

No. 807,697.

PATENTED DEC. 19, 1905.

E. D. TOWNSEND.
WIRE STRETCHER.

APPLICATION FILED JUNE 14, 1905.

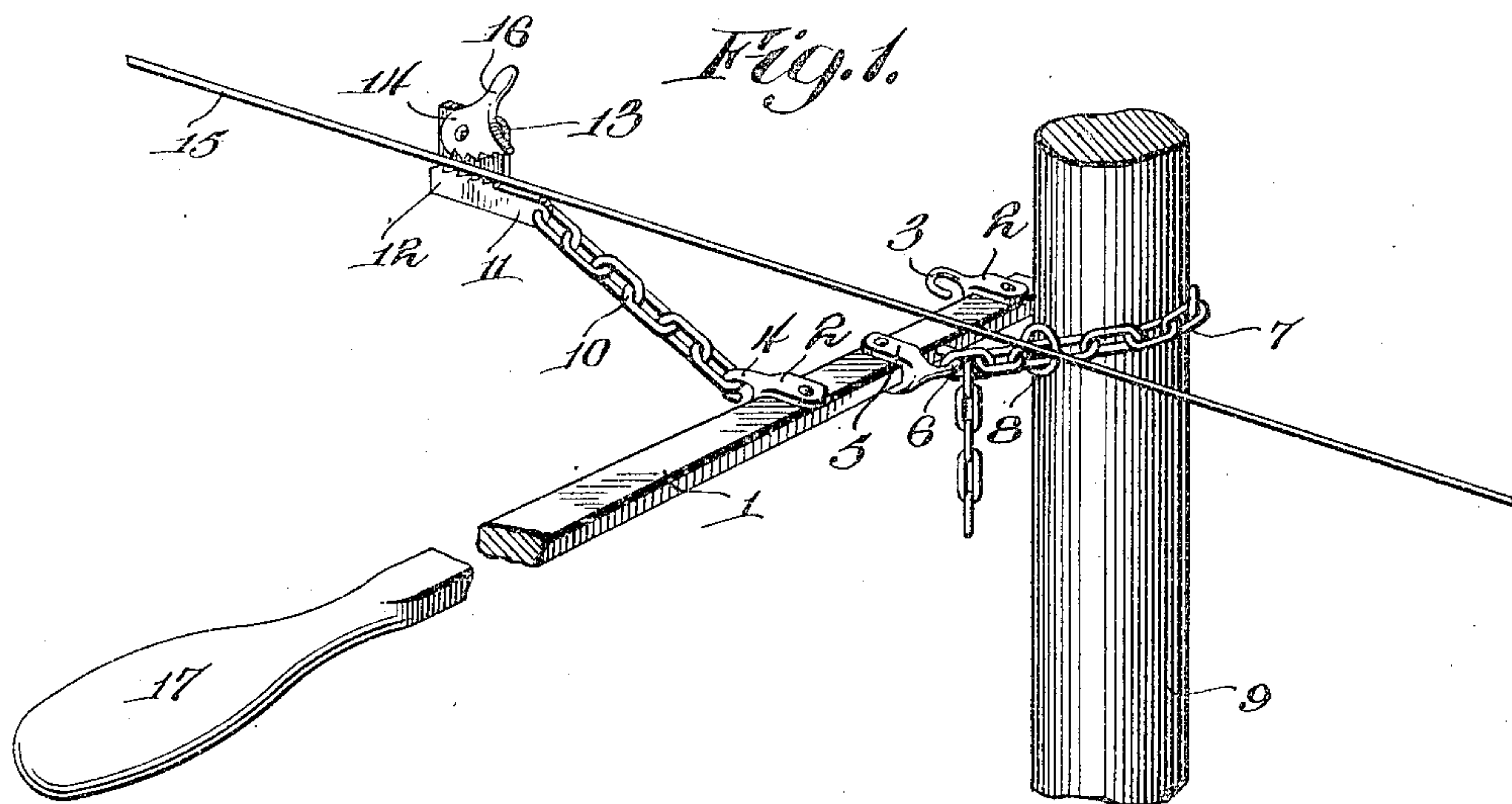


Fig. 2.

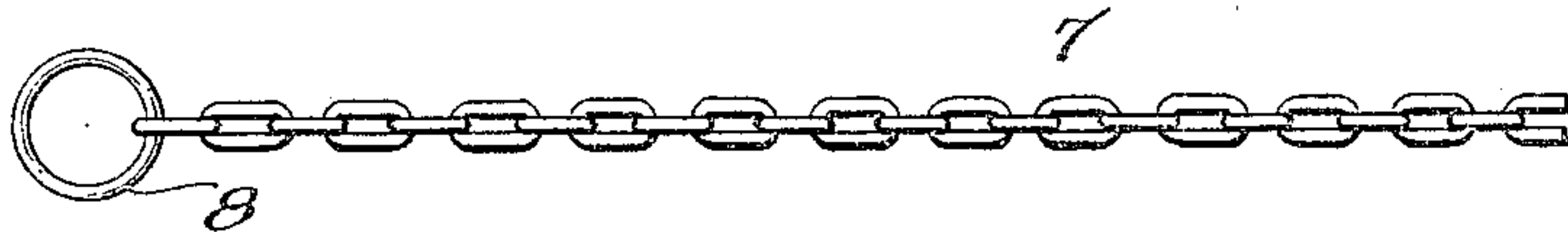


Fig. 4.

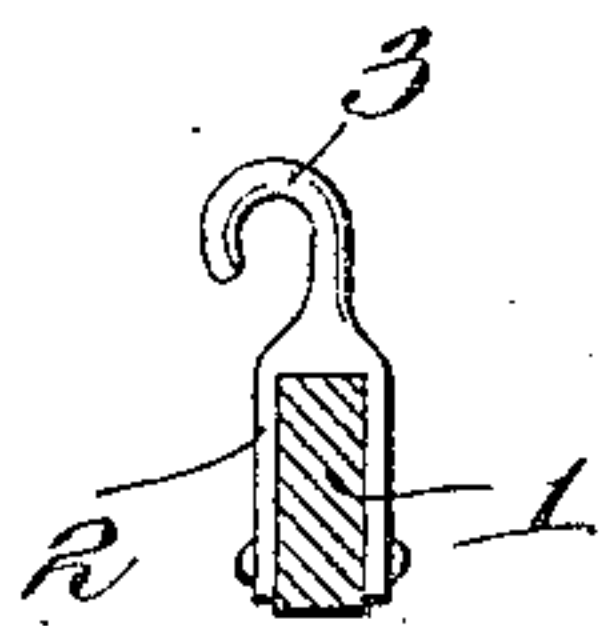
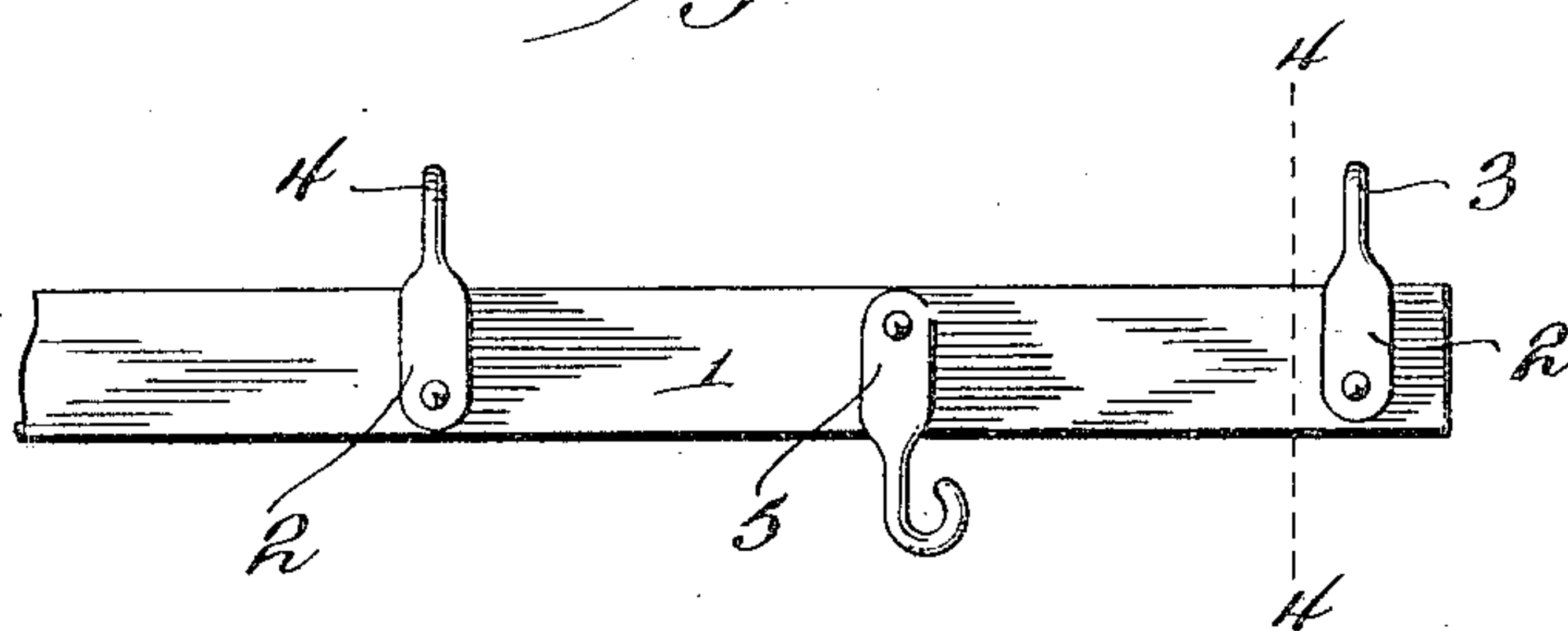


Fig. 3.



Witnesses

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UNITED STATES PATENT OFFICE.

ERVIN D. TOWNSEND, OF TURTLEPOINT, PENNSYLVANIA, ASSIGNOR
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WIRE-STRETCHER.

No. 807,697.

Specification of Letters Patent.

Patented Dec. 19, 1905.

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To all whom it may concern:

Be it known that I, ERVIN D. TOWNSEND, a citizen of the United States, residing at Turtlepoint, in the county of McKean and State of Pennsylvania, have invented certain new and useful Improvements in Wire-Stretchers; 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 it appertains to make and use the same.

My invention relates to wire-stretchers; and its object is to provide a simple, durable, and inexpensive device of this character which may be readily manipulated and which is formed of few parts.

The invention consists of a lever having means for securing it to a post of any contour and also provided with a wire-gripping device which is flexibly connected to the lever. Means are employed for holding the gripping device in any position to which it may be drawn, so as to enable the wire to be securely fastened to the post after the drawing operation.

The invention also consists of the further novel constructions and combinations of parts hereinafter more fully described, and pointed out in the claim.

In the accompanying drawings I have shown the preferred form of my invention.

In said drawings, Figure 1 is a perspective view showing the wire-stretcher mounted upon a post and connected to a wire. Fig. 2 is a detail view of the lever-holding device. Fig. 3 is an enlarged plan view of a portion of the lever and showing the hooks thereon; and Fig. 4 is a section on line 4 4, Fig. 3.

Referring to the figures by numerals of reference, 1 is a lever of any desired length having yokes 2 straddling one edge thereof and pivoted to the lever. One of these yokes is arranged near one end of the lever, while the other yoke is located some distance therefrom. Both of the yokes have hooks 3 and 4, respectively, which extend laterally from the lever. Another yoke 5 straddles the opposite edge of the lever and is pivoted thereto at a point between the yokes 2. Yoke 5 has a hook 6 extending from it, which is adapted to engage a link of a chain 7. This chain is preferably provided with a ring 8 at one end, so that the same can be secured to a post 9 by wrapping it therearound and inserting its

free end through the ring. One of the links which have been passed through said ring can then be placed in engagement with hook 6, thereby securing the lever to the post.

The chain 10 extends from the hook 4 and is secured to an arm 11, extending from a toothed plate 12, having a flange 13 at one side, which forms a support for a toothed cam 14, which is adapted to operate with plate 12 to grip a wire 15. A handle 16 extends from the cam, whereby said cam can be thrown into or out of engagement with the wire.

When it is desired to stretch a wire by means of this tool, the chain 7 is wrapped around a post 9 and inserted through its ring 8 and then placed in engagement with hook 6. Lever 1 is then swung forward until the end farthest removed from its handle 17 comes in contact with the post 9. Plate 12 is then pulled as far as possible from the lever and is clamped on the wire 15 by means of cam 14. Lever 1 is then swung laterally, the hook 6 forming a fulcrum therefor, and the gripping device constituted by plate 12 and cam 14 engages the wire and pulls it longitudinally. After the lever has been swung a predetermined distance the hook 3 arrives in position above the chain 10 and can be placed in engagement therewith, thereby locking the gripping device against return movement. The lever can then be released without danger of the wire returning to its original position, and said wire can then be fastened to the post in the ordinary manner.

By means of this tool wires can be quickly stretched and secured.

It will be understood that the device can be used upon either round or irregular posts, as the lever does not bear upon the post, but is fulcrumed at its point of connection with the chain extending around the post.

In the foregoing description I have shown the preferred form of my invention; but I do not limit myself thereto, as I am aware that modifications may be made therein without departing from the spirit or sacrificing the advantages thereof, and I therefore reserve the right to make such changes as fairly fall within the scope of my invention.

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

A wire-stretcher comprising a lever having a handle at one end and adapted to assume a

horizontal position during the stretching operation, a yoke straddling the lever and extending from one face thereof, said yoke having an integral hook disposed in the same
5 plane with the lever, flexible means detachably connected to said hook and adapted to extend around a support and to fasten the lever thereto, a wire-gripping device, yokes straddling the lever at opposite sides of the
10 first-mentioned yoke and immovably secured thereto, each yoke having an integral hook, said hooks being parallel and extending downwardly and disposed at right angles to the longitudinal center of the lever, a flexible con-
15 nection between the gripping device and one of the parallel hooks whereby said lever is caused to assume a position between the sup-

port and the gripping device prior to the stretching operation, said lever adapted to swing into alinement with a wire engaged by 20 the gripping device and cause the other one of the parallel hooks to automatically contact with, ride upon and engage the flexible connection immediately subsequent to the stretching operation to hold the lever and gripping 25 device against movement.

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

ERVIN D. TOWNSEND.

Witnesses:

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A. D. HELMER.