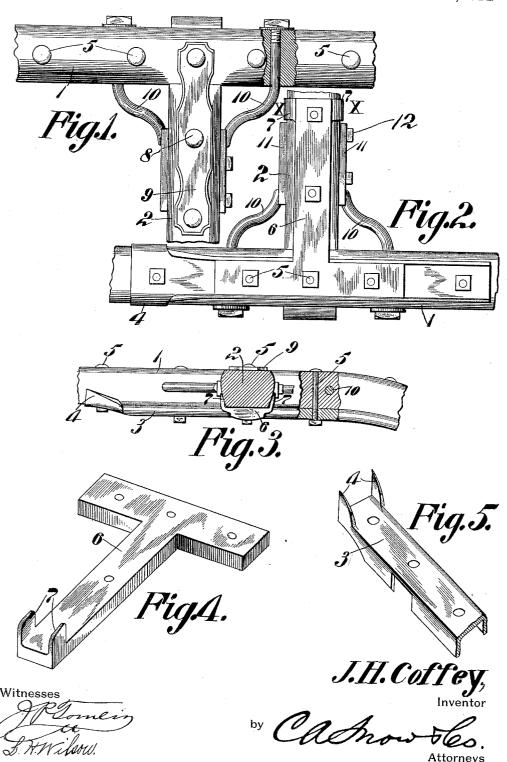
J. H. COFFEY. VEHICLE. APPLICATION FILED AUG. 7, 1912.

1,099,638.

Patented June 9, 1914.



UNITED STATES PATENT OFFICE.

JOSEPH H. COFFEY, OF GASTONIA, NORTH CAROLINA.

VEHICLE.

1,099,638.

Specification of Letters Patent.

Patented June 9, 1914.

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To all whom it may concern:

Be it known that I, Joseph H. Coffey, a citizen of the United States, residing at Gastonia, in the county of Gaston and State of North Carolina, have invented new and useful Improvements in Vehicles, of which the following is a specification.

This invention relates to improvements in vehicles, more particularly draft poles or

10 shafts therefor.

The invention has for its object mainly to provide for effectively bracing or holding together the shaft-members and their uniting or connecting member or a draft-pole 15 and its cross-bar.

A further object is to provide for effectively taking the strain off the securing bolts between the respective parts of the shaft or

A still further object is to carry out the aforesaid ends in a simple, effective and inexpensive manner.

The nature of the invention consists of certain instrumentalities and features substantially as hereinafter fully disclosed and

defined by the appended claim.

In the accompanying drawing, illustrating the preferred embodiment of my invention wherein it will be understood that va-30 rious changes and modifications as to the detailed construction and arrangement of the constituent parts may be made without departing from the spirit thereof, Figures 1 and 2 are a plan view of the device, and an 35 underside view thereof, respectively; Fig. 3 is a partly side view and a partly sectional view of the same, certain parts being broken away, the section being taken upon the line x-x of Fig. 2. Fig. 4 is a detached per-40 spective view of the T-member or casting effecting connection between the shaft-members and their connecting cross-bar or member, or a draft-pole and its inner-end cross or arcuate bar. Fig. 5 is an inverted per-45 spective view of a channel-iron member for preferably receiving the head of the T-member or casting, and which channel-iron member is applied to the underside of each shaftmember or pole-member at its point of 50 union with the transverse member.

In carrying out my invention I provide for suitably and effectively bracing or holding the shaft-members 1 and their connecting cross-bar or member 2 firmly or rigidly where they are usually tongued and mortised together, also for effecting a like brac-

ing or holding action between a draft-pole and its transverse or arcuate bar or member, similarly connected together. Such bracing means, which is applied to each 60 shaft or thill, includes preferably a channeliron member 3 preferably rectangular in general outline, with opposed upwardly extending lugs 4 at one end adapted to embrace the thill or shaft laterally from its 65 underside as seen in Figs. 2 and 3, to guard against any lateral play of the member 3 which would otherwise result from the wearing of the bolt-holes, said lugs being somewhat tapered toward their upper corner- 70 edges, as well as along their upper edges to effectively take into or grip the shaft or thill. The channel-iron member 3 is secured or connected to the thill or shaftmember by means of bolts 5, preferably five 75 being used, inserted, at suitable intervals apart, therethrough and through the thill or shaft and through the tongue or tenon of the shaft-connecting or cross-bar. The member 3 is formed preferably of channel- 80 iron, steel or malleable metal, because of its relatively greater strength. A T-member 6, also preferably of iron, steel or malleable metal is employed in connection with the channel-iron member 3 for each thill or 85 shaft and the connecting cross-bar between the shafts, the head or cross of the T being received within the channel of said member 3 and the stem or perpendicular member of the T being applied to said connecting cross 90 bar, said stem having at its inner end opposed lugs 7 suitably tapered or beveled along their upper edges to suitably grip said cross-bar laterally, from below, similarly as results in the use of the lugs 4 and for like 95 purpose as above set forth in connection with the latter. The head or cross of the T-member 6 is secured in position by means of a number of the securing bolts 5 used to secure the channel member 3 in place to the 100 shaft or thill, the stem or perpendicular member of the T being secured in position to the underside of the connecting cross-bar by means of bolts 8, this T-metal member 6 thus uniting with the channel-member 3 to 105 brace the shaft or thill and connecting crossbar firmly and rigidly from the underside thereof. These parts, the thills and their connecting cross-bar, are further or additionally strengthened at their points of con- 110 nection from the upperside by means preferably of flat metal plates 9 applied to the

upper side of said parts, the same bolts or fastenings 8 and one of the bolts 5 being utilized to effect the securing of said plates 9 in place down upon said thills and con-5 necting cross-bar. Also further bracing means are employed to strengthen or brace the shafts or thills and the connecting crossbar therebetween, at their points of connection laterally by means of rod or bolt like 10 members or brackets 10, passed or inserted through the shafts or thills and secured thereto by nuts threaded upon said rods or bolts, the latter having welded or brazed thereto plate-extensions 11, or the rod or 15 bolt-like and plate portions of each of these braces may be a single piece, said rod or bolt-like portions being preferably curved or inclined laterally away from said platelike portions to provide an extended brac-20 ing or reinforcing action. The plate-like extensions 11 of the laterally bracing members are suitably belted or riveted, as at 12, to the transverse connecting member of the thills or shafts.

What is claimed is:— A device of the type described including a vehicle-thill, a transverse member connected to said thill, a channel-iron member applied to said thill, upon its underside, a T-iron member with its head portion re- 30 ceived by said channel-iron member, the stem or perpendicular portion of said Tiron member being applied to said transverse member, upon its underside, lateral bracing screw-threaded and nut-equipped 35 members having plate extensions, and a bracing plate-member applied to said thill and transverse members, and fastening means for the respective parts above indi-

In testimony that I claim the foregoing as my own, I have hereto affixed my signature in the presence of two witnesses.

JOSEPH H. COFFEY.

Witnesses:

cated.

C. C. CORNWELL, S. R. ABERNETHY.

Copies of this patent may be obtained for five cents each, by addressing the "Commissioner of Patents, Washington, D. C."