G. W. RODENHAUSEN.

Chute for Coal-Wagons.

No. 212,746. **Patented Feb. 25, 1879.**

Fig. 1.

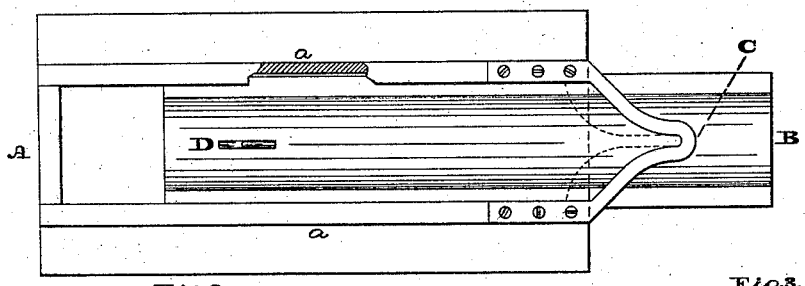


Fig. 2.

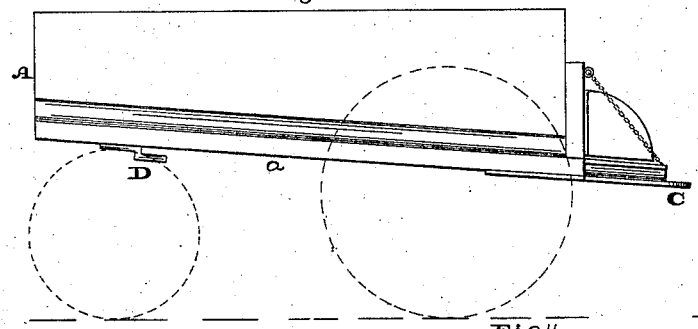


Fig. 3.

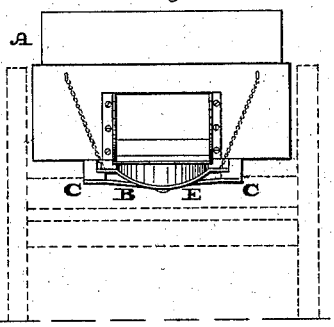


Fig. 4.

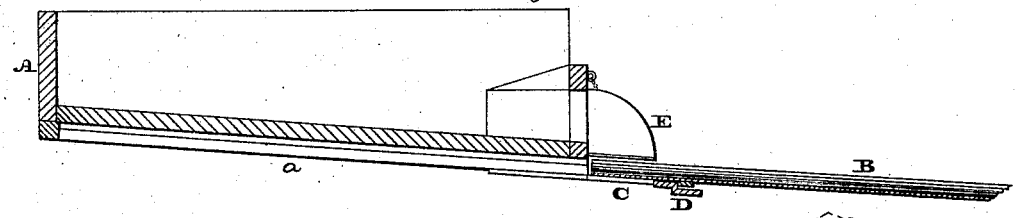
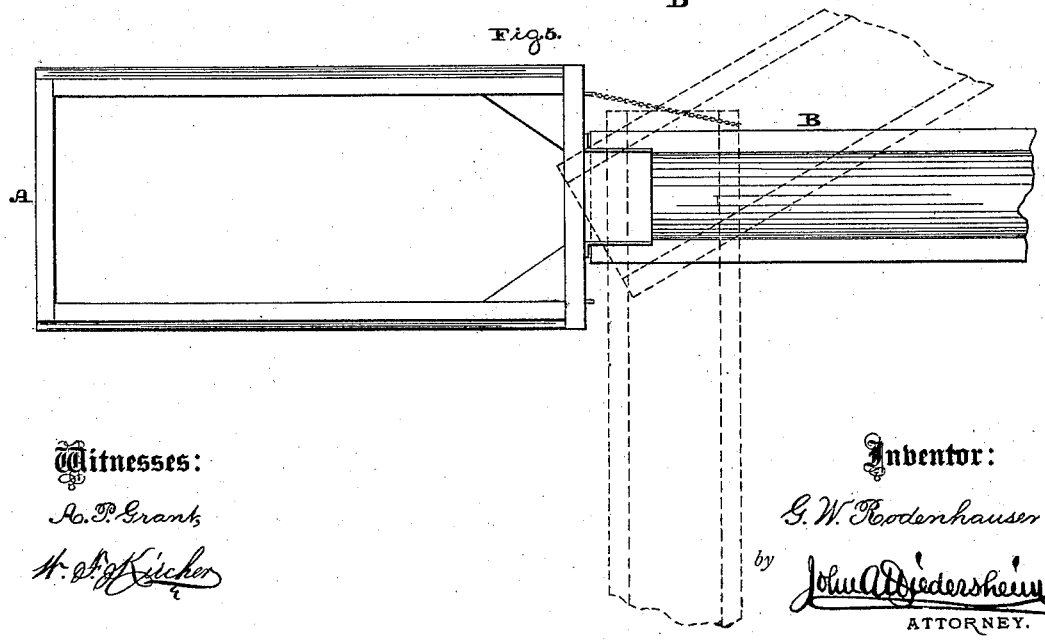


Fig. 5.



Witnesses:

A. P. Grant

H. C. Fischer

Inventor:

G. W. Rodenhausen

by John A. Wiedersheim

ATTORNEY.

UNITED STATES PATENT OFFICE.

GEORGE W. RODENHAUSEN, OF PHILADELPHIA, PA., ASSIGNOR OF ONE-HALF HIS RIGHT TO LEONHARD RODENHAUSEN, OF SAME PLACE.

IMPROVEMENT IN CHUTES FOR COAL-WAGONS.

Specification forming part of Letters Patent No. **212,746**, dated February 25, 1879; application filed January 18, 1879.

To all whom it may concern:

Be it known that I, GEORGE W. RODENHAUSEN, of the city and county of Philadelphia, and State of Pennsylvania, have invented a new and useful Improvement in Coal-Chutes, which improvement is fully set forth in the following specification and accompanying drawings, in which—

Figure 1 is a bottom view of the chute embodying my invention as applied to the body of a wagon. Fig. 2 is a side view thereof. Fig. 3 is a rear-end view thereof. Fig. 4 is a longitudinal vertical section thereof. Fig. 5 is a top or plan view thereof.

Similar letters of reference indicate corresponding parts in the several figures.

My invention consists of a chute having a pivotal connection to the wagon in such manner that it may be placed in various positions for delivering the coal, &c., rearward, to the right or left, or intermediate points, without disconnecting the chute from the wagon.

For this purpose I connect to the rear of the wagon an outwardly-projecting open frame, and connect to the inner end of the chute a hook, which, when the chute is extended, enters the opening of said frame, whereby while the inner end of the chute is supported on the frame the hook forms an axis for the chute, and also prevents disconnection of the chute and frame.

Referring to the drawings, A represents the body of a wagon, which is constructed as usual. To the under side of the body there are secured longitudinally-extending guides *a a*, between which is fitted the chute B, which is supported on said guides, and thus adapted to be drawn out when required for service, or moved in when not in use.

To the rear of the body there is secured an open frame or slotted piece, C, which projects horizontally rearward, the inner walls of the frame or piece being preferably flaring; and on the under side of the inner end of the chute there projects a hook, lug, pin, or button, D, which is adapted to engage with the frame or piece C.

The operation is as follows: When the wagon is to be unloaded, the chute is drawn out and the hook D enters the frame or piece C, and is stopped by the same, whereby the inner end of the chute is connected to and supported on the frame or piece C. The chute may be turned entirely to the right or left or intermediate positions, the hook D forming a pivot and support therefor, yet at all times preventing disconnection of the chute.

It is evident that the chute may be set directly to the rear, when so required. The coal will roll from the wagon into the chutes, and thus be delivered at the desired spot, a spout, E, being preferably employed at the end of the wagon-body, and overhanging the chute, to cause the immediate entrance of coal to the chute.

The chute may be formed of telescopic or other extensible sections, and be attached directly to the wagon-body, or to a frame secured thereto; and the frame or piece C may be a continuation of the supports *a*, or it may be formed of separate castings or forgings.

Chains may be employed for preventing accidental shifting of the chute after being set in position, and also holding the same under the wagon-body when not in service.

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

1. The open frame C, projecting rearward from the wagon-body, and the guides *a* on the under side of said body, in combination with the chute B, having a downwardly-projecting hook, D, substantially as and for the purpose set forth.

2. The chute B, provided with an axial and connecting hook, D, in combination with the open frame C, projecting rearward from the wagon-body, supporting the inner end of the chute when extended, and forming the bearings for the same during rotation, substantially as and for the purpose set forth.

GEO. W. RODENHAUSEN.

Witnesses:
JOHN A. WIEDERSHEIM,
H. E. GARSED.