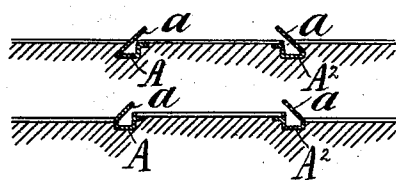
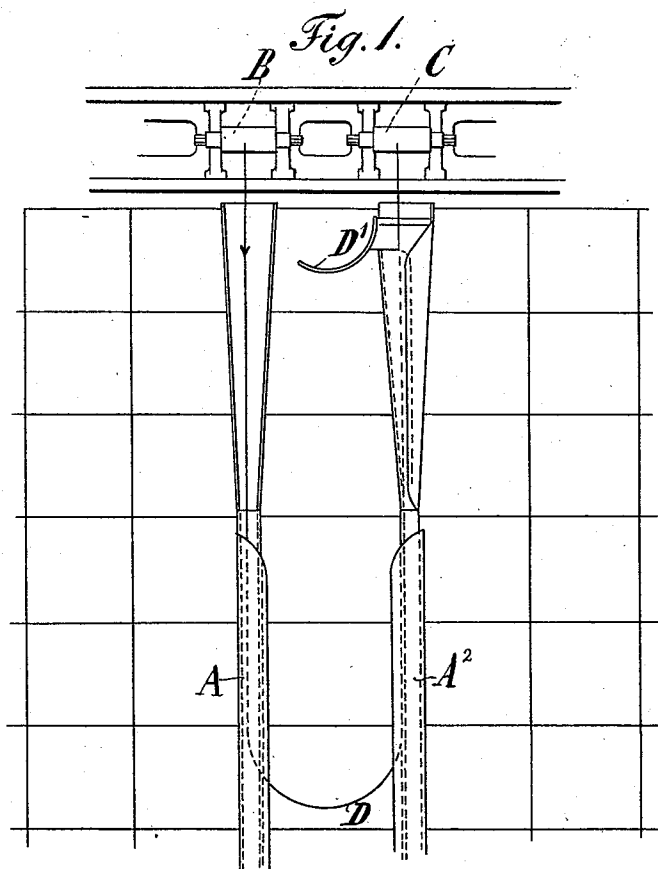


(No Model.)

P. SCHRADER.  
WIRE ROLLING APPARATUS.

No. 529,201.

Patented Nov. 13, 1894.



*Fig. 2.*

*Fig. 3.*

*Witnesses*  
*George Baumann*  
*Th. Keller*

*Inventor*  
*Paul Schrader*  
*By his Attorneys*  
*Hansen & Hansen*

# UNITED STATES PATENT OFFICE.

PAUL SCHRADER, OF WITTEN, GERMANY.

## WIRE-ROLLING APPARATUS.

SPECIFICATION forming part of Letters Patent No. 529,201, dated November 13, 1894.

Application filed January 15, 1894. Serial No. 496,942. (No model.)

### *To all whom it may concern:*

Be it known that I, PAUL SCHRADER, engineer, a subject of the German Emperor, and a resident of Ruhrstrasse 79, Witten-on-the-Ruhr, Germany, have invented Improvements in or Connected with Wire-Rolling Apparatus, of which the following is a specification.

My invention relates to the wire guides of wire-rolling apparatus.

The guides for wire as at present in use in wire rolling apparatus have their sides at a right angle to the bottom and serve merely to govern the direction of travel of the wire, but do not prevent the possibility of the wire flying back out of the guide and the rear end of the length of wire being consequently broken off.

According to my invention instead of forming the outer side or wall of the guide vertical I incline it inward so that the rear end of the length of wire to be rolled is caused to pass downward into the guide by striking against the said inclined side or wall.

In the accompanying drawings, Figure 1 is a plan of two pairs of rolls and their guides; and Figs. 2 and 3 are sections illustrating two forms of the guides.

The workman, who stands in front of the guard-plate D', receives the end of the wire as it issues from the pair of rolls B, throws it into a loop behind the guard plate, and passes it between the rolls C. The wire runs from the pair of rolls B through the guide A belonging to them and forming a semi-circle D runs back through the guide A<sup>2</sup> of the pair of rolls C into the latter, as indicated by the arrows.

The guides A A<sup>2</sup> which are straight and

situated practically at right angles to the axis of the rolls are distinguished by the fact that the outer sides *a* of the same are not vertical but are inclined inward, as shown in Fig. 2 or only partially so inclined as shown in Fig. 3. The effect of this is that the rear end of the loop D of wire which passes out of the rolls B into the rolls C and which strikes against the inclined outer side *a* is directed downward into the channel and guided straight, there being thus no possibility of loops forming in consequence of the wire flying back, the result of the formation of which loops is that the rear end of the wire becomes broken off in front of the rolls C.

Instead of two guides being used as shown in the drawings, one alone can be employed if required.

Having now particularly described and ascertained the nature of my said invention and in what manner the same is to be performed, I declare that what I claim is—

A guide for use in connection with wire rolling apparatus, the said guide being straight and at right angles to the rolls, the outer side or wall of the guide being inclined inward, whereby the rear end of the wire to be rolled and which strikes against this side or wall is forced down into the guide, substantially as and for the purpose hereinbefore described.

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

PAUL SCHRADER.

Witnesses:

ALBERT KLINGHAMMER,  
CHRISTIAN SONNENSCHNEIN.