

(No Model.)

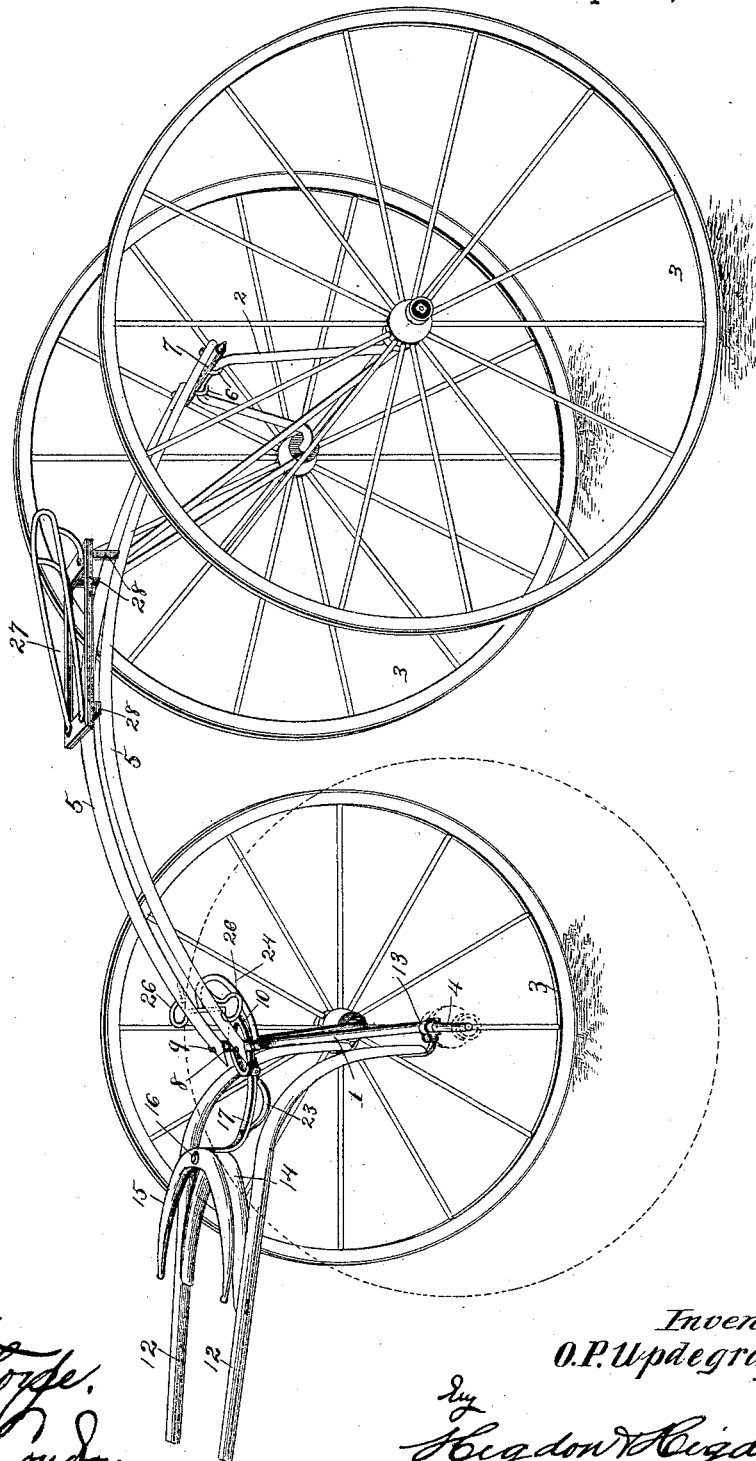
2 Sheets—Sheet 1.

O. P. UPDEGRAFF.  
TRAINING WAGON.

No. 458,668.

Patented Sept. 1, 1891.

Fig. 1.



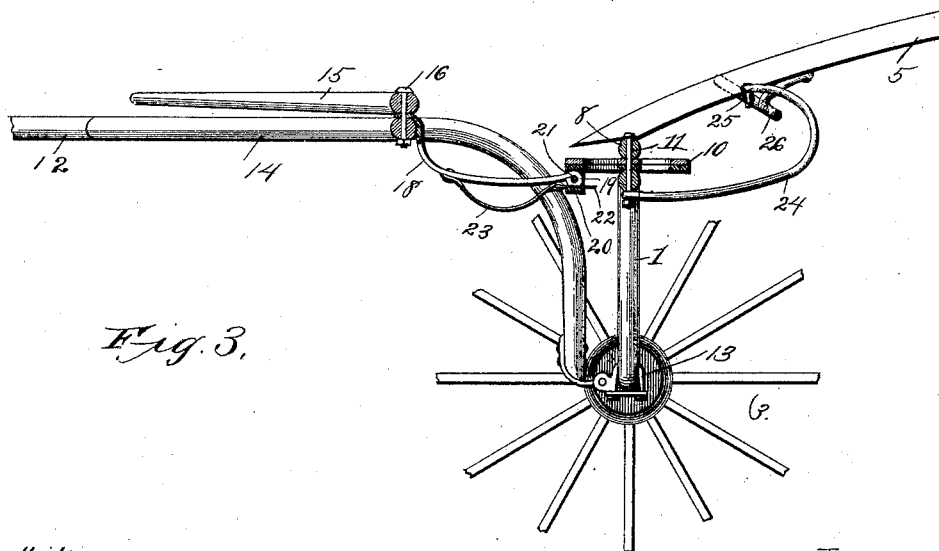
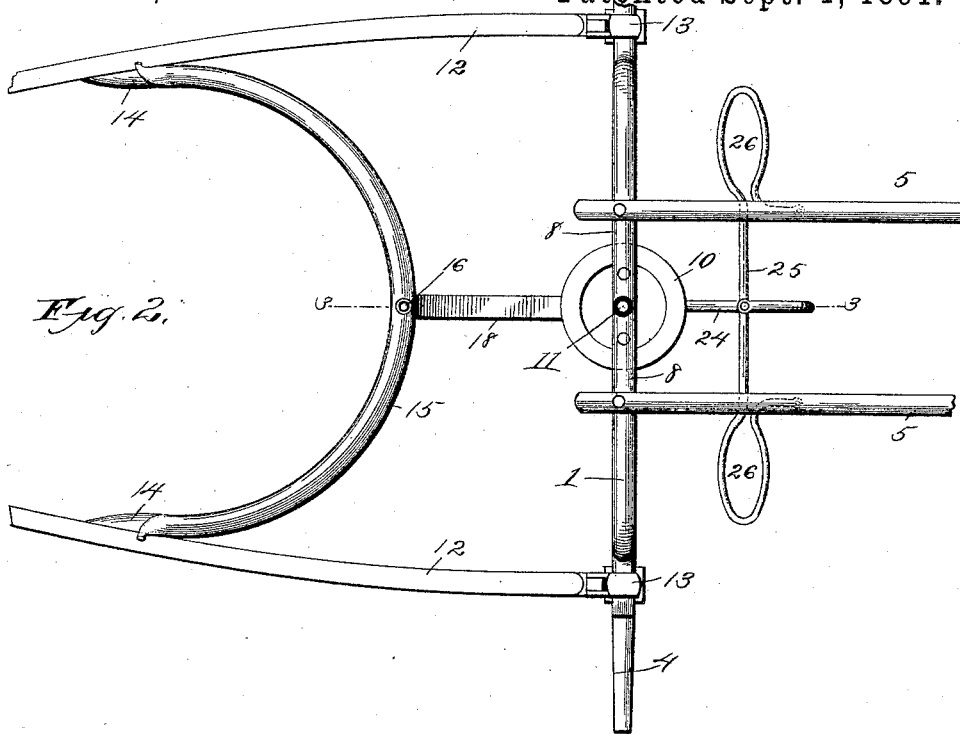
Witnesses:  
*G. W. Hoyle.*  
*Jno. L. Condon*

Inventor.  
*O. P. Updegraff.*  
by  
*Higdon & Higdon,*  
attorneys.

O. P. UPDEGRAFF  
TRAINING WAGON.

No. 458,668.

Patented Sept. 1, 1891.



Witnesses:  
*Geo. H. H. H.*  
*Geo. L. Condon*

Inventor:  
*O. P. Updegraff.*  
by *Higdon & Higdon.*  
Attorneys.

# UNITED STATES PATENT OFFICE.

OLIVER PRICE UPDEGRAFF, OF TOPEKA, KANSAS.

## TRAINING-WAGON.

SPECIFICATION forming part of Letters Patent No. 458,668, dated September 1, 1891.

Application filed May 28, 1891. Serial No. 394,361. (No model.)

*To all whom it may concern:*

Be it known that I, OLIVER PRICE UPDEGRAFF, of Topeka, Shawnee county, Kansas, have invented certain new and useful Improvements in Training-Wagons, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings, forming a part hereof.

My invention relates to vehicles for training colts and for general track purposes; and the object of my invention is to produce a light, strong, and durable wagon which shall be comparatively inexpensive in construction and which shall be capable of withstanding the sudden and violent strains due to the erratic and fractious actions of the animals while undergoing training and general track work.

To the above purpose my invention consists in certain peculiar and novel features of construction and arrangement, as hereinafter described and claimed.

In order that my invention may be fully understood, I will proceed to describe it with reference to the accompanying drawings, in which—

Figure 1 is a perspective view of a training-wagon constructed in accordance with my invention, one of the front wheels being removed. Fig. 2 is a plan view of the front part of the same. Fig. 3 is a vertical longitudinal section of the same on the line 3 3 of Fig. 2.

In the said drawings, 1 designates the front and 2 the rear axle of the wagon. Each of these axles consists of a metal bar, which is bent into segmental or bow form and which curved upward between the carrying-wheels 3, the highest point of each axle being midway between its two wheels. The ends of each axle extend outward horizontally and form the spindles 4, upon which the hubs of the wheels turn.

5 5 designate two side bars, each of which is also composed of a metal or a wooden bar bent into segmental or bow form and which curve upward from the rear to the front axle. These bars extend parallel with each other and their rear ends are connected to the upper side of the rear axle 2 by clips 6, which embrace the axle and also pass through a cross-bar 7, which lies immediately above the

axle and beneath the rear ends of the said side bars. It will be seen by reference to Fig. 1 that the curvature of these side bars is such that when said bars are properly connected to the front and rear axles, to be presently described, the front carrying-wheels 3 can be turned freely directly under said bars. This is an important feature of my invention, inasmuch as it renders it impossible for a fractious and erratic young animal to overturn the wagon by suddenly shying and wheeling directly around. The front ends of these side bars are connected together by a cross-bar, which lies beneath the front extremities of the side bars and which is secured thereto by bolts 9.

10 designates a fifth-wheel, through the center of the two parts of which passes a vertical king-bolt 11, which also passes through the cross-bar 8 at its middle, the said fifth-wheel and cross-bar being thus secured by the king-bolt to the front axle above its central and highest point.

12 designates the shafts of the wagon, said shafts being bent downward at their ends and connected to the inner ends of the spindles 4 of the front axle 1 by clips 13, as shown.

14 designates the cross-bar, which connects the rear portions of the two shafts 12. This cross-bar is of segmental or bow form and is placed with its concave side forward, as shown, the two ends of the cross-bar being bolted or otherwise suitably connected to the inner sides of the shafts.

15 designates the singletree, which is also of segmental or bow form, and which is attached midway of its length to the cross-bar 14 by a vertical bolt 16. This singletree is also placed with its concave side forward, as shown.

18 designates a metal bar or arm, which is of substantially J form, and the front end of which is formed with an eye, through which passes the bolt 16, the said front end of the arm lying between the cross-bar 14 and the singletree 15. This bar or arm extends downward and rearward and its rear end is formed with an eye 19, which enters a square box 20, pendent from the underside of the fifth-wheel 10, midway of the front part thereof. This eye 19 surrounds a cross-pin 21, which passes transversely of the box, as shown.

22 designates a pin, which is inserted through the box 20 from the front thereof, and which lies immediately beneath the flattened under side of the eye 19. The outer end of this pin is connected to one end of a strap 23 or an equivalent flexible device, the opposite end of which is connected to the bar or arm 18, preferably about midway of the length of the same.

24 designates a brace, which is approximately J form, and the rear end of which is connected to a cross-bar 25, which connects the front part of the side bars 5. From this point of connection the brace 24 extends downward and forward and its front end surrounds the lower end of the king-bolt 11, the fifth-wheel being thus braced and stiffened by said brace 24. The cross-bar 25 is formed at its ends with loops 26, which extend beyond the outer sides of the side bars 5, and which serve as foot-rests or stirrups for the driver. The extremities of this cross-bar are bolted or otherwise secured to the front parts of the said side bars 5.

27 designates a suitable seat, which is mounted upon the side bars 5 at the highest points of the same, and which is preferably leveled by supports 28, placed under its front and rear ends, the upper ends of said supports being bolted or otherwise secured to the described parts of the seat and the lower ends of said supports being similarly secured to the side bars of the wagon.

It will be seen from the above description that the wagon is light, strong, durable, and comparatively inexpensive in construction, and that it is peculiarly adapted for training and general track purposes. The segmental or bow form of the cross-bar and singletree permits the animal to be harnessed close to the front of the wagon, while the arched side bars enable the wagon to make extremely short and sudden turns without any danger of being overturned. The arch from the axles not only imparts additional strength to the wagon, but also places the driver well up over the animal, so that he commands a full view of the course and also a powerful command of the lines or reins. The arrangement of the bar 18 and the pin 22 is such as to support the shafts, when desired, and at the same time to permit the shafts to be easily

lowered by simply withdrawing the pin, and, finally, the arrangement of the cross-bar 25 and the connecting-bar 24 is such as to bring the entire strain, due to the position of the driver's feet in the stirrups 26, upon the king-bolt, which is the part best adapted to stand such strain.

Having thus described my invention, what I claim as new therein, and desire to secure by Letters Patent, is—

1. An improved training-wagon having a fifth-wheel mounted upon its front axle, a curved bar connected to the cross-bar of the shafts and having its rear end pivoted in a box beneath the fifth-wheel, and a pin removably inserted into said box and lying beneath a flattened portion of the eye of said bar, substantially as set forth.

2. An improved training-wagon comprising upwardly-arched front and rear axles, cross-bars secured to the middle or highest points of said axles, upwardly-arched side bars secured at their ends to said cross-bars, a seat secured to the middle or highest points of the side bars, and a fifth-wheel secured between the front axle and the front cross-bar, the said side bars extending at their middles above the space required by the diameters of the front carrying-wheels, substantially as set forth.

3. An improved training-wagon comprising upwardly-arched front and rear axles, cross-bars secured to the middle or highest points of said axles, upwardly-arched side bars secured at their ends to said cross-bars, a fifth-wheel interposed between the middle of the front axle and the front cross-bar, a king-bolt connecting said front axle and front cross-bar, a second cross-bar connected at its ends to the side bars back of the front cross-bar and having outwardly-extending looped portions forming stirrups, and a curved bar or brace connected at its front end to the king-bolt and at its rear end to the said cross or stirrup bar, substantially as set forth.

In testimony whereof I affix my signature in presence of two witnesses.

OLIVER PRICE UPDEGRAFF.

Witnesses:

EDWARD BROOKE HENDERSON,  
C. S. BOWMAN.