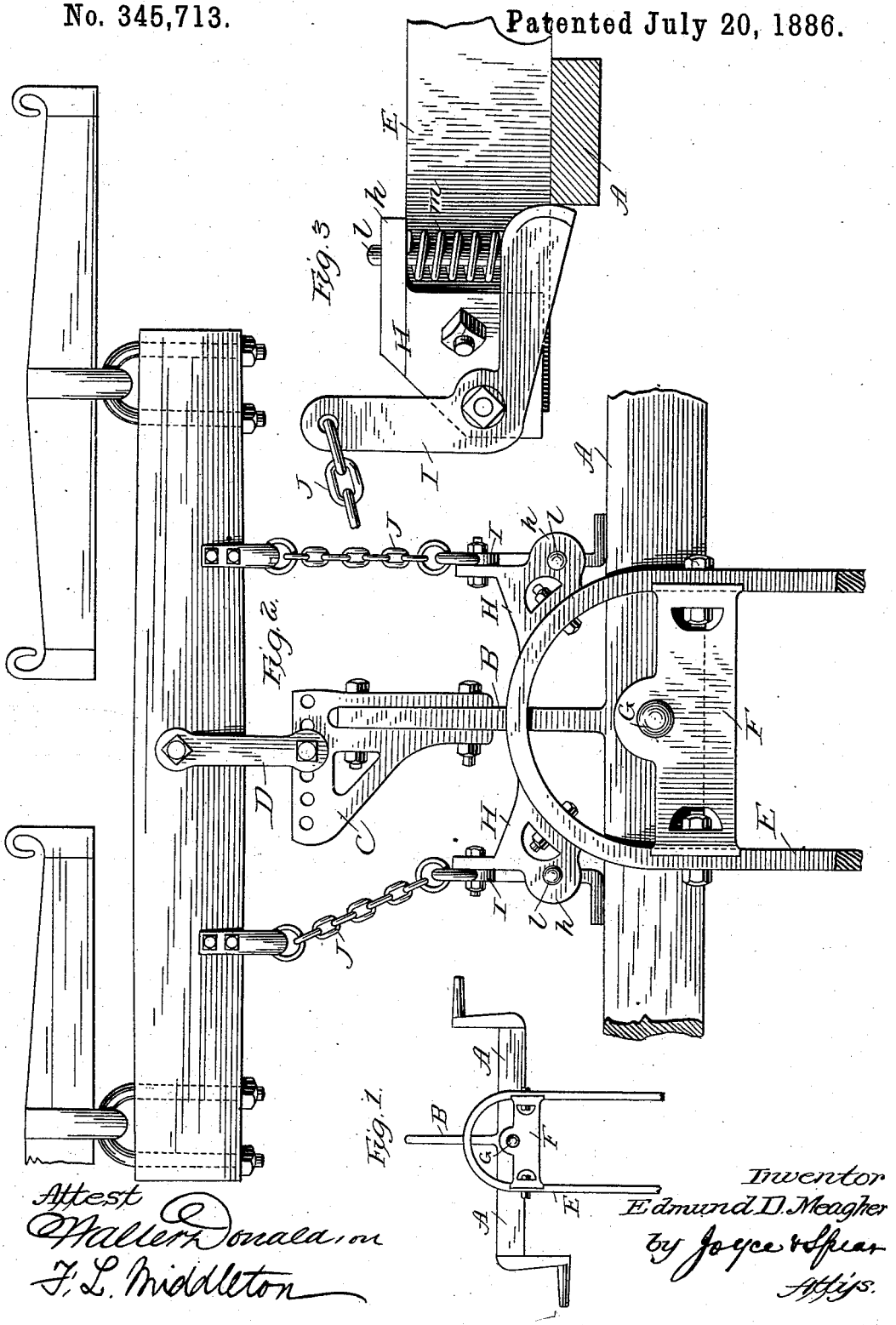
(No Model.)

E. D. MEAGHER.

SULKY PLOW.

No. 345,713. Patented July 20, 1886.



Attest
Allen Donaldson
F. L. Middleton

Inventor
Edmund D. Meagher
by Joyce & Spear
Attys.

UNITED STATES PATENT OFFICE.

EDMUND D. MEAGHER, OF SOUTH BEND, INDIANA, ASSIGNOR TO THE ECONOMIST PLOW COMPANY, OF SAME PLACE.

SULKY-PLOW.

SPECIFICATION forming part of Letters Patent No. 345,713, dated July 20, 1886.

Application filed October 20, 1885. Serial No. 180,440. (No model.)

To all whom it may concern:

Be it known that I, EDMUND D. MEAGHER, of South Bend, in the county of St. Joseph and State of Indiana, have invented a new and useful Improvement in Sulky-Plows; and I do hereby declare that the following is a full, clear, and exact description of the same.

In wheel or sulky plows having two main truck-wheels turning on axles or spindles rigidly set upon the sulky-frame to which the plow is attached the inability of the wheels to swing to the right or left independently of the frame renders it necessary to lift, back, or tilt the plow at the corners. On the other hand, wheels independent of the frame and turning freely to the right or to the left would interfere with the proper guiding of the plow when moving through the ground in the direction of the furrow in case one of the horses should drop back or start ahead of the other.

The object of the invention hereinafter set forth is to secure free lateral movement of the wheels, independently of the sulky-frame, when the team is turning at the corners, and in the connection with this free movement to main- the wheels in rigid connection with the frame when the plow is moving in the direction of the furrow. This object has been attained in wheel-plows having tongues by connecting one or both wheels with the pole, and by means, also, of a swiveled rear wheel movable by the driver.

My invention is shown as applied to a tongueless sulky-plow, and is designed mainly for such a plow; but I do not limit myself thereto.

The mode in which I have embodied the invention is shown in the accompanying drawings, in which—

Figure 1 represents a plan view of the axle and a portion of the frame. Fig. 2 shows an enlarged plan view, in plan, of the invention. Fig. 3 shows a side elevation of the locking device.

In the drawings, A represents an axle, on which are two ordinary supporting-wheels. To this axle is rigidly attached a clevis-bar, B, provided with a suitable clevis, C, to which the evener is attached by means of a link or shackle, D. A frame, E, of the sulky, bolted to a cross-head, F, forms a fifth-wheel, to which the axle A is pivoted by a king-bolt at G. Brackets H H are bolted to the frame, and on them are pivoted spring latches or stops I I, which in rest bear against the face of the axle on either side of the frame, and lock the axle to the frame. A pin, *l*, holds a spring, *m*, between an overhanging part, *h*, of the bracket and the locking end of the latch, and tends to move the latch and to hold it to its seat. The latch is in the form of a bell-crank lever, and its outer end is connected by a chain or link, J, to the evener, on each side of its pivoted point. The chains or links are graduated in length, so that when the evener is parallel with the axle they hang loose, with slack enough in each to prevent the opening of the latch when one horse pulls ahead of the other.

When, for example, the team is turned to the right at a corner, the evener, turning also in that direction, draws upon the left-hand chain, and removes the latch from its seat against the axle on that side. This permits the axle to turn on the king-bolt, and to swing to the right as it is drawn by the clevis-bar B. After the plow is turned and the team begins to move forward, the clevis-bar is drawn back to its direct position, the left-hand latch is released by the slackening of its chain, and when the axle has reached its normal position for the direct draft in line of the furrow the latch is forced down to its seat by the spring, and the axle locked in place. The same operation, in reversed order, takes place when the team is turned to the left. Thus the wheels are as free to move at the corners as if not locked at all, and the plow is turned in the furrow, and this is done without interfering with the locked condition of the wheels when the draft is in line with the furrow.

I have not shown the plow or its connections with the frame, these constituting no part of my invention, but may be of any known or improved kind. I have shown a simple and effective-locking latch; but I do not limit myself to this, as it may be varied indefinitely. It will also be obvious that the latch may be operated by the driver. This would not include the automatic operation; but it is practicable.

I claim as my invention—

1. In combination with the frame of a wheel-plow, a truck-wheel axle pivoted on the frame provided with a rigid clevis-bar, and locking devices connected to and operated by the horses, substantially as described.

2. In combination with a tongueless wheel-plow, a truck-wheel axle pivoted on the frame, provided with a rigid clevis-bar, and locking devices connected to and operated by the horses, substantially as described.

3. The frame, the truck-wheel axle pivoted thereto, the latches and springs, and the chains or links connecting the latches to the evener, all substantially as described.

4. In combination with the frame of a wheel-plow, a truck-wheel axle pivoted on the frame provided with a rigid clevis-bar, and locking devices adapted to lock the frame to the wheels for movement in the line of the furrow, and to release it in turning, all substantially as described.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

EDMUND D. MEAGHER.

Witnesses:
EDWIN R. KIMBLE,
JOHN M. CHAPMAN.