(No Model.) 2 Sheets—Sheet 1.

G. H. GOETZE.

SHEAF CARRIER.

No. 382,603. Patented May 8, 1888.

Fig. 1.

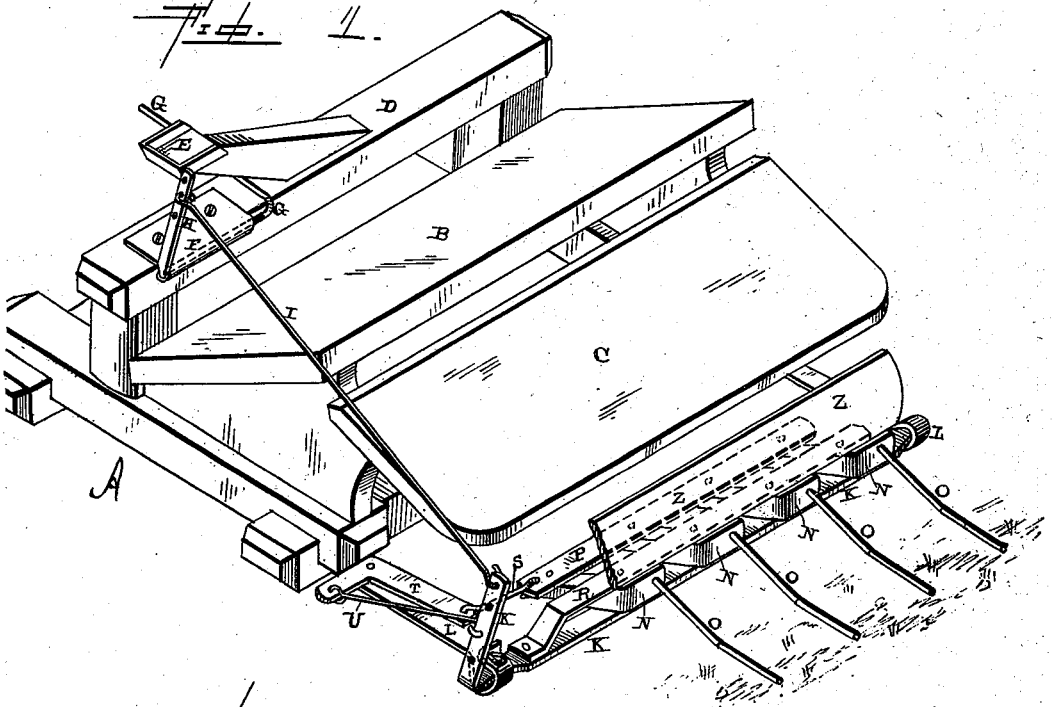
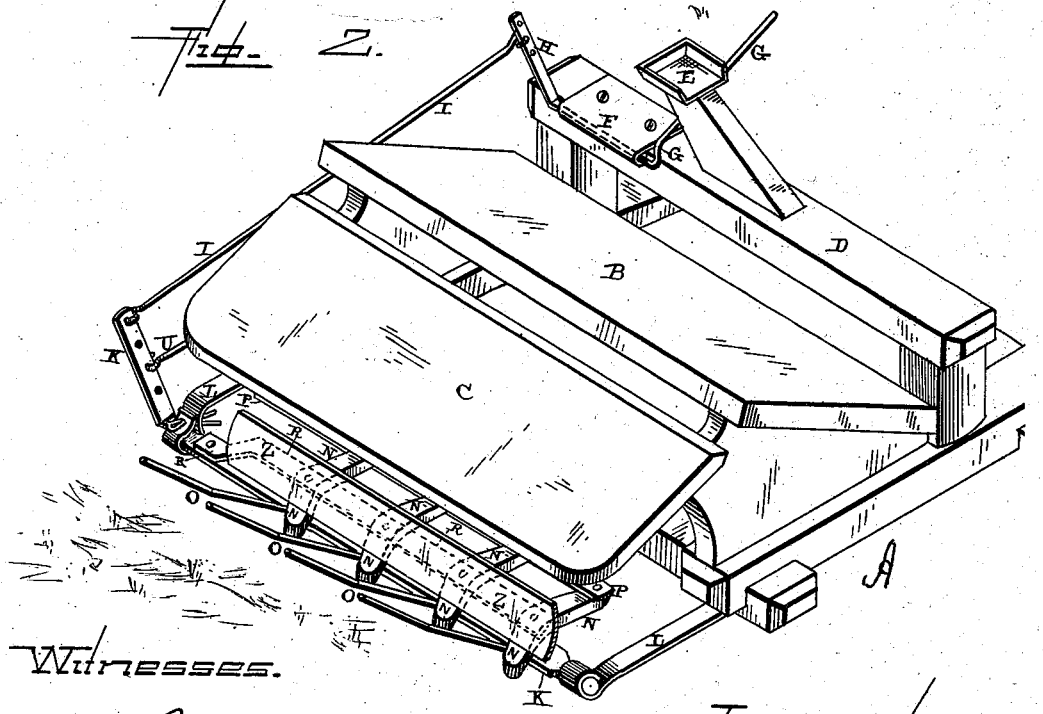


Fig. 2.



Witnesses.

R. F. Gardner
Edm. P. Ellis

Inventor:
Geo. H. Goetze
per F. A. Lehmann, atty

(No Model.) 2 Sheets—Sheet 2.

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Fig. 3.

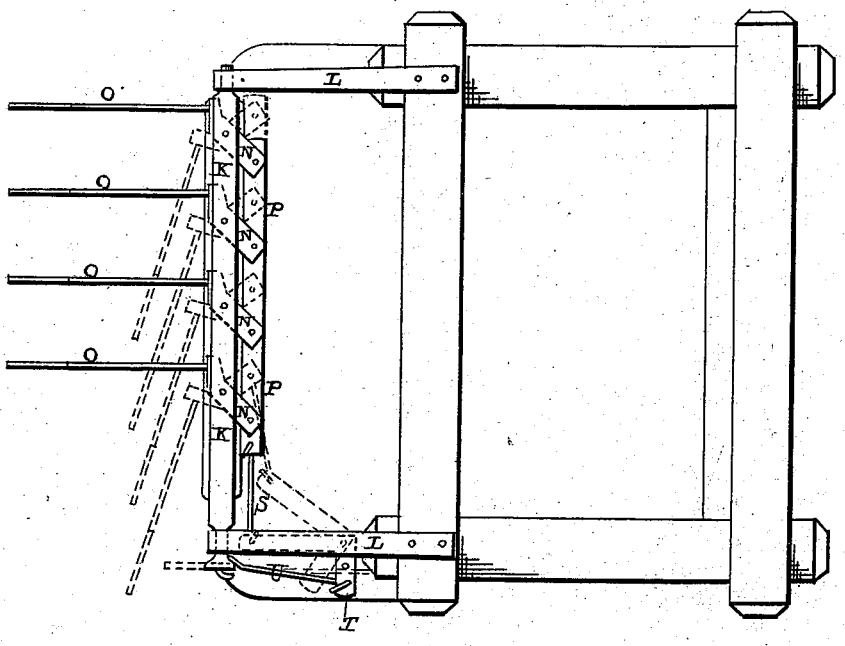
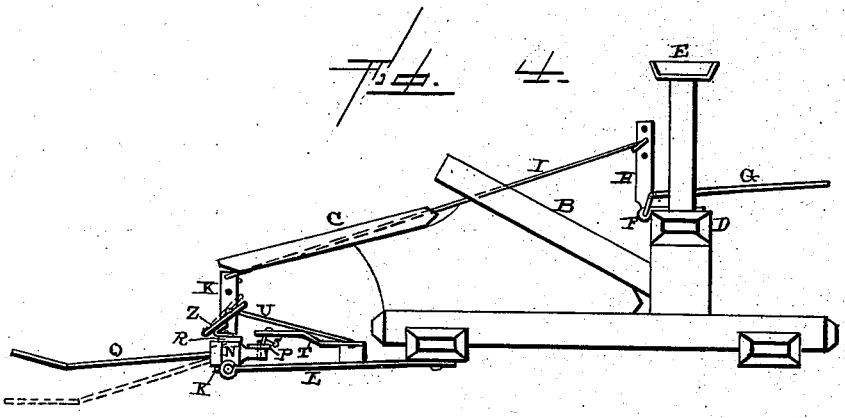


Fig. 4.



Witnesses.

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Inventor.
Geo. H. Goetze,
per F. A. Lehmann, atty.

UNITED STATES PATENT OFFICE.

GEORGE H. GOETZE, OF BAHNER, MISSOURI.

SHEAF-CARRIER.

SPECIFICATION forming part of Letters Patent No. 382,603, dated May 8, 1888.

Application filed July 19, 1887. Serial No. 244,769. (No model.)

To all whom it may concern:

Be it known that I, GEORGE H. GOETZE, of Bahner, in the county of Pettis and State of Missouri, have invented certain new and useful Improvements in Bundle-Carriers; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates to an improvement in bundle-carriers for harvesters; and it consists in the combination of a suitable frame-work, the foot-lever, a connecting-rod, a partially-rotating bearing carrying the arms of the bundle-carrier, and a mechanism for turning the arms upon their pivots at the same time that their outer ends are lowered to discharge the bundle, as will be more fully described hereinafter.

The object of my invention is to so construct a bundle-carrier that its arms shall have both a turning and a rising or returning and falling movement at the same time, so that when the driver moves the foot-lever the arms will be swung around from the side of the machine and raised to receive the bundle, and when the lever is moved in the opposite direction the arms will be both folded together toward the side of the machine and dropped at their outer ends, so as to discharge the bundle.

Figures 1 and 2 are perspectives of the device embodying my invention, taken from opposite sides. Fig. 3 is a bottom view, the arms O being shown in one position in solid lines and in another position in dotted lines. Fig. 4 is a front elevation of the parts which embody my invention.

A represents the reaper and binder frame, which is provided with the elevator B and inclined surface C, over which the grain is packed and bound and then dropped upon the arms of the bundle-carrier, and which parts B C form no part of my invention, but are shown here merely to show where and how my bundle-carrier is used. Upon the cross-timber D of the reaper, and which extends across the lower edge of the inclined surface B, is mounted the driver's seat E. Journaled in suitable bearings, F, upon this cross-timber D is a foot-lever, G, which has one end bent so as to extend at right angles to the timber D, and it is in such a position as to be most readily operated by the driver's foot. The other end, H, of the lever projects upward and is provided with a series of holes, in which the connecting-rod I can be adjusted for the purpose of giving a longer or shorter movement, as may be desired. This connecting-rod I extends stubbleward along the rear end of the binder-frame and has its other end connected to the turned-up end of the partially-rotating arm-supporting shaft K. This arm-supporting shaft K is journaled in the two arms L, which are secured to the under side of the frame-work A, and which project outward from under the inclined surface C. Pivoted upon this arm-supporting shaft K are a series of short cranked or bent levers, N, to which the arms O are secured. The inner ends of these levers N are connected together by means of a connecting-rod, P, so that all of the levers will turn together. Extending parallel with but separated a suitable distance from this partially-rotating arm-supporting shaft K is a rod, R, which is secured to the arm-supporting shaft at one end, as shown in Fig. 1, and which forms the upper bearing for the levers N, so as to hold them securely in position. This upper rod, R, being secured to the arm-supporting shaft K, they always move together.

Connected to the end of the connecting-rod P is the rod S, which has its opposite end connected to the cranked lever T, which is pivoted at its bend upon one of the arms L. From the short end of the lever T extends a connecting-rod, U, which connects the lever T with the upturned end of the arm-supporting shaft K. When the shaft K is moved stubbleward by movement up or down of the foot-lever, the outer ends of all of the arms O are first dropped by the turning of the arm-supporting shaft K, and then as this movement is continued the upturned end of the bearing exerts a pull upon the lever T through the connecting-rod U, and thus the connecting-rod P, which unites the ends of the levers N, causes them to turn upon their pivots between the arm-supporting shaft and the rod R, and thus close the arms together to the side of the machine, as shown, so as to discharge the bundle which

it has been holding. When the end of the foot-lever is depressed and the upturned end of the arm-supporting shaft K is moved toward the binder, the arm-supporting shaft K is raised into a horizontal position, carrying the bent levers N with it, and thus causing the outer ends of the arms O to rise at the same time. This turning movement of the arm-supporting shaft K also causes the connecting-rod U to move the long end of the cranked lever T toward the connecting-rod P, which is moving endwise, and causes all of the levers N to move upon their pivots between the arm-supporting shaft K and the rod R in such a manner as to spread the arms O outward to receive the next bundle. One movement of the foot-lever causes the arms O to have a closing and a falling movement to discharge the bundle, and the other movement causes the arms to have a spreading outward and a rising movement, so as to catch the next bundle as it falls from the inclined surface C. Rigidly secured upon the top of the rod R is an inclined board, Z, which serves to prevent the bundles from falling under the reaper, and which also serves to assist in discharging the bundles by causing them to drop outward from it.

Having thus described my invention, I claim—

1. The combination of the frame-work, the foot-lever, the connecting-rod operated by the foot-lever, the partially turning and supporting shaft K, which is journaled in suitable arms or bearings secured to the frame and operated by said connecting-rod, the bent levers, which are pivoted upon this arm-supporting shaft and provided with arms, and which are connected at their inner ends by the endwise-moving rod P, a connecting-rod connected to the rod P, the pivoted cranked lever for moving the rod P endwise and causing the levers N to turn upon their pivots, and the connecting-rod which unites the angular lever with the crank on the arm supporting shaft, substantially as shown and described.

2. The combination of a partially-revolving arm-supporting shaft, K, mounted in suitable bearings, L, provided therefor, the rod R, which forms the upper bearing for the pivoted levers N, provided with the arms O, and the inclined board Z, which deflects the bundles outward as they drop from the inclined surface C, substantially as described.

In testimony whereof I affix my signature in presence of two witnesses.

GEORGE H. GOETZE.

Witnesses:
F. SIEMZ,
ADAM ZIMMERSCHIED.