No. 671,226. Patented Apr. 2, 1901.

M. D. OSGOOD.

STOP PLATE FOR SHAFT CARRIERS.

(Application filed Aug. 12, 1899.)

(No Model.)

Fig. 1

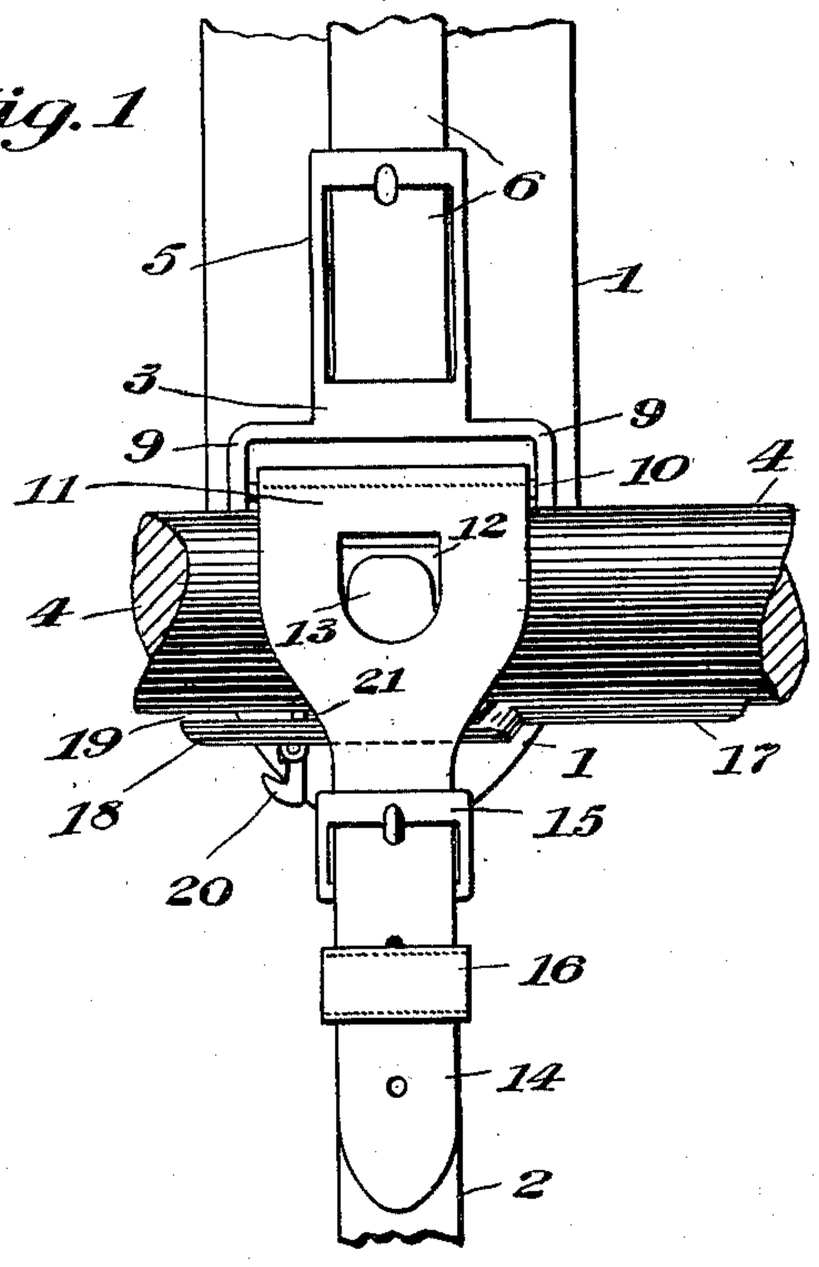


Fig. 2

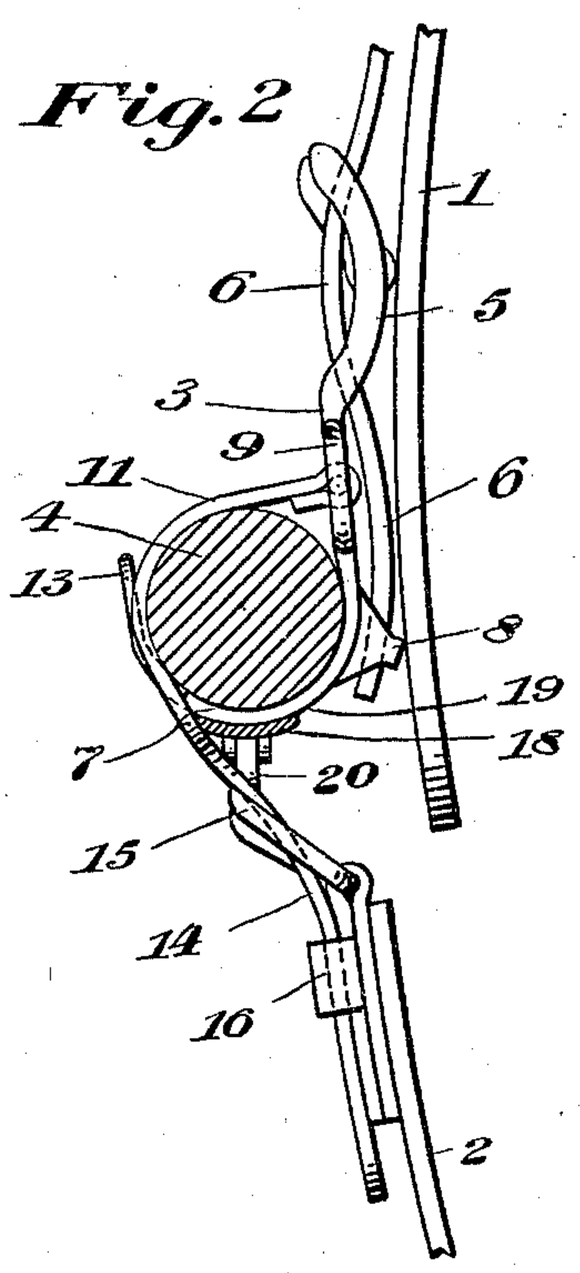


Fig. 3

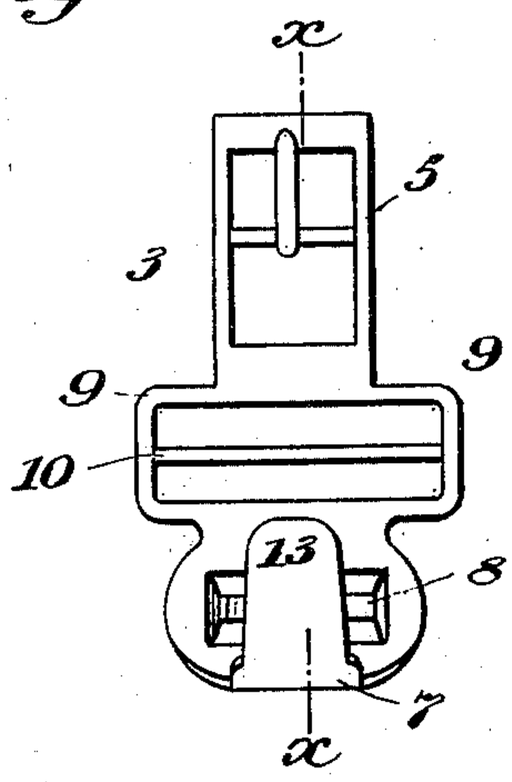


Fig. 4

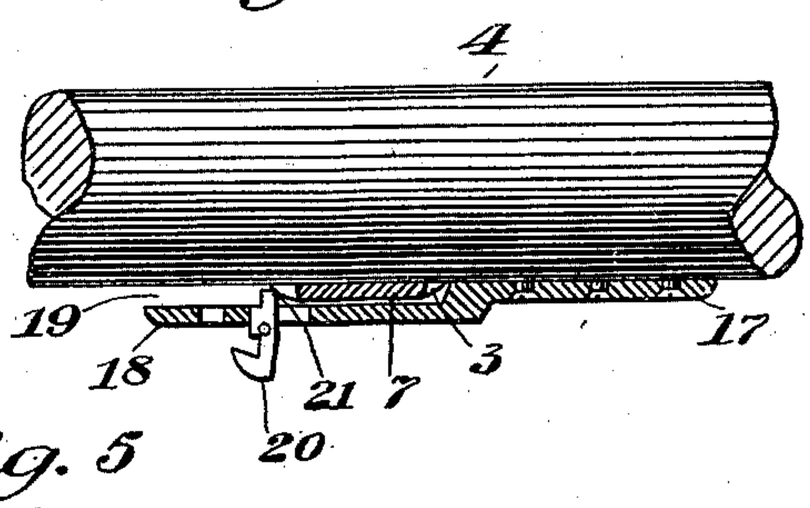
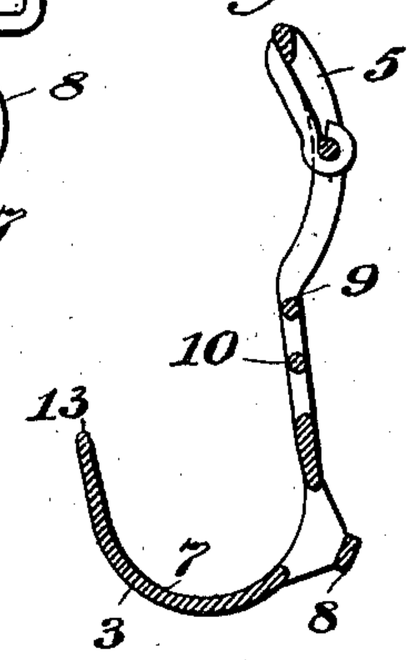


Fig. 5



Witnesses:
J. D. Howe
A. C. Smith

Inventor:
Miles D. Osgood.
by John Elias Jones,
his attorney.

UNITED STATES PATENT OFFICE.

MILES D. OSGOOD, OF CINCINNATI, OHIO.

STOP-PLATE FOR SHAFT-CARRIERS.

SPECIFICATION forming part of Letters Patent No. 671,226, dated April 2, 1901.

Application filed August 12, 1899. Serial No. 727,083. (No model.)

To all whom it may concern:

Be it known that I, MILES D. OSGOOD, a citizen of the United States of America, and a resident of Cincinnati, in the county of Hamilton and State of Ohio, have invented certain new and useful Improvements in Stop-Plates for Shaft-Carriers, of which the following is a specification.

This invention relates to certain improvements in shaft tugs or carriers for harness, and has for its object, in part, to provide a device of this character of a simple and inexpensive nature which shall be provided with improved means for holding the shaft or thill in position on the horse, and, in part, to provide an auxiliary back-stop device carried by the shaft and adapted to engage with the tug or carrier to hold the shaft against longitudinal movement with respect thereto.

The invention consists in certain novel features of the construction, combination, and arrangement of the several parts of the improved shaft-tug, whereby certain important advantages are attained and the device is made simpler, cheaper, and is otherwise better adapted and made more convenient for use, all as will be hereinafter fully set forth.

The novel features of the invention will be carefully defined in the claim.

In order that the invention may be the better understood, I have illustrated in the accompanying drawings a vehicle-shaft tug or carrier constructed according to my invention, in which drawings—

Figure 1 is a side elevation showing parts of a saddle, girth, and shaft having my improved shaft-tug in place. Fig. 2 is an end view showing the same parts, the shaft being seen in cross-section. Fig. 3 is a view showing the body portion or frame of the device in side elevation and detached. Fig. 4 is a sectional view showing the back-stop device carried by the shaft for engagement with the improved tug, and Fig. 5 is a vertical section on line $x\,x$ in Fig. 3.

In the views, 1 indicates the saddle, and 2 the belly-band, adapted to pass under the horse, as usual, to hold the saddle in place.

3 indicates as a whole the body portion or frame of the improved shaft-tug formed of metal in a single piece, and 4 indicates the shaft or thill.

The metallic frame or body portion 3 of the improved tug or carrier is formed at its upper part with an integral rectangular open frame 5, having a cross-bar at its central part whereon is pivoted a tongue, thereby forming a buckle adapted to receive the lower end of a strap or band 6, extending up above the frame and secured at its upper part to the saddle 1.

The lower part of the metallic frame or body portion 3 is formed with an integral shaft-carrier 7, bent or curved outwardly and upwardly to form a hook-shaped rest or support for the shaft or thill 4, and on the rear surface of said lower part of the frame or body portion 3 is produced a transverse integral eye or loop 8, forming a receptacle for the lower end of the strap 6 to keep it from rubbing against and chafing the horse or any undue lateral or other play. To form the eye or loop 8, parallel slots are produced in the frame or body portion 3, the part between said slots being bent or extended rearwardly from the plane of the said body portion to produce the eye or loop 8.

The central part of the frame or body portion 3 of the device, between the loop 8 and the rectangular frame 5, is bent forward, so as to be held in front of and out of contact with the saddle 1, with which said loop 8 and frame 5 engage, and the side portions of said central part of the frame or body 3 are extended out laterally at opposite sides, as shown at 9 9 in the drawings, and is provided with an elongated rectangular opening extended entirely across the said wider central portion of the frame to produce an open frame the central portion of which is provided with a cross-bar 10, also extended transversely across the frame or body portion and adapted to receive one end of a broad strap 11, the body of which is adapted to pass over the shaft or thill 4 to hold the same in position upon the carrier-hook 7, and is formed with a centrally-arranged eye or opening 12, of a size just sufficient to receive the rounded extremity 13 of the carrier-hook 7, so as to permit of using the improved tug in connection with shafts of different diameters, the said opening 12 permitting the strap 11 to be drawn tightly down over the shaft held on the hook, as will be readily understood. The end of the strap

11 is narrowed down, as shown at 14, and is carried down around and beneath the hook 7 and engaged with a buckle 15 and loop 16, carried by the belly-band 2.

The broad end of strap 11 is looped around bar 10 and secured thereto by stitching in a well-known way, and such looped end is prevented from being worn by constant chafing on the saddle by reason of the forward bend produced in the body at the frame 3, as above described, said bend serving to hold the looped end of said strap away from and out of contact with the saddle, as clearly shown in Fig. 2.

In connection with the improved tug constructed as above described I prefer to employ a back-stop device carried by the shaft in position to engage the carrier-hook of the tug in case the singletree should be broken or either or both traces detached or broken while in use. The means shown for this purpose comprises a metallic plate 17, secured by means of screws or otherwise to the under side of the shaft 4 and having its forward end bent down beneath the under surface of the shaft, as shown at 18 in the drawings, so as to produce between the bent end 18 of the plate and the under surface of the shaft 4 a space 19, adapted to receive the carrier-hook 7 when the shaft is in position thereon, as shown in Figs. 2 and 4. The bent end 18 of the plate is provided with depending lugs, between which is pivoted a dog or catch 20, playing in an opening in the part 18 of the plate and having one end adapted to project in the space 19 in position to engage in front of the carrier-hook 7, so as to prevent the shaft from being drawn out of engagement with the tug in case the trace or singletree should break. The opposite end 22 of the dog or catch 20 is weighted, so as to hang normally in the position shown in Figs. 1 and 4; but when necessary or desired said dog may be swung on its pivot, and thus its weighted end lifted, so as to withdraw its opposite end 21 from engagement with the carrier-hook 7, and thereby permit the horse to be withdrawn from the vehicle-shaft by merely unbuckling the strap 11 at either side, then pushing or drawing the hook 7 forwardly past said dog, and then the horse may walk out from between the shafts, letting the latter slide along the carrier-hooks 7, or the said shafts may be lifted out of engagement with the carrier-hooks 7, as desired.

When it is desired to back the horse, the carrier-hook 7 will be engaged with the shouldered bent part of the plate 17, so as to prevent further endwise movement of the shaft through the tug, and thereby to materially relieve the strain upon the breeching, so that this latter part of the harness may be made much lighter or in some cases may be dispensed with altogether. In placing the horse in the shaft it is also evident that the pivotal movement of the dog or catch 20, above referred to, permits the shaft to be readily inserted in the tug and the latter slid rearwardly until the hook 7 rides past said dog or catch into place.

From the above description it will be seen that the improved shaft tug or carrier constructed according to my invention is of an extremely simple and strong nature and is especially well adapted for use, since it permits the shaft to be held securely to the saddle and at the same time permits the horse to be readily connected to and detached from the shaft, and it will be obvious from the above description that the device is capable of some modification without material departure from the principles and spirit of the invention, and for this reason I do not wish to be understood as limiting myself to the precise form and arrangement of the several parts herein set forth.

Having thus described my invention, I claim—

As a new article of manufacture, a stop-plate for connecting shaft-carriers to vehicle-shafts, said stop-plate having one end adapted for attachment to a vehicle-shaft and having its other end offset from its attaching portion and provided with ears, and a weighted gravity dog or catch pivoted to said ears and having its locking end projecting freely through a slot or opening in the offset portion of the plate and extending out above the latter for engagement with the shaft-carrier.

Signed by me at Cincinnati, Ohio, this 14th day of June, 1899.

MILES D. OSGOOD.

Witnesses:
JOHN ELIAS JONES,
A. E. SMITH.