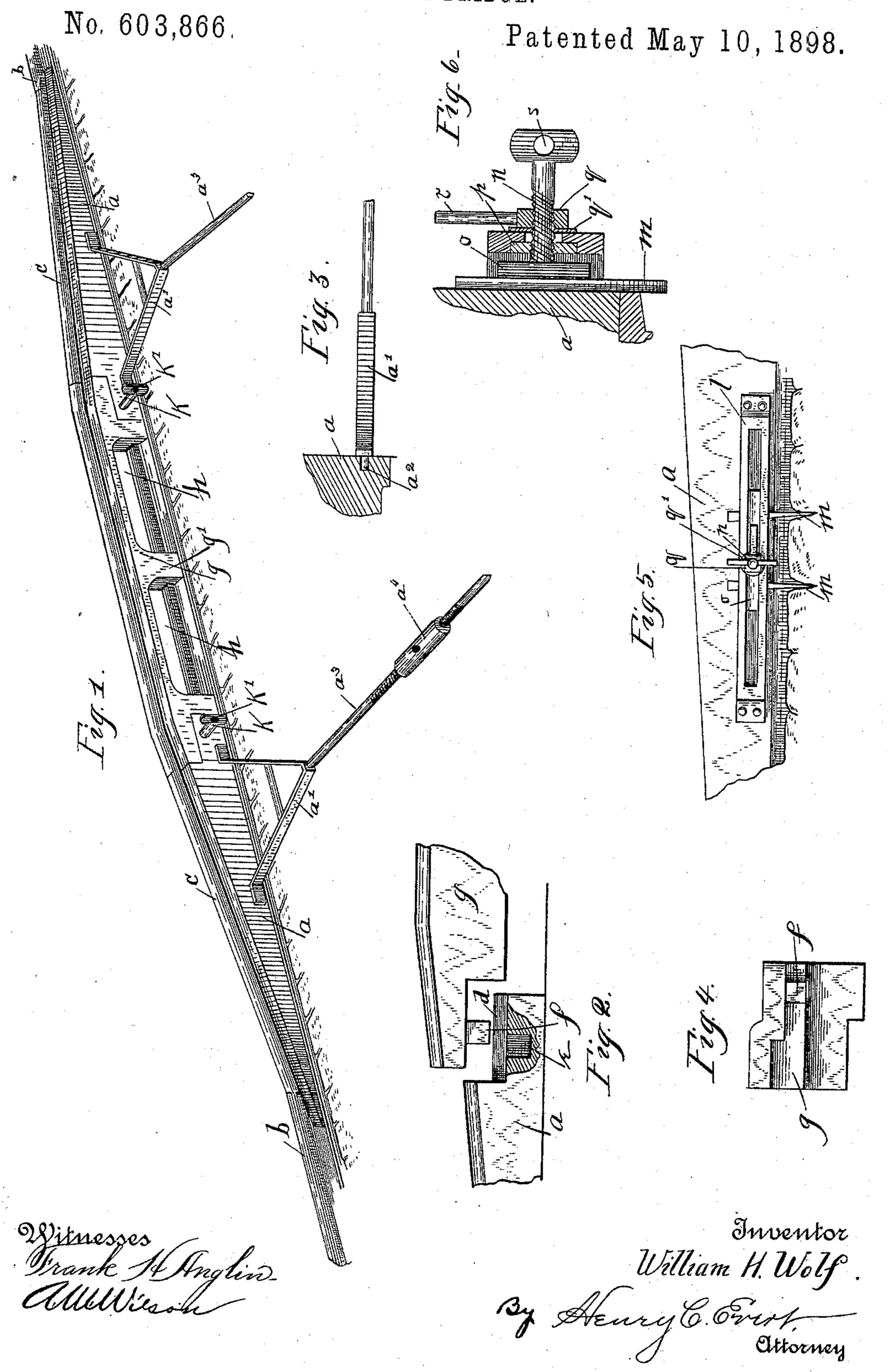
W. H. WOLF.
HOSE BRIDGE.



## United States Patent Office.

## WILLIAM H. WOLF, OF PITTSBURG, PENNSYLVANIA.

## HOSE-BRIDGE.

SPECIFICATION forming part of Letters Patent No. 603,866, dated May 10, 1898.

Application filed June 11, 1897. Serial No. 640, 314. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM H. WOLF, a citizen of the United States of America, residing at Pittsburg, in the county of Allegheny and State of Pennsylvania, have invented certain new and useful Improvements in Hose-Bridges, of which the following is a specification, reference being had therein to the ac-

companying drawings.

This invention relates to certain new and useful improvements in hose-bridges, and has for its object to construct a convenient bridge which may be quickly placed upon the tracks of street or steam railways, so as to pass the conveyances readily over the hose which have been laid across the track without injury to the same; and to this end the invention consists in the novel construction, combination, and arrangement of parts to be hereinafter more specifically described, and particularly pointed out in the claims.

Briefly described, the invention consists of two end pieces for each rail and a central piece engaging said end pieces to complete the arch over the hose, the novel method of fastening the sections together and for securing the same firmly to the track, together with novel means for bracing the bridges on each

rail together.

In describing the invention in detail reference is had to the accompanying drawings, forming a part of this specification, and wherein like letters of reference indicate similar parts throughout the several views, in which—

Figure 1 is a perspective view of my improved hose-bridge in position on the rail, showing the connecting-rods broken away. Fig. 2 is a side elevation of a portion of the bridge, partly in section, showing the manner in which the central section engages the end section. Fig. 3 is a cross-sectional view of a portion of the bridge to show the manner in which the connecting-braces engage the same. Fig. 4 is an end view of the central section. Fig. 5 is a side view of a portion of one of the end pieces, showing means for securing the same to the track. Fig. 6 is a cross-sectional view of the same.

To put my invention into practice, I pro-50 vide for each rail of the track inclined end pieces  $\alpha$ , tapering toward their outer end and on their underneath face being chamfered to

conform to the shape of the rail b. On their upper face these end pieces are also chamfered, so as to form a tread c, conforming to the 55 tread of the rail. At their inner or larger end these end pieces are provided with a cutaway portion d and a recess e, said recess receiving the lug or tongue f, formed on the central section g, the end of which fits in 60 the cut-away portion d and holds the same in alinement with the two end pieces a. This central section g is provided with a standard or support g' and is recessed or cut away on its under side, so as to provide spaces h, 65 through which the lines of hose may pass across the track, said section of course being chamfered on its upper face, so as to form a tread to conform to the tread of the end pieces. The tongue f is securely locked within its re- 70 cess by means of a large set screw or bolt k, engaging through the end pieces a and into the said tongue and provided with an aperture k', through which any suitable instrument may be inserted for turning the bolt in 75 order to engage the same firmly in the tongue. The end pieces  $\alpha$  carry on their outer face slotted bars l for the purpose of fastening the bridge to the rail, which is accomplished by means of wedges m, adapted to be driven 80 between the paving-blocks and inserted between the slotted bar l and the end piece a, where they are tightened by means of a bolt n, operating through the slotted bar l to force the cross-bar o firmly against the wedges, said 85 bolt being held in position by means of a nut p, traveling in a groove or track provided therefor on the inner face of the slotted bar l, and when the bar o has been forced firmly against the wedges by means of the bolt n 90 this bolt is locked in its position by means of a nut q thereon operating against a washer q' and provided with an operating-handle r, said bolt being provided with an eyelet s in its head, through which a suitable instrument 95 may be inserted for tightening the same.

The bridge of each rail is connected by means of V-shaped braces a', having pins a<sup>2</sup>, which engage the inner face of the inclined ends a, said braces having rods a<sup>3</sup> connected 100 thereto, the said rods from each bridge being connected to a central turnbuckle a<sup>4</sup>, the rod of one bridge being of course provided with a left-hand thread and the rod of the opposite

bridge being provided with a right-hand thread and the buckle being correspondingly threaded, so that when the same is turned it will serve to draw the rods perfectly taut.

By this arrangement and construction it will be observed that my improved bridge may be applied to the tracks in case of fire in an exceedingly short space of time, and the same may of course be made so as to accom-

10 modate any number of lines of hose.

I also desire to call attention to the fact that by constructing the end pieces in the manner shown and fitting central sections into the same a gradual incline is provided 15 over which the cars may readily pass without injury to the hose. The fastening means shown on the outside of the inclined ends awill not be necessary in the ordinary placing of the bridge, as the connecting-braces from 20 the bridge of one rail to the bridge of the opposite rail will be found sufficient to hold the bridges in position under ordinary circumstances. This fastening means is merely provided in case it is necessary to lay the bridge 25 upon a worn rail where the same would not fit neatly. It will also be observed that this construction of bridge may be readily placed upon crossovers, and may also be so constructed as to conform to any curve of track 30 by forming the end piece slightly curved instead of straight, as is shown in the drawings.

It will be noted that various changes may be made in the details of construction without departing from the general spirit of my

35 invention.

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

1. In a hose-bridge, the inclined end pieces provided with cut-away portions, a central section provided with openings on its lower face to receive the hose, said central section

engaging in the cut-away portions formed in the inclined end pieces, a tongue engaging in a recess formed in said end pieces said end 45 pieces and central section provided with a track throughout their length, braces engaging the end sections, and adjusting-rods connected to said braces to support the bridges on each rail, longitudinal slotted bars secured 50 to the end pieces and provided with downwardly-projecting wedges, whereby said hosebridge is secured to the track, said slotted bars permitting the longitudinal adjustment of the wedges, substantially as shown and described.

2. In a hose-bridge the inclined end pieces chamfered on the lower edge to conform to the shape of the rail, and provided on its inner end with a cut-away portion and having 60 a recess formed therein, a central section provided on its underneath side with cut-away portions to receive the hose, the ends of said central section are provided with a cut-away portion adapted to fit the cut-away portion of 65 the inclined ends, a tongue formed on the end of the central section, adapted to engage the recess in the end pieces, said end pieces and central section provided with a track throughout their length, braces engaging the 70 end sections, and adjusting-rods connected to said braces to support the bridge on each rail, longitudinal slotted bars secured to the end pieces and provided with downwardlyprojecting wedges, whereby said hose-bridge 75 is secured to the track, said slotted bars permitting the longitudinal adjustment of the wedges, substantially as shown and described.

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

WILLIAM H. WOLF.

Witnesses:

H. C. EVERT, W. H. TIMMERMANN.