LONG.