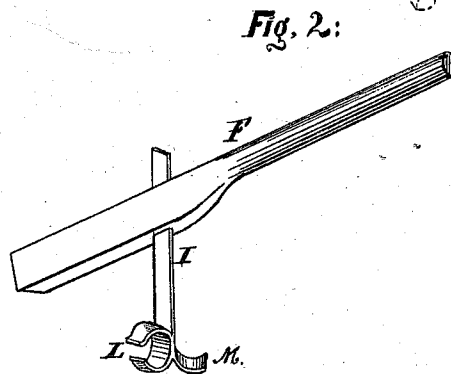
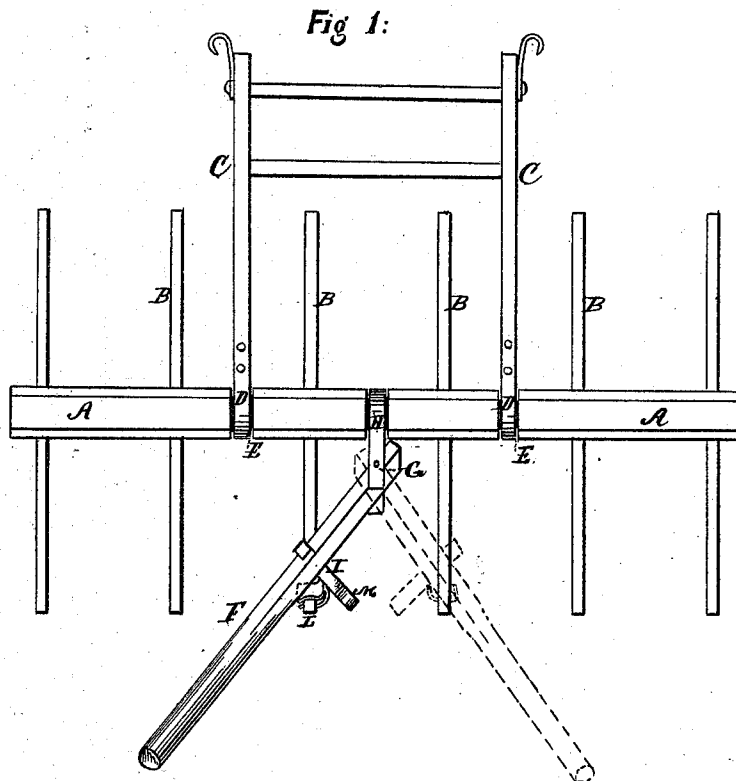


G. PENISTEN, Sr.
Revolving Horse-Rakes.

No. 142,581.

Patented September 9, 1873.



Witnesses:

J. W. Wagner.
W. J. P. Pensten

Inventor:

George Penisten Sr.
Per *James L. Norris*
att'y

UNITED STATES PATENT OFFICE.

GEORGE PENISTEN, SR., OF BUCHANAN, ASSIGNOR TO JAMES M. PENISTEN,
OF SCHOOLEY'S STATION, OHIO.

IMPROVEMENT IN REVOLVING HORSE-RAKES.

Specification forming part of Letters Patent No. 142,581, dated September 9, 1873; application filed May 21, 1873.

To all whom it may concern:

Be it known that I, GEORGE PENISTEN, Sr., of Buchanan, in the county of Pike and State of Ohio, have invented certain new and useful Improvements in Horse Hay-Rake, of which the following is a specification:

This invention relates to an improvement in that class of rakes which possess a revolving head armed with teeth, which, after the collection of a load, are caused to revolve for discharging the same. The invention consists in the provision of a pivoted or hinged lever arranged in proper relation to the revolving rake-head to enable it to be moved both horizontally or laterally and vertically, so as to cause a pair of flexible or elastic gripping-jaws attached to said lever to grasp one of the rake-teeth for holding the head stationary during the collection of a load, notwithstanding the obstacles or irregularities of ground which the teeth may encounter, a reverse movement of the lever serving to connect a hooked or bent arm to an opposite tooth for enabling the rake-head to be partially elevated so as to cause the teeth to penetrate the ground, when, by the resistance offered to the same the rake-head revolves for discharging the load.

In the drawings, Figure 1 is a top or plan view of my improved revolving rake, illustrating the lever in different positions in dotted lines. Fig. 2 is a detached view of the lever.

The revolving head or bar A is provided with any desired number of teeth, B, which project from both sides of the head, as shown. The draft for drawing the rake is applied to the shafts or thills C, the rear curved ends of which are attached to straps or eyes, D, which encircle the reduced portions E of the rake-head, and form journals or bearings for permitting the free rotation of the latter. A centrally-located lever, F, is hinged or pivoted by a fulcrum-bolt, G, to a strap or loose eye, H, embracing the rake-head, this mode of connection permitting both a vertical and

horizontal vibration or movement of the lever to take place, in the ordinary manner common in such rakes. To the lever F, at a suitable distance from its point of attachment, are secured pendent arms I, which are provided, at their lower ends, with flexible or elastic jaws or clamping-fingers L, and a hooked or curved horizontal extension, M, diverging in opposite directions, as shown. The function of the clamping-jaws L, which are spring or elastic extensions of the pendent arm I, is to grasp one of the rear rake-teeth for enabling a downward pressure to be exerted upon the lever F, thus holding the teeth in the desired position in respect to the ground for a proper collection of the load. By the employment of the spring-jaws and forming them so as to encircle the rake-teeth, I am enabled to keep the same in contact with the tooth without a constant lateral pressure by hand upon the lever F, which would be required if the gripping or clamping action of the spring-jaws was not present. This result being accomplished, the lever is vibrated or shifted laterally, causing the hooked extension M to grasp or engage with an opposite tooth when the lever is raised, so as to depress the front rake-teeth, permitting their slight penetration into the ground, when, by the resistance offered to the teeth, the rake-head is caused to completely revolve for discharging the collected load.

I claim as my invention—

The spring clamping-fingers L for embracing the rake-tooth, and curved extension M for lifting the rake, in combination with the lever F and pivoted draft-connection C, all constructed and arranged as and for the purpose specified.

In testimony that I claim the foregoing I have hereunto set my hand this 5th day of May, 1873.

GEORGE PENISTEN, SR.

Witnesses:

J. M. PENISTEN,
ROBERT LOWERY.