

(No Model.)

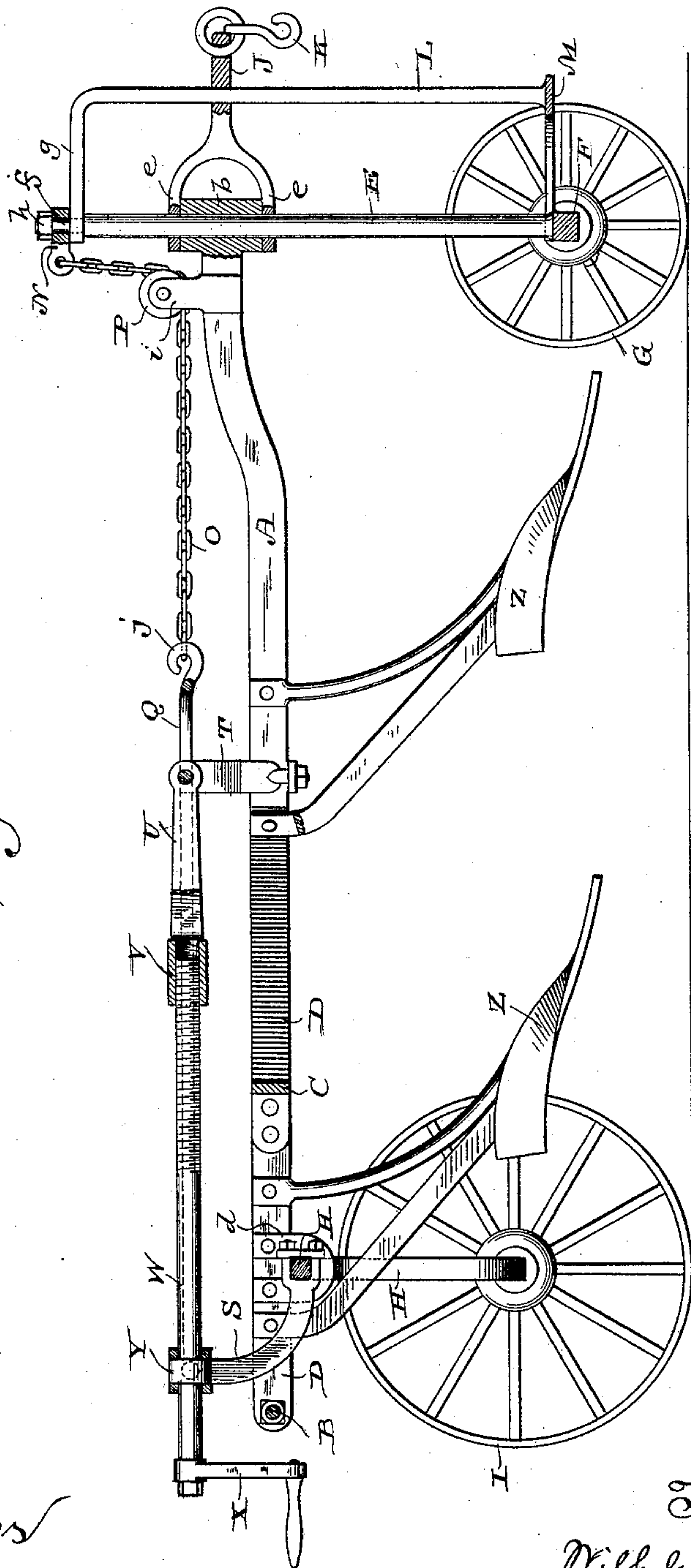
2 Sheets—Sheet 1.

W. H. MELDER.  
WHEEL PLOW.

No. 436,985.

Patented Sept. 23, 1890.

*Fig. 1.*



Witnesses  
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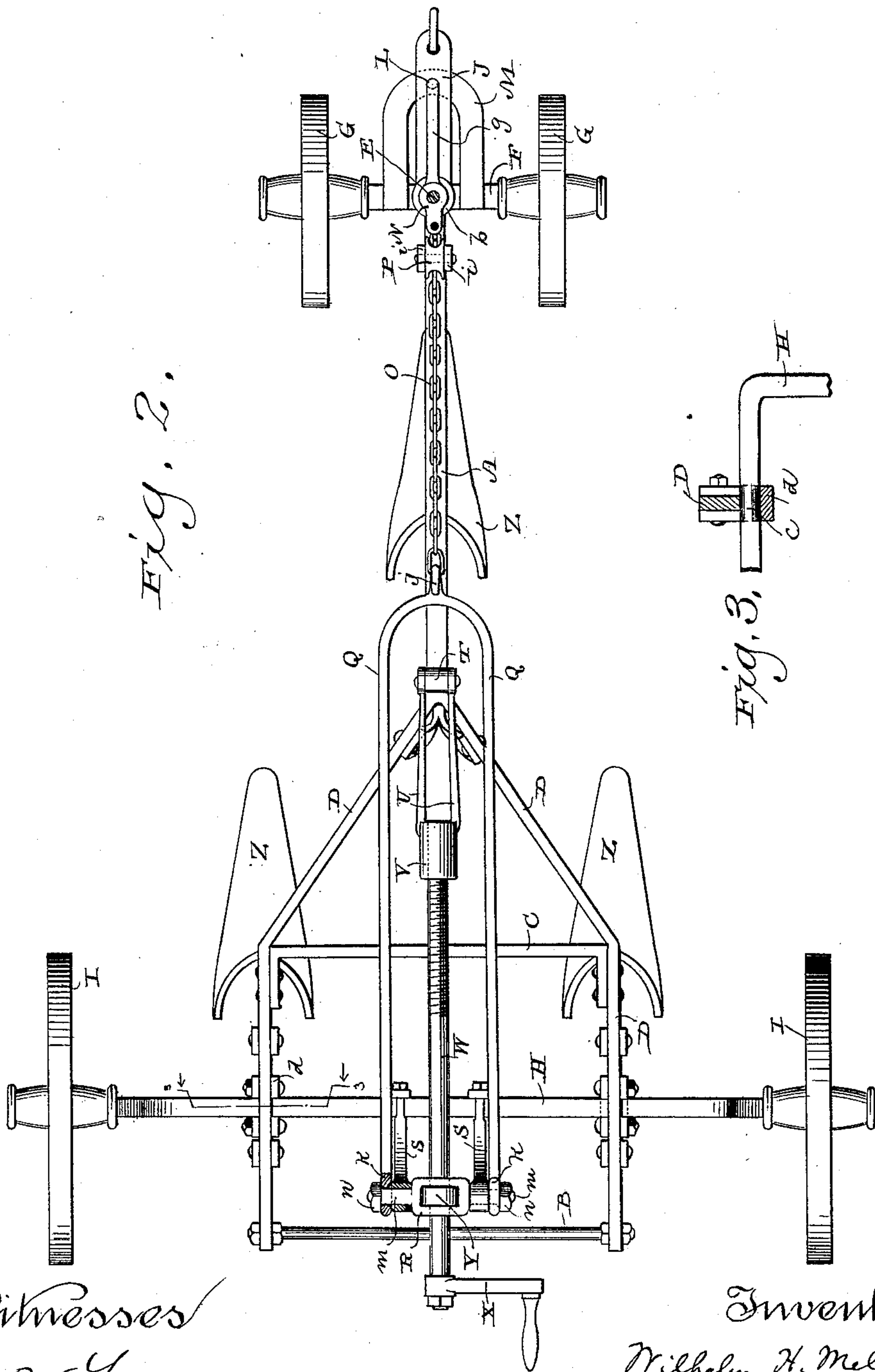
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2 Sheets—Sheet 2.

W. H. MELDER.  
WHEEL PLOW.

No. 436,985.

Patented Sept. 23, 1890.



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# UNITED STATES PATENT OFFICE.

WILHELM H. MELDER, OF FUSSVILLE, WISCONSIN.

## WHEEL-PLOW.

SPECIFICATION forming part of Letters Patent No. 436,985, dated September 23, 1890.

Application filed July 12, 1890. Serial No. 358,534. (No model.)

*To all whom it may concern:*

Be it known that I, WILHELM H. MELDER, of Fussville, in the county of Waukesha, and in the State of Wisconsin, have invented certain new and useful Improvements in Wheel-Plows; and I do hereby declare that the following is a full, clear, and exact description thereof.

My invention relates to wheel-plows; and it consists in certain peculiarities of construction and combination of parts to be hereinafter described with reference to the accompanying drawings and subsequently claimed.

In the drawings, Figure 1 represents a side elevation of my plow partly in section; Fig. 2, a plan view of the same partly in horizontal section, and Fig. 3 a detail sectional view on line 3 3 of Fig. 2.

Referring by letter to the drawings, A represents a beam having a bifurcated rear end strengthened by braces B C, these braces being connected to the furcations D of said beam. The front end of the beam A is provided with a vertical eye *b*, that engages a post E, extended up from an axle F for front wheels G, and a cranked axle H for rear wheels I has cylindrical portions *c*, (best shown in Fig. 3,) loosely fitted in bearings *d*, connected to the furcations D of said beam. Loose on the post E, at the opposite ends of the beam-eye *b*, are the furcations *e* of a clevis J, the latter being provided with the usual whiffletree-connection K, and a right-angled rod L is passed through the clevis to connect the reduced upper end *f* of the post with a yoke M, that is rigidly secured to the front axle G, this construction being best illustrated in Fig. 1. Slipped onto the reduced upper end *f* of the post E, against the horizontal arm *g* of the right-angle rod L, is a swivel N, the latter being held in place by a nut *h*, as is also shown in Fig. 1. Connected to the swivel N is the forward end of a chain O, that passes under a pulley P, the latter serving as a guide for the chain and having its bearings *i* on the beam A. The rear end of the chain is adjustably connected to a hook *j* on a yoke Q, that has its ends *k* slipped onto lateral lugs *m* of a box R and held in place by nuts *n* screw-threaded on said lugs. The box R is supported at the desired elevation by means

of brackets S, slipped onto the lugs *m* of said box and clipped to the rear axle H above described.

Pivotaly connected to a clip T, extended up from the rear portion of the beam A, is a yoke U, terminated at its rear end in a screw-threaded sleeve V for engagement with the screw-threaded forward end of a shaft W, that has its bearings in the box R and is provided with a crank X at its rear end. The shaft W is also provided with a collar Y, arranged within the box R, and the pressure of the collar against said box causes the cranked rear axle to turn in its bearings when said shaft is actuated, this turning of said axle being due to the leverage of the brackets S clipped thereto.

As shown, a plow Z is attached to the beam A and each furcation thereof; but the number and arrangement of the plows may be varied without departure from the spirit of my invention.

When the chain O has its rear link connected to the hook *j* on the yoke Q, the beam A will always stand horizontal, as shown in Fig. 1, regardless of the elevation; but if said chain be shortened with relation to said yoke said beam will stand at more or less of an angle to a horizontal plane, and thus the plows Z may be set to assume the desired angle to the ground. By turning the crank X the chain O is actuated to raise or lower the beam A, and thus the cut of the plows may be readily regulated as to depth. This is of particular advantage, because it permits the plowman to set his plows at any time to suit variations in the quality of the soil being worked upon, it being desirable to plow deeper in hard soil than in soft.

As shown in Fig. 1, the plows Z are clear of the ground, and the whole device may be readily drawn from one place to another. Now, to set the plows, the shaft W is turned by its crank X in the proper direction, and thus the eye *b* of the beam A will move down on the post E in proportion as the cranked rear axle H is turned in its bearings, this turning of said axle being due to the leverage of the brackets S and the pressure of the collar Y on said shaft, as above described.

By having the clevis J engaged with the



rod L that connects the post E and the yoke M on the front axle F, said post and axle may be turned in either direction to guide the plow.

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

1. The combination of a beam having one or more plows secured thereto and provided at its front end with an eye, a front axle carrying wheels and provided with a post extended through the beam-eye, a cranked rear axle carrying wheels and loosely arranged in bearings on the beam, brackets rigidly secured to the rear axle, a box having lugs engaging the brackets, a screw-threaded shaft having its bearings in the box and provided with a collar inclosed within said box, a yoke having its ends connected to said lugs, a flexible device connecting the yoke and front-axle  
15 post, a guide on the beam for the flexible de-

vice, another yoke pivotally connected to said beam, and a screw-threaded sleeve on the latter yoke in engagement with said shaft, substantially as set forth.

2. The combination of front and rear axles, 25 wheels arranged on the axles, a post extended up from the front axle, a vertically-adjustable beam engaging the post, a clevis having furcations loose on said post on opposite sides of the beam, a rod extended through the 30 clevis, and the ends of this rod secured to said front axle and post, substantially as set forth.

In testimony that I claim the foregoing I have hereunto set my hand, at Milwaukee, in the county of Milwaukee and State of Wis- 35 consin, in the presence of two witnesses.

WILHELM H. MELDER.

Witnesses:

N. E. OLIPHANT,  
WM. KLUG.