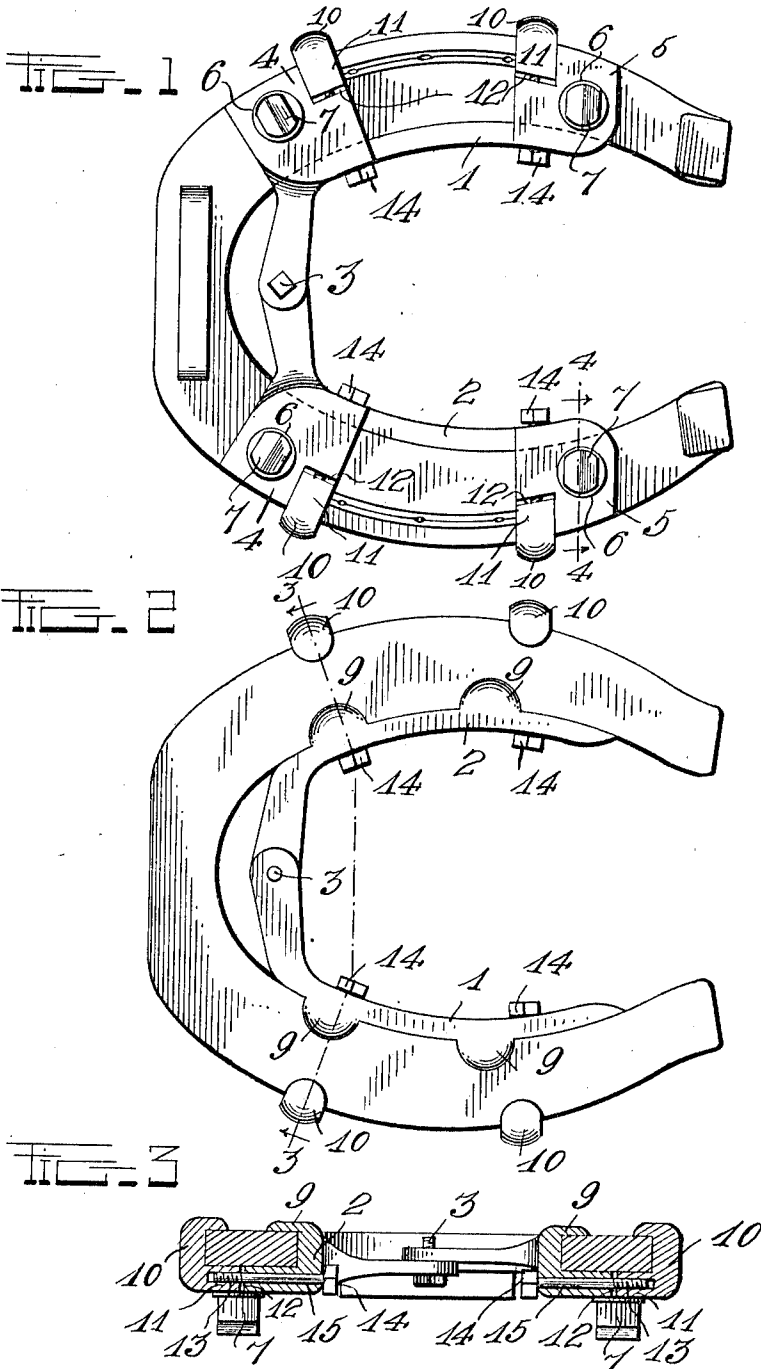


L. P. N. SMITH.
 ANTISLIPPING ATTACHMENT FOR HORSESHOES.
 APPLICATION FILED APR. 10, 1911.

1,001,318.

Patented Aug. 22, 1911.



Witnesses

C. R. Hardy
 O. B. Hopkins

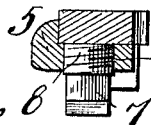


Fig. 4

by

L. P. N. Smith
 A. B. Wilson & Co.

Attorneys

UNITED STATES PATENT OFFICE.

LUKE P. N. SMITH, OF PORTSMOUTH, OHIO.

ANTISLIPPING ATTACHMENT FOR HORSESHOES.

1,001,318.

Specification of Letters Patent. Patented Aug. 22, 1911.

Application filed April 10, 1911. Serial No. 620,194.

To all whom it may concern:

Be it known that I, LUKE P. N. SMITH, a citizen of the United States, residing at Portsmouth, in the county of Scioto and State of Ohio, have invented certain new and useful Improvements in Antislipping Attachments for Horseshoes; and I do 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 it appertains to make and use the same.

This invention relates to anti-slipping attachments for horse shoes.

One object of the invention is to provide an attachment of this character which may be quickly and easily applied and securely fastened to shoes of different sizes.

Another object is to provide an anti-slipping attachment for shoes which will be simple, strong, durable and inexpensive in construction, efficient and reliable in operation and provided with calks which may be removed and sharpened or replaced by other calks when worn.

With these and other objects in view, the invention consists of certain novel features of construction, combination and arrangement of parts as will be more fully described and particularly pointed out in the appended claims.

In the accompanying drawings: Figure 1 is a bottom plan view of a shoe showing the application of my invention; Fig. 2 is a top plan view of the same; Fig. 3 is a vertical cross section on the line 3—3 of Fig. 2 looking toward the front end of the shoe; Fig. 4 is a detail cross sectional view on the line 4—4 of Fig. 1.

My improved anti-slipping attachment comprises two segmental attaching bars 1 and 2 having on their forward ends inwardly extending pivot lugs which are pivotally connected together by a pivot bolt 3. On the lower edges of the forward ends of the bars 1 and 2 are formed calk holding plates 4 which project outwardly from the bars 1 and engage the lower sides of the shoe near the forward end of the same as shown. On the rear ends of the bars are formed laterally projecting calk holding plates 5 which correspond to the plates 4 and engage the lower side of the shoe as shown. In the plates 4 and 5 are formed threaded sockets 6 into which are adapted to be screwed antislipping calks 7, said calks having rectangu-

lar sharpened outer ends adapted to engage the ground and being provided with threaded shanks 8 adapted to be screwed into the threaded sockets 6 as shown in Fig. 4 of the drawings. 60

On the upper edges of the bars 1 are formed shoe engaging lugs 9 which are adapted to fit over and engage the upper side of the shoe and which in connection with the plates 4 hold the attachment on the shoe. 65

In order to firmly secure the attachment to the shoe I provide a plurality of clamping devices each of which comprises a hook shaped lug 10 adapted to be engaged with or hooked over the outer edge of the shoe, said lugs having on their inner ends rectangular body portions 11 adapted to fit into rectangular recesses 12 formed in the plates 4 and 5 as shown. In the body portion 11 of the lugs are formed threaded sockets 13 into which are adapted to be screwed the threaded outer ends of clamping bolts 14 which are engaged with passages 15 formed through the plates 4 and 5 whereby when said bolts are screwed up the lugs 10 will be drawn into tight engagement with the outer edges of the shoe and the bars 1 and 2 thus drawn into tight engagement with the inner edges of the shoe. By thus drawing the lugs 10 and bars 1 and 2 into engagement with the opposite edges of the shoe the attachment is securely clamped into operative engagement with the latter. 90

When it is desired to remove the attachment from the shoe the bolts 14 are unscrewed from the lugs 10, thus permitting the latter to be removed after which the bars 1 and 2 may be swung inwardly thus disengaging the lugs 9 from the upper sides of the shoe whereupon the attachment may be removed. By providing the calks with threaded shanks and the lug holding plates with threaded sockets to receive said shanks the calks may be readily removed when dulled or worn out and sharpened and replaced or new calks substituted thus permitting the shoe engaging portions of the attachment to be continuously used. 105

By means of the clamping lugs 10 and the clamping bolts 14 the attachment may be employed in connection with shoes of different width and sizes.

From the foregoing description taken in 110

connection with the accompanying drawings the construction and operation of the invention will be readily understood without requiring a more extended explanation.

5 Various changes in the form proportion and the minor details of construction may be resorted to without departing from the principle or sacrificing any of the advantages of the invention as defined in the ap-
10 pended claims.

Having thus described my invention, what I claim is:

1. An anti-slipping attachment for horse shoes comprising a pair of attaching bars
15 pivotally connected together at their forward ends and adapted to be engaged with the inner edge of a horse shoe, calk holding plates formed on the lower edges of said bars and adapted to engage the lower side
20 of a shoe, said plates having formed therein threaded sockets, anti-slipping calks having threaded shanks, adapted to be screwed into said sockets, shoe engaging lugs formed on the upper edges of said bars and adapted
25 to engage the upper side of the shoe, clamping lugs adapted to be engaged with the outer edges of the shoe, means to draw said lugs toward the attaching and calk-holding plates and into operative engagement with
30 the shoe and thereby secure the attachment to the shoe.

2. An anti-slipping attachment for horse shoes comprising a pair of attaching plates

having on their forward ends inwardly ex- 35
tending pivot lugs, a pivot bolt arranged through said lugs to pivotally connect said bars together, shoe engaging plates formed on the lower edges of said bars and adapt-
ed to be engaged with the lower sides of the shoe, said plates having formed in their 40
outer edges a rectangular notch, calks detachably engaged with said plates, shoe engaging lugs formed on the upper edges of said bars and adapted to engage the upper
sides of the shoe, hook shaped clamping 45
lugs adapted to be engaged with the outer edges of the shoe, said lugs having on their lower ends rectangular body portions adapted to engage the rectangular notches in
said shoe engaging plates and having formed 50
therein threaded sockets, clamping bolts loosely engaged with said plates and adapted to be screwed into engagement with the threaded sockets of said clamping lugs
whereby the latter are drawn into operative 55
engagement with the edges of the shoe thereby fastening the attachment in operative engagement with the shoe.

In testimony whereof I have hereunto set my hand in presence of two subscribing wit- 60
nesses.

LUKE P. N. SMITH.

Witnesses:

HARRY W. MILLER,
CLINTON M. SCOOB.