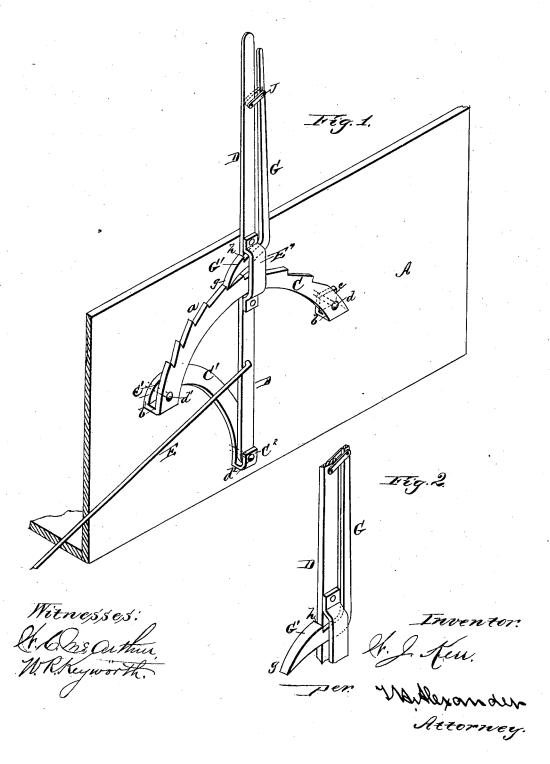
W. J. KERR.

WAGON BRAKE.

No. 260,992.

Patented July 11, 1882.



## UNITED STATES PATENT OFFICE.

WILLIAM J. KERR, OF WHITE OAK GROVE, MISSOURI.

## WAGON-BRAKE.

SPECIFICATION forming part of Letters Patent No. 260,992, dated July 11, 1882.

Application filed May 5, 1882. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM J. KERR, of White Oak Grove, in the county of Greene and State of Missouri, have invented certain new and useful Improvements in Wagon-Brakes; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form part of this specification, in which—

Figure 1 is a perspective view of my wagonbrake attached to a wagon, and Fig. 2 is a de-

tail perspective.

This invention relates to wagon-brakes; and the nature of my invention will be fully understood from the following description when taken in connection with the annexed drawings.

The letter A designates the side-board of a wagon-bed, to which I rigidly apply my im-

proved brake.

C designates a segment, the upper edge of which is toothed, as indicated at a. The ends 25 of this segment are bent square to form the portions b, and these portions are again bent square to form the offsets c c'. The front offset receives through it a bolt, d, which passes through the segment and the angular lip, and 30 also through the side-board of the wagon-bed. A single nut holds this front end of the toothed segment rigidly to its place. The rear offset receives through it a bolt, d', which passes through the segment and a plate, C', and also 35 through the side-board of the wagon-bed. A single bolt also holds the rear end of the segment with this additional security. The metal of which the segment C is formed is bent to form the plate C', which is a brace not only 40 for the front bolt, d, but also for the rear bolt, d'. This plate or brace C' is extended downward, and its end is angularly bent twice on itself, to form what I shall denominate a "stirrup,"  $C^2$ , through which passes a bolt,  $d^2$ , that 45 secures this end of the brace C' to the sideboard of the wagon.

It will be seen that the toothed segment, its angular ends or offsets, the curved brace, and its stirrups or angular end are all formed of

50 one piece of metal.

D designates a hand-lever, which is pivoted to the bolt  $d^2$ , and which is connected to the brakes by a rod, F. This lever D is bent outwardly, so that it will lie closely against the

inner side of the segment C, as shown in the 55 drawings.

E designates an angular strap or loop of metal, which is rigidly riveted to the outer side of the lever D, and which receives through it the toothed segment C. This loop E braces 60 the lever against lateral motion, but allows it free vibration about its fulcrum bolt  $d^2$ .

G designates a lever, which has formed on its lower end a pawl, G', that passes freely through and is allowed vertical play in the 65 loop E above the serrated edge of the segment C. The beveled or engaging part g of the pawl G' is made very broad, so that a shoulder, h, is formed on it adapted to bear against the rear edge of the lever D, and when 70 the brakes are applied to assist in resisting the strain on the beveled or engaging edge or end of pawl G'.

The lever G is connected by links J J to the hand-lever D, and these links are so pivoted 75 to the said levers that the pawl-lever G will, by its own gravity, engage with the toothed segment when freed from the grasp of the hand. The upper part of the gravitating pawl-lever G is in such close relation to the corresponding part of the hand-lever D that it is convenient for the driver to grasp both levers

in one hand at the same time.

It is clear from what I have above described that when the handles of the two levers D 85 and G are grasped and pressed together, the pawl G' will be freed from the segment C and the brakes can be released, or, in other words, the levers can be vibrated freely. When the lever G is released from the grasp of the hand 90 the weight or gravity of this pawl-lever will cause an engagement of it with the segment C without the use of a spring or other auxiliary.

Having described my invention, I claim as 95

The combination of the gravitating lever G, the pawl G', and the shoulder formed on this lever with the vibrating hand-lever D, the loop E, the links J, and the toothed segment, substantially in the manner and for the purpose described.

In testimony that I claim the foregoing as my own I affix my signature in presence of two witnesses.

Witnesses: WILLIAM J. KERR. PHIL. T. SIMMONS, J. P. McCammon.