

No. 813,286.

PATENTED FEB. 20, 1906.

E. EINFELDT.
WAGON GEAR.

APPLICATION FILED AUG. 8, 1905.

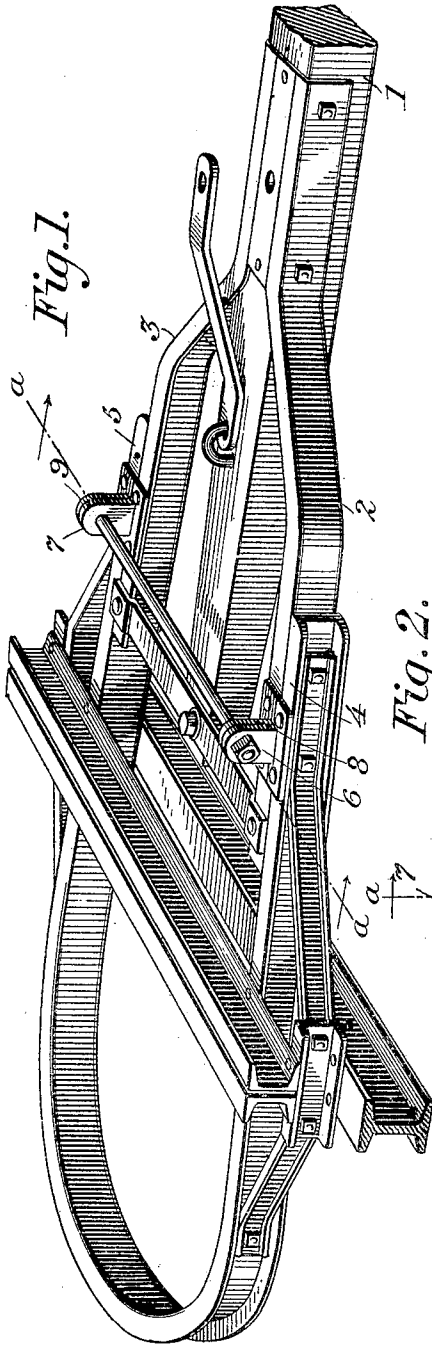


Fig. 1.

Fig. 2.

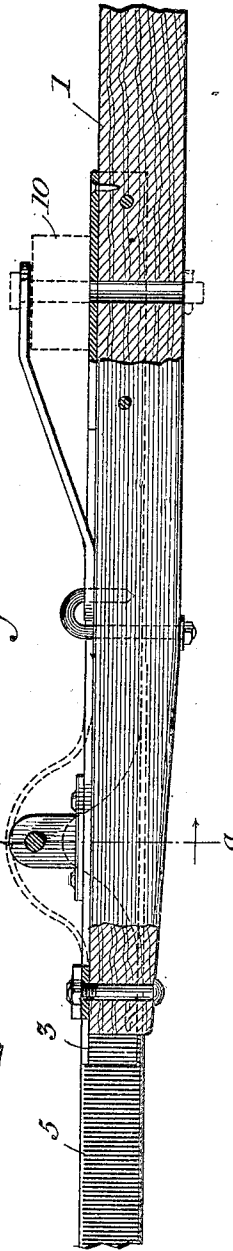
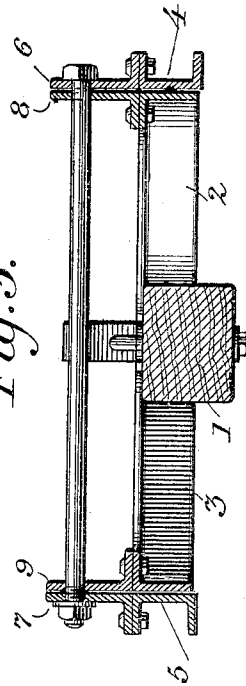


Fig. 3.



WITNESSES:

P. F. Barnes.
W. K. Klopfer.

INVENTOR

Emil Einfeldt

BY

P. F. Lodge
ATTORNEY

UNITED STATES PATENT OFFICE.

EMIL EINFELDT, OF DAVENPORT, IOWA, ASSIGNOR TO BETTENDORF
METAL WHEEL COMPANY, A CORPORATION OF IOWA.

WAGON-GEAR.

No. 813,286.

Specification of Letters Patent.

Patented Feb. 20, 1906.

Application filed August 8, 1905. Serial No. 273,244.

To all whom it may concern:

Be it known that I, EMIL EINFELDT, of Davenport, county of Scott, and State of Iowa, have invented a new and useful Improvement in Wagon-Gears, of which the following is a specification.

This invention relates to wagon-gears, and particularly to the means for connecting the tongue to the front gear in order to bring the hitch of the draft-animals at a low point.

It is a common practice in order to secure a low hitch to apply the doubletree to the under side of the tongue; but this arrangement possesses many disadvantages familiar to those skilled in the art.

The aim of the present invention is to secure a low hitch of the draft-animals to the tongue without the necessity of changing the position of the doubletree—that is, without applying the doubletree to the under side of the tongue—so that the advantages of having the doubletree on the upper side of the tongue may be preserved.

The invention consists, therefore, in an improved connection between the tongue-hounds and the front gear-hounds, whereby the tongue fixed to the tongue-hounds will be sustained at a lower level when the tongue is in the position it usually occupies when the draft is applied than the connection between the hounds, with the result that with a doubletree on the upper side of the tongue the tendency of the draft of the animals will be to lift the tongue, thereby relieving the animals of neck-weight and applying the draft to the greatest advantage.

In the accompanying drawings, Figure 1 is a perspective view of the front gear-hounds in a wagon-gear, showing the tongue applied and having my invention embodied therein. Fig. 2 is a central longitudinal sectional elevation of the same. Fig. 3 is a transverse sectional elevation on the line *a a* of the preceding figures as viewed in the direction of the arrows on said figures.

Referring to the drawings, 1 represents a tongue, near the rear end of which are applied and firmly fixed tongue-hounds 2 and 3, extending rearwardly and outwardly and along the inner sides of the front ends of gear-hounds 4 and 5, forming a part, as usual, of the front gear of the wagon.

The tongue-hounds are preferably formed of angle-iron, with their horizontal flanges

presented inward, so that where they are connected with the tongue these flanges will extend along the upper edges of the same and the vertical flanges will extend along the sides of the tongue, the parts being firmly connected together by horizontal bolts extending through the side flanges and through the tongue. The gear-hounds are similarly formed, except that their horizontal flanges are arranged outwardly in order that their vertical flanges will present flat bearing-surfaces to the vertical flanges of the tongue-hounds.

In carrying my invention into effect instead of applying the pivotal connection of the gear-hounds and tongue-hounds within the general plane of said hounds, which is usually effected by extending a draw-bolt horizontally through said hounds, I apply the pivotal connection above the general plane of the hounds—conveniently by providing the gear-hounds with upwardly-extending lugs 6 and 7 and the tongue-hounds with upwardly-extending lugs 8 and 9, and I extend the draw-bolt through these lugs, as clearly shown in the drawings. As a result of this arrangement and construction the upper side of the tongue will when the tongue is in the position it usually occupies when the draft of the animals is applied be sustained at a considerable distance below the axis of the draw-bolt, as shown in Fig. 3, so that with a doubletree 10 applied as usual to the upper side of the tongue the draft of the animals will have a lifting tendency, will relieve the neck-weight, and will apply the draft at the most advantageous point.

Instead of providing the hounds with the upright pivoting-lugs, as shown, the former may have an upward bend formed in them, as indicated by dotted lines in Fig. 2, and the pivoting-bolt may be passed through the side flanges of the upwardly-bent portions of the hounds, the essential idea being that the connection of the hounds shall be at a higher level or in a plane above the general plane of the hounds.

It is obvious that my invention is not limited in its use in connection with a doubletree applied to the upper side of the tongue, although this arrangement is preferable, and it avoids the disadvantages of having the doubletree on the under side of the tongue and at the same time secures a low hitch.

The invention may be employed in connection with the doubletree applied to the under side of the tongue where it is desirable to increase the upward pull of the draft-animals.

5 Having thus described my invention, what I claim is—

1. In a wagon-gear the combination of the front gear-hounds, a tongue, tongue-hounds applied to the tongue, and a connection between the gear-hounds and tongue-hounds
10 said connection having its axis constantly in an unchanging plane relative to the gear-hounds disposed above the general plane of said hounds when the tongue is in a horizontal position, substantially as described.
15

2. In a wagon-gear, the combination of the front gear-hounds, the tongue, tongue-hounds applied to the tongue, upright projections on said hounds, and a connection between said

projections having its axis extending in an unchanging plane relative to the gear-hounds. 20

3. In a wagon-gear, the combination of the front gear-hounds, upright lugs thereon, a tongue, tongue-hounds applied to the tongue, upright lugs on the tongue-hounds, and a draw-bolt extending through said lugs and connecting said hounds together on an axis disposed in a single unchanging plane relative to the gear-hounds, substantially as described. 25

In testimony whereof I hereunto set my hand, this 11th day of July, 1905, in the presence of two attesting witnesses. 30

EMIL EINFELDT.

Witnesses:

M. LOUISE DODGE,
ANDREW NEILSON.