

(No Model.)

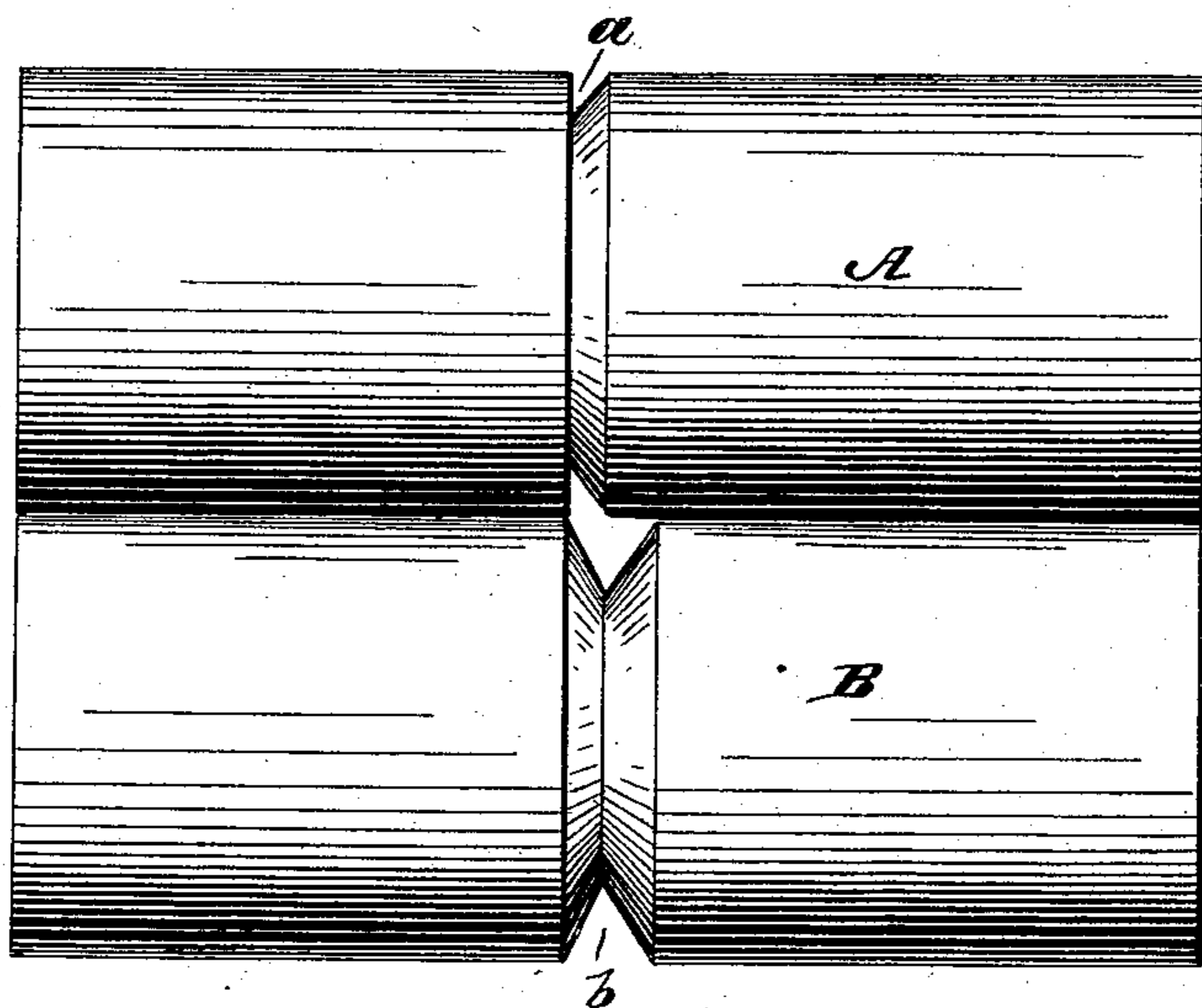
J. W. FOULKS.

ROLLS FOR FORMING TOE CALK BARS.

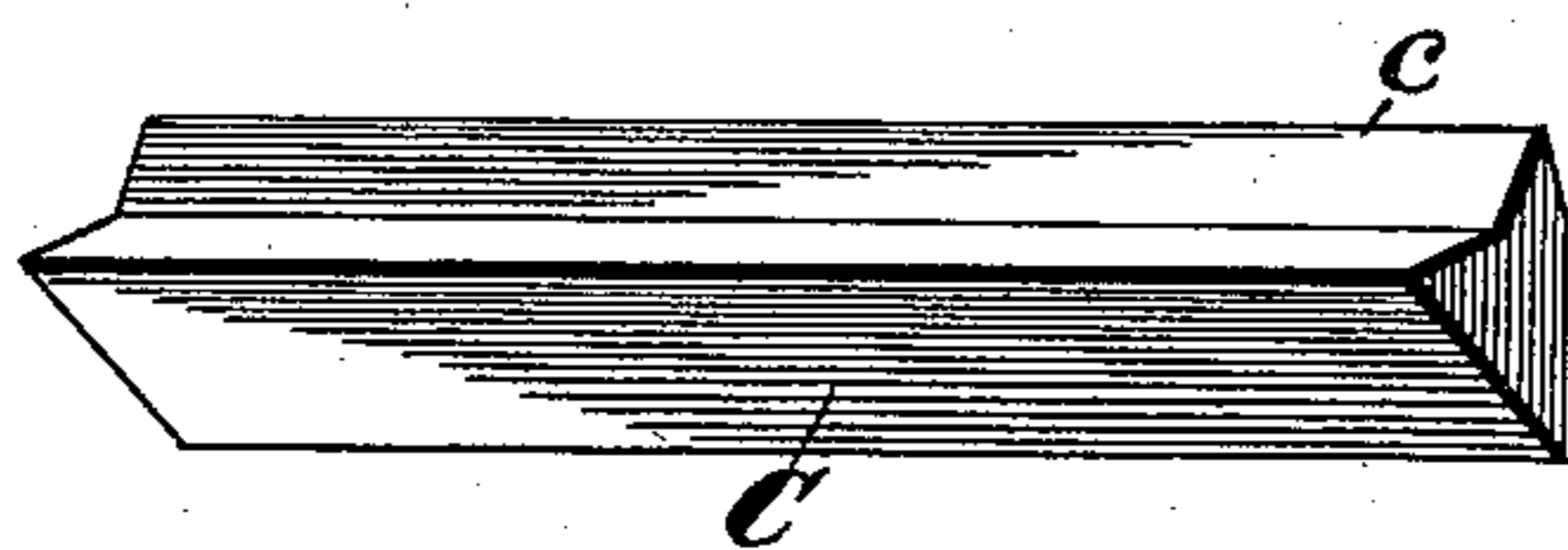
No. 333,003.

Patented Dec. 22, 1885.

*Fig. 1.*



*Fig. 2.*



*Witnesses.*

*Robert Everett,*

*A. R. Brown,*

*Inventor.*

*John W. Foulks.*

*By James L. Norris.*

*Atty.*

# UNITED STATES PATENT OFFICE.

JOHN W. FOULKS, OF BROOKLYN, NEW YORK.

## ROLLS FOR FORMING TOE-CALK BARS.

SPECIFICATION forming part of Letters Patent No. 333,003, dated December 22, 1885.

Application filed October 10, 1885. Serial No. 179,534. (No model.)

*To all whom it may concern:*

Be it known that I, JOHN W. FOULKS, a citizen of the United States, residing at Brooklyn, in the county of Kings and State of New York, having invented new and useful Improvements in Rolls for Forming Toe Calk Bars, of which the following is a specification.

This invention relates to the rolling of metal bars in the manufacture of horseshoe toe-calks, and for other purposes.

In the annexed drawings, illustrating my invention, Figure 1 is a side elevation of a pair of rolls adapted to form a bar of steel or iron with a beveled flange or rib on one edge. Fig. 2 is a perspective view of a metal bar after it has been formed into the required shape by said rolls.

The rolls A B are so constructed and arranged as to impart to a bar of metal the shape shown in Fig. 2, both rolls being grooved circumferentially to receive and shape the bar. One of these rolls, as A, is provided with a groove, *a*, having one side vertical, or at a right angle to the horizontal axis of said roll, the other side of the groove *a* being inclined or beveled. The roll B is provided with a V-shaped groove, *b*, of about twice the width of the groove *a* in the accompanying roll. When the rolls A and B are placed together, one edge of the groove *b* coincides with the edge of the vertical side of the groove *a*, and the edge of the inclined side of said groove *a* is

opposite the apex or trough of the V-shaped groove. It will therefore be seen that a bar of metal subjected to the rolling action of said grooved rolls A B will receive the form shown in Fig. 2, in which C represents a rolled box having oppositely-inclined sides, with a bilaterally-inclined flange or rib, *c*, formed along one edge. The bar C thus formed may be cut to suitable lengths for horseshoe toe-calks or other purposes, and in making a calk the usual spur can be formed at one end by cutting away the greater part of the inclined flange or rib *c*, so as to leave a spur of the desired shape. This is preferably effected by means of a suitable punch and cutting-die adapted to cut away the bulk of the flange *c* and form the spur from the end portion of said flange.

What I claim as my invention is—

The combination, with the roll A, having a circumferential groove provided with one inclined side and one side at a right angle to the axis of said roll, of the roll B, having a circumferential V-shaped groove, substantially as described.

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

JOHN W. FOULKS.

Witnesses:

A. C. JACKSON,  
H. W. COBORN.