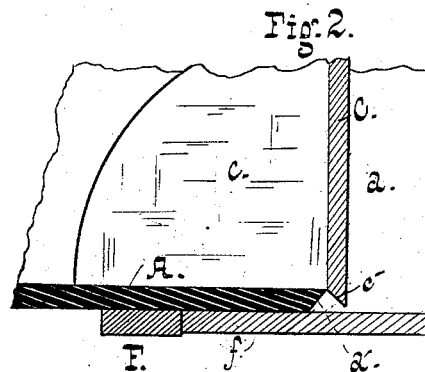
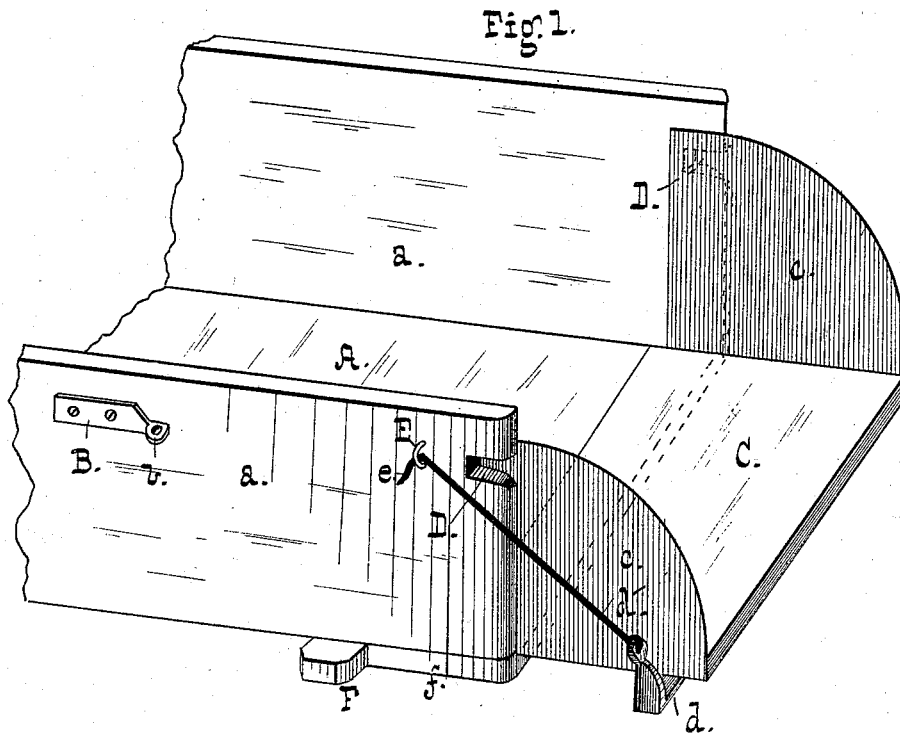


N. MERZ & R. H. WILLIAMS.  
End-Gate for Wagons.

No. 218,996.

Patented Aug. 26, 1879.



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# UNITED STATES PATENT OFFICE.

NICHOLAS MERZ AND ROWLAND H. WILLIAMS, OF SALEM, ILLINOIS.

## IMPROVEMENT IN END-GATES FOR WAGONS.

Specification forming part of Letters Patent No. **218,996**, dated August 26, 1879; application filed July 15, 1879.

### *To all whom it may concern:*

Be it known that we, NICHOLAS MERZ and ROWLAND H. WILLIAMS, both of Salem, Marion county, State of Illinois, have invented certain new and useful Improvements in End-Gates for Wagons; and we hereby declare the same to be fully, clearly, and exactly described as follows, reference being had to the accompanying drawings, in which—

Figure 1 is a perspective view of the rear portion of a wagon-body having our end-gate attached, and shown in its lowered position. Fig. 2 is a central sectional view of the same.

Our invention relates to the end-gates of carts or wagons, and has for its object to provide such a device adapted to facilitate the discharge of the contents of the cart, to prevent the catching of the shovel or other implement used in discharging such articles as corn or coal in the joint between the end-gate and wagon-bed, and to secure, while embodying the feature of ready removability, a maximum degree of stability of the end-gate with respect to the wagon-body.

In the accompanying drawings, A is the bed, having sides *a a*, bolster F, and extension-board *f*. The end-gate C is provided with quadrantal wings *c c*, preferably of metal, which fit closely against the sides of the wagon.

A metallic brace, *d*, is bolted on the outer side of the end-gate, and carries at either end a rod, *d'*, having hooked end *e*, pivoted in a terminal eye, as shown. The rods *d'* pass through staples E at either side of the wagon, and are of such length as to support the end-gate horizontally when lowered, as shown in Fig. 1.

B are plates bolted to the wagon-sides, and having eyes *b*, with which the hooks *e* are made to engage when the end-gate is raised, as shown in Fig. 2.

D D are slots formed in the wagon-sides for the reception of the ends of the brace *d* when the end-gate is raised, the lower faces of the slots being formed in the arcs of circles described about the corners *a'* of the wagon-bed.

The end of the wagon-bed is undercut, as shown at *a'*, Fig. 2, and the lower side of the end-gate is beveled, so that the parts fit closely when the gate is lowered.

Now the mutual relation of the slots D and the end-gate, provided with quadrantal wings and brace, is such that no hinge is required at the bottom of the gate.

When the hooks are fastened in the eyes *b*, the lower edge of the gate cannot recede from the wagon-bed, notwithstanding the absence of a hinge or attaching device at that point, by reason of the contact of the quadrantal wings *c* with the wagon-bed, while the engagement of the brace *d* with the slots prevents the lifting of the gate.

The beveled or undercut end of the bed greatly facilitates the shoveling out of the contents of the cart, while the lowered gate and wings form a convenient chute when one is required, and when not may be removed entirely.

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

1. A wagon having the rear end of its bed undercut, as described, and provided with an end-gate having its lower edge beveled to engage therewith, as and for the purpose described.

2. In combination with the wagon-bed having undercut end and the extension-board *f*, the beveled end-gate and rods *d'*, as set forth.

3. The wagon-body, slotted, as described, at D, in combination with the end-gate C, brace *d*, rods *d'*, catches E *b*, and wings *c*, substantially as set forth.

4. In combination with the wagon-body having slotted sides *a*, catches E *b*, undercut bed A, and extension-board *f*, the end-gate C, having beveled edge *c'*, brace *d*, wings *c*, and rods *d'*, substantially as described.

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