

M. J. JENKINS.
Tire-Tighteners.

No. 152,118.

Patented June 16, 1874.

Fig 1.

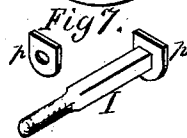
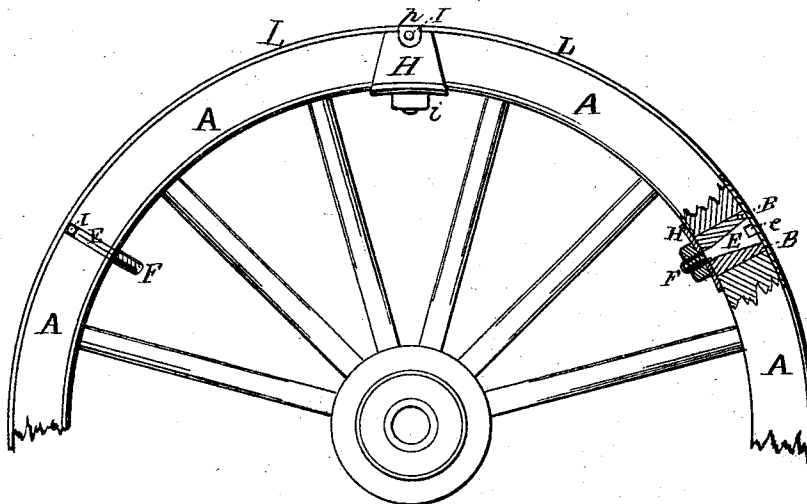


Fig 2.

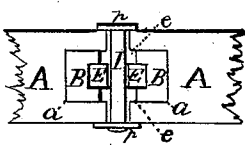


Fig 3.

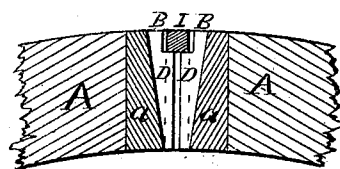


Fig 4.

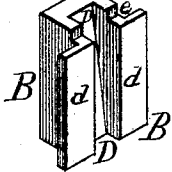


Fig 5.

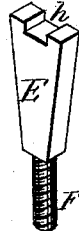
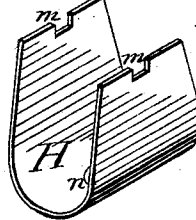


Fig 6.



Witnesses.

J. R. Nottingham
T. C. Smith

Inventor.

Martin J. Jenkins
by his attys.
Cox & Cox

UNITED STATES PATENT OFFICE.

MARTIN J. JENKINS, OF CHILLICOTHE, MISSOURI.

IMPROVEMENT IN TIRE-TIGHTENERS.

Specification forming part of Letters Patent No. **152,118**, dated June 16, 1874; application filed April 11, 1874.

To all whom it may concern:

Be it known that I, MARTIN J. JENKINS, of Chillicothe, Livingston county, Missouri, have invented a new and useful Improvement in Tire-Tighteners, of which the following is a specification, reference being had to the accompanying drawings.

The invention relates to an improved tire-tightener; and consists in mortising between the fellys two plates, the opposite faces of which are provided with vertical slots, tapering toward the hub, and forming a wedge-shaped cavity to receive a correspondingly-shaped piece of metal provided with a screw projecting upon the inner side of the fellys, and there provided with a nut for drawing the wedge, and thus expanding the plates. The junction of the plates is covered by a cap, the upper edges of which are connected by a tie-bolt passing between the fellys and plates, which are properly recessed for that purpose. The nut upon the standard aforesaid may be placed as stated, or so as to bear against the cap, a hole being cut in the latter to permit the passage of the screw. The object of the invention is to provide a convenient device for tightening the tires of vehicles, and thus avoid the labor of resetting them.

Figure 1 is a view of a device embodying the invention as applied. Fig. 2 is a top view of same. Fig. 3 is a vertical section, the wedge removed. Fig. 4 is a detached view of the plate B. Fig. 5 is a similar view of the wedge E. Fig. 6 is a like view of the cap H. Fig. 7 is a corresponding view of the bolt I and heads.

A in the accompanying drawings represents the fellys, the ends of which are provided with the vertical slot *a*. The plate B consists of a piece of metal provided with the flanges *d*, between which is the slot D, which is deeper on its upper than lower end, tapering from top to bottom. The upper part of the plate and flanges has a transverse recess, *e*. The area of the plate is coincident with the end of the felly, except as to the recessed parts. The flanges fit over the surface of the felly adjacent, while the bulk of the plate B enters the recess *a*, the recess *e* being toward

the outer side of the felly. Thus, when the plates B are in position, a wedge-shaped cavity is formed by the slots D, a recess across their upper portions by the recesses *e*, while the flanges *d* impinge. The wedge E is constructed to fit snugly in the cavity between the slots D, the recess *h* on its head corresponding to the width of the recess between the outer ends of the plates B. A screw, F, is secured to the point of the wedge, extending toward the hub, and provided with a nut, *i*. The cap H is bent to conform to the inner and side surfaces of the fellys adjacent their junction, open on its outer side, and provided with the slots *m*, which, when the plates B are in position, are opposite the recess in their outer ends. The lower portion of the cap has an aperture, *n*, to permit the passage of the screw F. The upper sides of the cap are connected by the bolt I, provided with the heads *p*, which project slightly above the fellys, and furnish a side support for tie L, which holds the bolt to its place, the shaft of the bolt being conformed to fit into the recesses *e* and slots *m*, in such manner that the outer surface shall be flush with the outer curve of the adjacent fellys.

The device being in the position stated, to expand the fellys it is only necessary to screw up the nut *i*, which draws down the wedge E, thus increasing the distance between the plates B, and effecting the object of the invention, while a contrary movement forces the wedge E outward, and allows the plates to approach each other, thus loosening the fellys.

The purpose of the bolt I is to prevent foreign matter entering the device, and to give lateral support to the tire or fellys. The cap H is useful to seal the joint and afford a bearing for the nut I.

It is obvious that the cap H and bolt I can be used singly or conjointly.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. The plates B, provided with the slots D, in combination with the wedge E, provided with the screw F and nut *i*, substantially as shown and described.

2. The cap H, in combination with the bolt I, substantially as shown and described.

3. The combination of the plates B, wedge E, screw F, nut i, and cap H, substantially as shown and described.

4. The combination of the plates B, wedge E, screw F, and bolt I, substantially as shown and described.

In testimony that I claim the foregoing improvement in tire-tighteners, as above described, I have hereunto set my hand and seal this 2d day of April, 1874.

MARTIN J. JENKINS. [L. s.]

Witnesses:

JOHN P. FRIEST,
ERASTUS LEACH.