(No Model.)

F. HEIDELBERG.

COMBINATION TRUSS ROD AND CORNER BRACE FOR CARS.

No. 589,432. Patented Sept. 7, 1897.

Fig. 1.

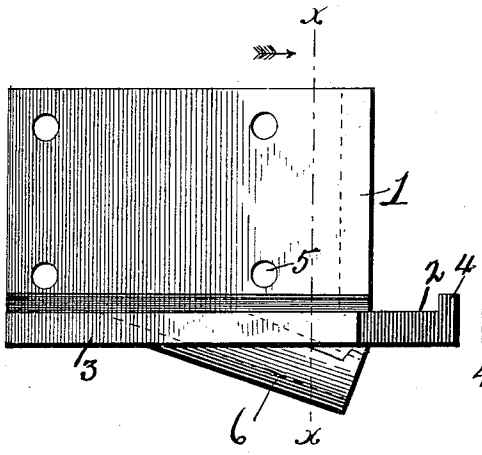


Fig. 5.

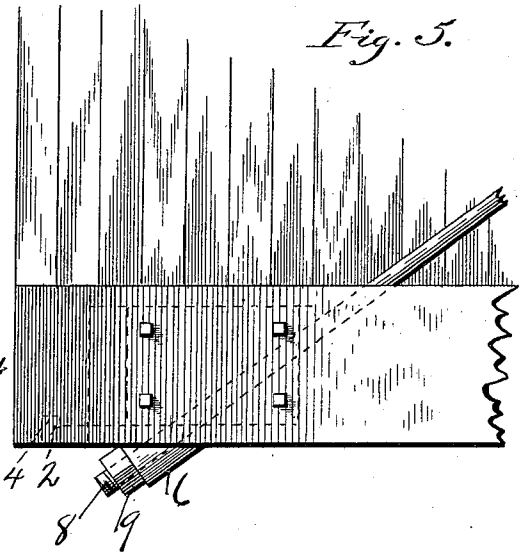


Fig. 2.

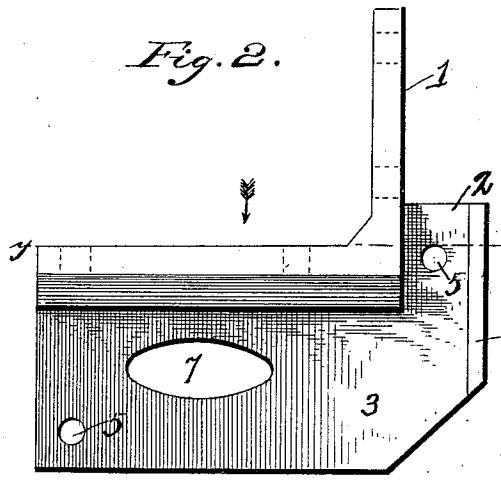


Fig. 3.

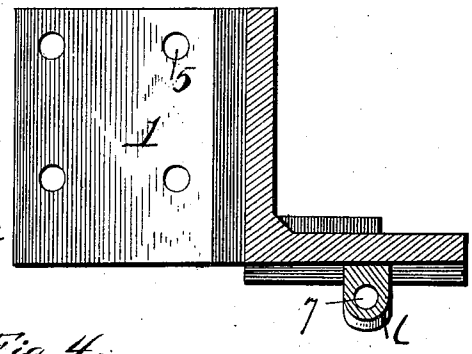
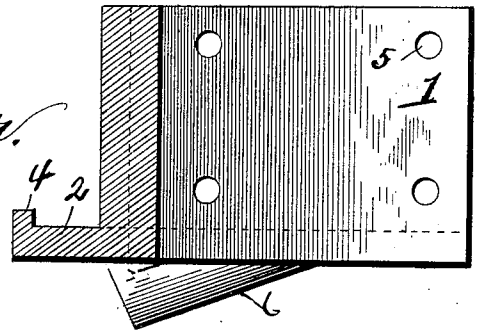


Fig. 4.



Witnesses:

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FREDERICK HEIDELBERG, OF MARSHALL, TEXAS.

COMBINATION TRUSS-ROD AND CORNER-BRACE FOR CARS.

SPECIFICATION forming part of Letters Patent No. 589,432, dated September 7, 1897.

Application filed February 1, 1897. Serial No. 621,412. (No model.)

To all whom it may concern:

Be it known that I, FREDERICK HEIDELBERG, a citizen of the United States of America, residing at Marshall, in the county of Harrison and State of Texas, have invented certain new and useful Improvements in Brace-Irons for Cars, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to improvements in car-irons, and more particularly to that class designated as "corner brackets or braces," the object of the invention being to produce a device of this class which will support and strengthen the car-sills, and, furthermore, to provide means whereby the worn sills may be removed and replaced in a ready and convenient manner.

A further object of this invention is the production of brackets which support the truss and receive the strain thereof, thus strengthening the structure and prolonging its durability. Finally, the object of the invention is to render the parts strong, efficient, and satisfactory, making them at the same time comparatively inexpensive to produce and sustain.

With the above and other objects in view the invention consists in the novel details of construction, as well as in the arrangement and combination of parts, to be hereinafter more fully set forth and specifically claimed.

In describing the invention in detail reference will be had to the accompanying drawings, forming part of this specification, wherein like characters of reference denote corresponding parts in the several views, in which—

Figure 1 is a side view of my improved brace-iron detached and illustrating the boss. Fig. 2 is a plan view thereof. Fig. 3 is a sectional view taken on the line $x\,x$ of Fig. 1. Fig. 4 is a sectional view taken on the line $y\,y$ of Fig. 2, looking in the direction of the arrow. Fig. 5 is a view in elevation, showing the invention applied to a car.

In the drawings, 1 denotes an angle-iron adapted to fit the end and side of a sill, and formed therewith are end and side flanges for the support of the end and side sills. Said flanges are numbered 2 and 3, respectively, in the drawings. The end flange has an upturned edge or lip 4, which is embedded in the sill to insure rigidity of the structure. The flanges and body are provided with lag-screw apertures 5, as is clearly shown.

On the bottom of the side flange I provide a boss 6, which has an inclined aperture 7 to receive the brace-rod 8, said rod being secured by the nut 9, as illustrated in Fig. 5.

As will be observed, the boss for holding the truss-rod is formed with the corner-casting. Thus the strain on said rod is centered at the four corners of the car-frame, which is a departure from the usual construction and is advantageous, as will be observed.

By my invention the old construction of mortising the sills is done away with and the parts are assembled readily. If it is desired to renew worn parts, it is only necessary to remove the casting, drop the old sill straight down, elevate the new sill in position, and replace the casting without interfering with any of the adjacent timbers.

The advantages and operation of the invention will, it is thought, be understood from the foregoing description, and it will be noted that various changes might be resorted to in the proportions, the formation of the boss, and other details of construction, and yet the spirit of my invention will not be departed from.

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

1. In a device of the character described, a bracket, side and end flanges formed therewith, a lip formed on the end of the end flange, a boss arranged under the side flange, and a truss-rod secured through an aperture of the boss, substantially as described.

2. In a device of the character described, a bracket for fitting in the corner of a car-frame, flanges extending from the side and end, a boss extending from the under side of one flange, said boss and flange having an inclined opening and a truss-rod passing through the opening, substantially as described.

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

FREDERICK HEIDELBERG.

Witnesses:
T. P. YOUNG,
J. E. MERRITT.