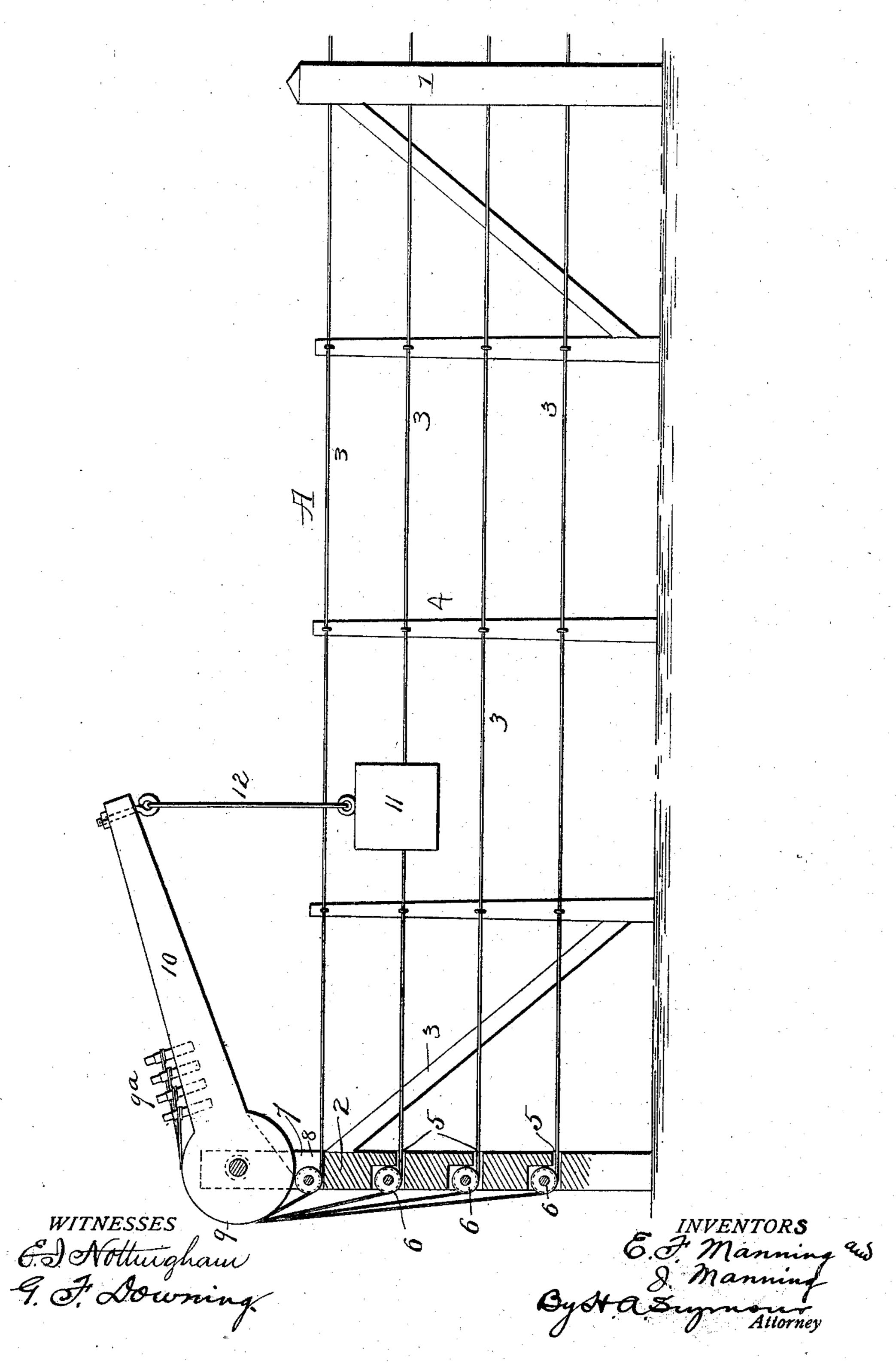
E. F. & J. MANNING.
WIRE STRETCHER.

No. 605,496.

Patented June 14, 1898.



UNITED STATES PATENT OFFICE.

EBENEZER F. MANNING AND JOHN MANNING, OF ELKHART, INDIANA; SAID JOHN MANNING ASSIGNOR TO SAID EBENEZER F. MANNING; SAID EBENEZER F. MANNING ASSIGNOR OF ONE-HALF TO R. C. ATKINSON, OF CASSOPOLIS, MICHIGAN.

WIRE-STRETCHER.

SPECIFICATION forming part of Letters Patent No. 605,496, dated June 14, 1898.

Application filed March 22, 1898. Serial No. 674,810. (No model.)

To all whom it may concern:

Be it known that we, EBENEZER F. ManNING and John Manning, residents of Elkhart, in the county of Elkhart and State of
Indiana, have invented certain new and useful Improvements in Wire-Stretchers; and
we 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.

This invention relates to an improvement in wire-stretchers, the object of the invention being to produce a wire-stretcher which acts automatically to stretch the wire properly at all seasons of the year and which shall combine simplicity, cheapness, durability, precision, and uniformity of action at all times and under all circumstances.

It has been heretofore proposed to retain wires taut by means of springs, which are liable to become so affected by exposure as to be rendered ineffectual, and it has also been proposed to retain wires taut by means of 25 ratchet devices and other means, which are liable to result to the detriment of the wire, as such devices do not afford proper compensation for expansion and contraction during changes of temperature, and hence the wire 30 is liable to sag when exposed to one temperature and break when exposed to another. Furthermore, wire-stretchers heretofore proposed for the purpose of maintaining the wire taut have been expensive both in construc-35 tion and in application.

It is the aim of our invention to overcome the defects and objections heretofore encountered in wire-stretchers and to produce a device having the qualities hereinbefore stated.

With the objects above stated in view the invention consists in certain novel features of construction and combinations and arrangements of parts, as hereinafter set forth, and pointed out in the claims.

The accompanying drawing illustrates an

embodiment of our invention.

While our invention is applicable for stretching wires regardless of the purpose for which said wires are used, we have for

convenience shown its application to a fence 50 and will describe its details in that connection.

A represents a section of wire fencing, comprising end posts 1 2, wires 3, and intermediate stays 4. The wires 3 are secured to the 55 end post 1 and after being connected with the intermediate stays or posts 4 are passed through holes 5 in the post 2. In each hole 5 a small pulley 6 is mounted to permit the wires to pass through without resistance. The 60 top of the post 2 is made with a slot or recess 7, whereby to form two arms 8, between which a drum 9 is mounted. The drum 9 is preferably made an integral part of a lever 10, which projects over the top of the fence, approxi- 65 mately parallel therewith, and is provided at its free end with a weight 11, which may be suspended therefrom by means of a suitable cord or wire 12. The drum 9 is adapted to receive all the wires of the fence, which are 70 partially wound thereon and secured thereto by means of keys 9a, mounted in the lever, so that in case a wire should break or the fence need to be opened for any cause the wires can be spliced and the keys on which 75 they are wound be turned, whereby to equalize the tension on the various wires.

From the construction and arrangement of parts above set forth it will be seen that the wires will always have a proper tension there- 8c on; that they will be permitted to expand without sagging and contract without breaking; that all the wires will be properly maintained taut by means of a single weighted lever and drum without intermediate connections; that springs and a multiplicity of parts are avoided, and that the improvements are effectual in all respects in the performance of their functions.

Should stock become entangled in the fence 90 or try to force themselves between two wires, and thus put a special strain on one wire, the lever would be raised and all the other wires would be slackened, so that their tension would in a sense be transferred to the wire 95 needing it.

Slight changes might be made in the details of construction of our invention without de-

parting from the spirit thereof or limiting its scope, and hence we do not wish to limit ourselves to the precise details herein set forth

Having fully described our invention, what 5 we claim as new, and desire to secure by Let-

ters Patent, is—

1. The combination with a support having a series of holes and a pulley mounted in each hole, of a series of wires passing through said ro holes and over said pulleys, a drum mounted in the end of said support and having all of said wires connected therewith and adapted to wind thereon, and a weighted lever projecting from said drum whereby to maintain 15 said wires taut during all changes of temperature to which they may be exposed, substantially as set forth.

2. In a fence, the combination with two end posts and wires secured to one of said posts 20 and passing loosely through the other, a drum

mounted in the top of said last-mentioned post and having all of said wires secured thereto and adapted to wind thereon, a lever projecting from said drum and over the fencing, and a weight attached to the free end of 25 said lever, substantially as set forth.

3. In a wire-stretcher, the combination with a post, of a drum supported thereby, a series of keys carried by said drum for the reception of the fence-wires, and a weighted 30 arm projecting from said drum, substantially as set forth.

In testimony whereof we have signed this specification in the presence of two subscribing witnesses.

EBENEZER F. MANNING. JOHN MANNING.

Witnesses:

GEORGE E. COMPTON, A. H. Ellwood.