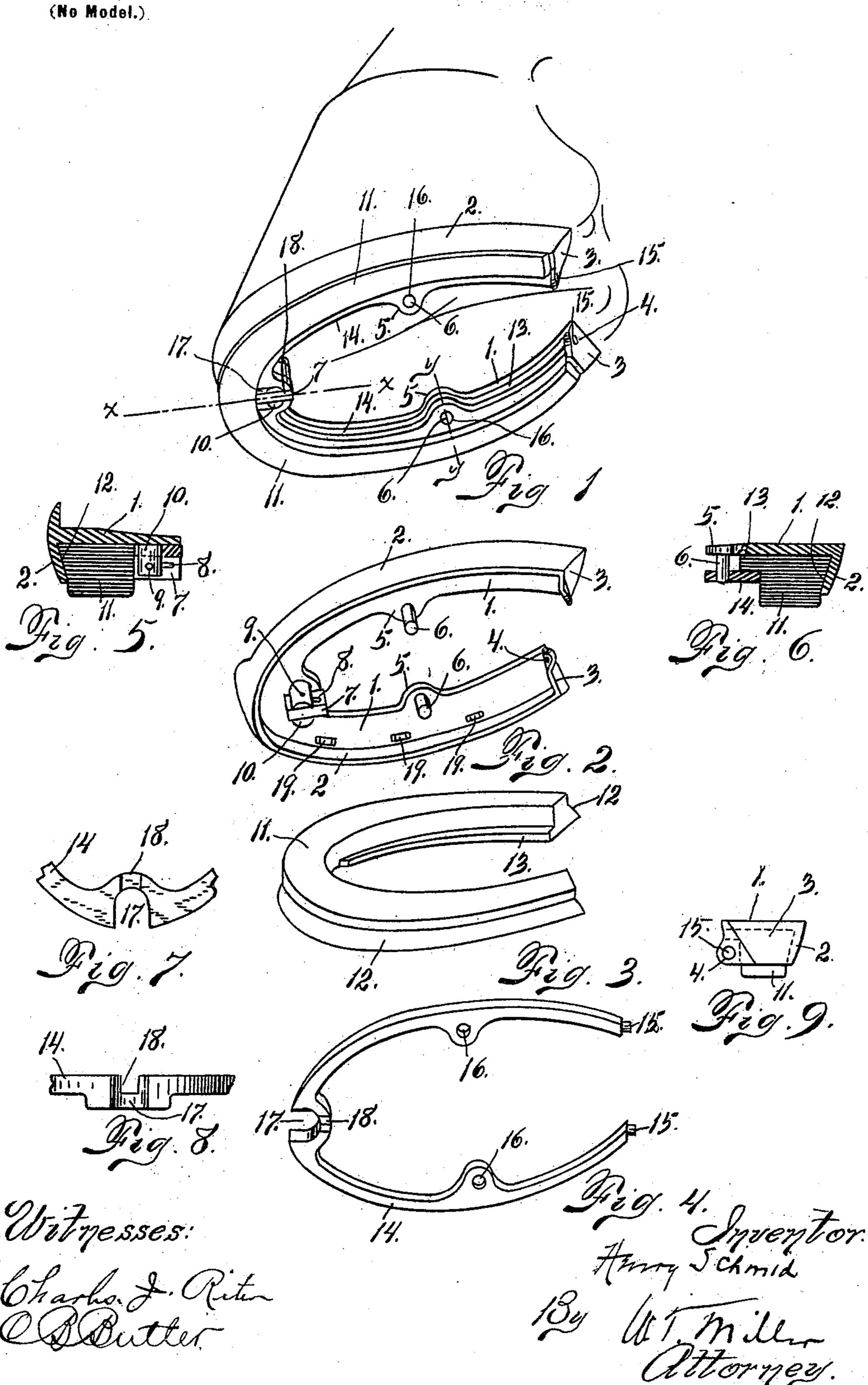
## H. SCHMID.

## ELASTIC TREAD HORSESHOE.

(Application filed June 20, 1898.)



## United States Patent Office.

HENRY SCHMID, OF BUFFALO, NEW YORK.

## ELASTIC-TREAD HORSESHOE.

SPECIFICATION forming part of Letters Patent No. 620,253, dated February 28, 1899.

Application filed June 20, 1898. Serial No. 684,026. (No model.)

To all whom it may concern:

Be it known that I, HENRY SCHMID, a citizen of the United States, residing at Buffalo, in the county of Erie and State of New York, 5 have invented certain new and useful Improvements in Horseshoes; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which to it appertains to make and use the same, reference being had to the accompanying drawings, and to figures of reference marked thereon, which form a part of this specification.

My invention relates to that class of horseshoes which are provided with elastic treads, its object being to provide a shoe adapted for the removable reception of an elastic cushion which is held in place by a locking-piece 20 secured to the shoe proper without the aid of screws.

To that end my invention consists of the shoe proper having a curved securing-plate, an inclined wall surrounding the outer edges 25 of the securing-plate, a sliding bolt attached to the inner side of the toe portion of the securing-plate, depending pins centrally placed upon the sides of the securing-plate and sockets in the heel portions of the securing-plate, 30 an elastic cushion or tread with outer inclined wall and inner retaining-flange, and a curved locking-piece adapted to rest against the inner retaining-flange of the tread and provided at its toe portion with a groove for the locking reception of the sliding bolt on the shoe proper, side sockets for the reception of the depending pins of the shoe proper, and end lugs for engagement with the sockets in the heel portions of the shoe proper.

I will now describe in detail the manner in which I have carried out my invention and then claim what I believe to be novel.

In the drawings, Figure 1 is an under side perspective view of my improved shoe shown attached to the horse's hoof. Figs. 2, 3, and 4 are respectively detached perspective views of the shoe proper, the elastic tread, and the locking-piece. Fig. 5 is a section of Fig. 1, taken in the line x x. Fig. 6 is a section of 50 Fig. 1, taken in the line y y. Fig. 7 is an under side view of the toe portion of the lockand Fig. 9 is a rear elevation of one of the heel portions of the complete shoe.

Referring to the drawings, the shoe proper 55 is shown as composed of the curved securingplate 1, its outer edge being surrounded by the inclined wall 2, having rear portions 3 3, extending across the rear ends of the plate. In these rear portions 3 3 are the sockets 4 4. 60 (See Fig. 9.) Centrally placed upon the inner extensions 55 are the depending pins 66, and upon the inner side of the toe portion of plate 1 is the bolt 7, which has the longitudinal slot 8, adapted for the sliding reception 65 of the pin 9, which extends across the bifurcated post 10, in which the bolt 7 slides back and forth.

11 is the rubber cushion or tread, curved like the shoe proper and provided with the 70 outer inclined wall 12 and inner retainingflange 13.

14 is the curved locking-piece, having the end lugs 15 15, adapted for engagement with the sockets 44 of the shoe proper, and the cen-75 trally-located sockets 1616, adapted for the reception of the depending pins 6 6 of the shoe proper.

17 is a socket upon the outer face of the toe portion of the locking-piece 14, in which 80 the post 10 rests, as clearly shown in Fig. 1, and 18 is a groove adapted for the locking reception of the sliding bolt 7.

The parts just described are adjusted in position as follows: The securing-plate 1 is 85 attached to the hoof by the usual nails passing through the holes 19. The tread 11 is next adjusted in position, its inclined wall 12 resting against the inner surface of the inclined wall 2 of the shoe proper, as clearly 90 shown in Figs. 5 and 6. The lugs 15 15 of the locking-piece 14 are next inserted in the sockets 4 4 in the ends of the shoe proper, and the depending pins 6 6 are permitted to enter the sockets 16 16 of the locking-piece 95 14. The socket 17 surrounds the post 10 as the locking-piece 14 is pushed into position; but before this can be accomplished the sliding bolt 7 must be pushed inwardly against the yielding tread 11, when on releasing the 100 pressure against the sliding bolt 7 the elasticity of the tread 11 will force the sliding bolt into engagement with the groove 18 in the ing-piece. Fig. 8 is an end view of Fig. 7, | locking-piece, which is thereby securely held

against accidental displacement, and the locking-piece 14, which rests against the under surface of the flange 13 of the tread, holds it in operative position, as clearly shown in Fig. 1.

To release the locking-piece 14 when it is desired to remove the tread 11, it is only necessary to press the bolt inwardly until it is clear of the groove 18, when the locking-piece

10 can be disengaged.

It will be seen that with my improved construction I dispense entirely with the use of screws, which, as has been found in practice, are liable to work loose and drop out.

The depending pins 6 6 serve to assist in holding the locking-piece in position, as well as to prevent rattling; but they have an additional and valuable function in this that often it is found necessary to spread or contract the shoe proper to accurately fit the hoof. By means of these pins 6 6 and their sockets 16 16 in the locking-piece both the shoe proper and the locking-piece can be uniformly spread or contracted by keeping them in engagement during the operation. This is an advantage not possessed by the same type of shoe now in use.

I claim—

1. An elastic-tread horseshoe consisting of the shoe proper having a curved securing-plate provided with an inclined wall surrounding its outer edges and a sliding bolt attached to the inner side of its toe portion, an elastic cushion or tread with outer inclined wall and inner retaining-flange, a curved locking-piece adapted to rest against the inner retaining-flange of the tread and provided at its toe portion with a groove for the locking reception of the sliding bolt on the shoe proper, and means for removably securing the ends of the locking-piece to the heel portions of the shoe proper.

2. An elastic-tread horseshoe consisting of the shoe proper having a curved securingplate provided with an inclined wall surround- 45 ing its outer edges, a sliding bolt attached to the inner side of its toe portion, and depending pins centrally placed upon the sides of the securing-plate, an elastic cushion or tread with outer inclined wall and inner retaining- 50 flange, a curved locking-piece adapted to rest against the inner retaining-flange of the tread and provided at its toe portion with a groove for the locking reception of the sliding bolt on the shoe proper and side sockets for the 55 reception of the depending pins of the shoe proper, and means for removably securing the ends of the locking-piece to the heel portions of the shoe proper.

3. An elastic-tread horseshoe consisting of 60 the shoe proper having a curved securingplate provided with an inclined wall surrounding its outer edges, a sliding bolt attached to the inner side of its toe portion, depending pins centrally placed upon its sides, and sock- 65 ets in its heel portions, an elastic cushion or tread with outer inclined wall and inner retaining-flange, and a curved locking-piece adapted to rest against the inner retainingflange of the tread and provided at its toe 70 portion with a groove for the locking reception of the sliding bolt on the shoe proper, side sockets for the reception of the depending pins of the shoe proper, and end lugs for engagement with the sockets in the heel por- 75

tions of the shoe proper.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

HENRY SCHMID.

Witnesses:

CHARLES J. RITER, W. T. MILLER.