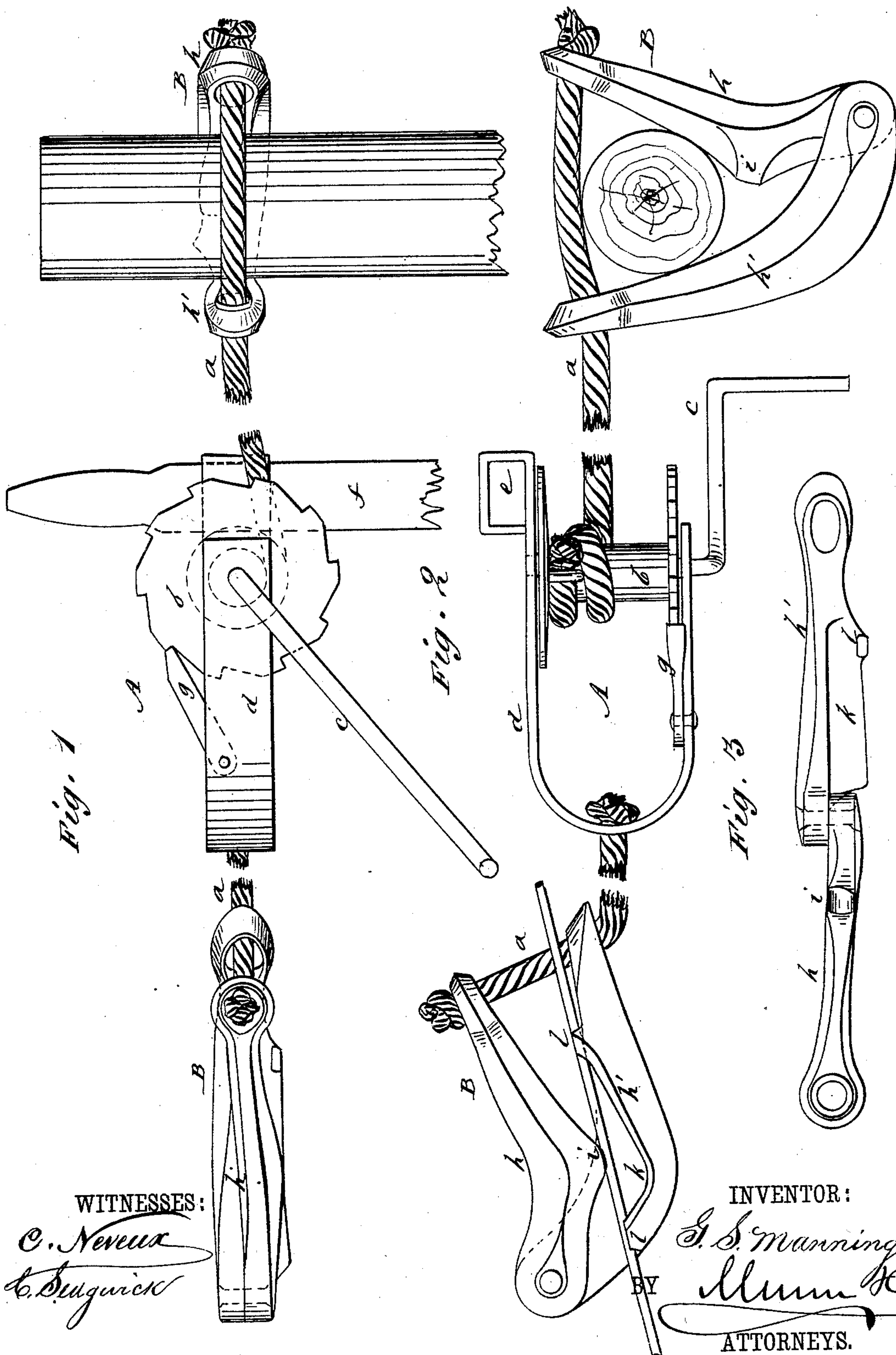


G. S. MANNING.
 Stretcher for Fence-Wire.

No. 223,367.

Patented Jan. 6, 1880.



WITNESSES:

C. Neveu
C. Duguid

INVENTOR:

G. S. Manning
 BY *Alum Ho*
 ATTORNEYS.

UNITED STATES PATENT OFFICE.

GILBERT S. MANNING, OF CHICAGO, ILLINOIS.

STRETCHER FOR FENCE-WIRES.

SPECIFICATION forming part of Letters Patent No. 223,367, dated January 6, 1880.

Application filed August 12, 1879.

To all whom it may concern:

Be it known that I, GILBERT SWEET MANNING, of Chicago, in the county of Cook and State of Illinois, have invented a new and improved Stretcher for Fence-Wires, of which the following is a specification.

My improvements relate to devices for stretching fence-wires wherein a windlass and clamps are made use of; and the object of my invention is to render the apparatus more durable and convenient for use.

The invention consists in a clamp of peculiar construction for grasping the ends of the wire. These features will be explained more particularly in connection with the accompanying drawings, wherein—

Figure 1 is a side elevation of the windlass and clamps in the position as applied to use. Fig. 2 is a top view of the same. Fig. 3 is a view of one of the clamps as opened.

Similar letters of reference indicate corresponding parts.

A is the windlass, to which the clamps B B are connected by cords or wires *a*, the apparatus being intended for drawing two ends together simultaneously, or for connection to the fence-post by one clamp, as shown, while the other clamp is connected to the wire.

The windlass A consists of the barrel *b*, having flanged rims provided with a crank handle, *c*, and fitted in the U-shaped frame *d*. The frame *d* is a wrought-iron bar bent to shape, and at one end the frame is bent outward and back to form a square socket, *e*, through which a stake is to be inserted, as at *f*, for sustaining the windlass.

Upon the inner side of frame *d* a pawl, *g*, is attached for meshing with ratchet-teeth formed on one flanged rim of barrel *b*, and thereby preventing back movement of the barrel.

The cords, wires, or chains *a*, by which the clamps are connected to the windlass, are attached one directly to the barrel *b* and the other to the closed end of frame *d*, the attachment being made in any desired manner.

The clamps B are alike, and the following description applies to either: *h* is the upper, and *h'* the lower, jaw. These are pivoted together at one end, and are each provided at their moving ends with an aperture for the cord or chain *a*, that is passed through the apertures and knotted at its end outside of *h* to

retain the cord. The lower jaw, *h'*, is slightly longer than *h*, and its aperture is made flaring or bell-mouthed to prevent chafing of the cord *a*. The clamping edge of the jaw *h* is formed with a projection, *i*, that is grooved on its face, as shown in Fig. 3, to prevent the wire from slipping, and the face of the jaw *h'* is formed with a recess, *k*, that corresponds in shape to and receives the projection *i* when the jaws close together, so that when the end of a wire is placed across the recess *k*, as shown in Fig. 2, and the jaw *h* closed, the wire will be bent and held securely, and the greater the strain the more will the wire be bent and more securely held. There are small projections *l* on the jaw *h'*, which prevent the wire from slipping sidewise.

In use, one clamp B, may be placed over the fence-post, as illustrated, and the other clamp connected to the fence-wire; then, by turning the windlass, the cords *a* will be drawn upon and the wire stretched.

The apparatus is also intended for drawing the ends of two wires together from opposite directions, in which case the other wire will be connected to the other clamp B, and the windlass operated in the same manner to draw the ends until they can be connected or attached to the post.

The stake *f* is used for sustaining the windlass before the slack is taken up. This stake should be as long as the fence is high, and in use the lower end rests on the ground and the upper end is held by the operator with one hand while the windlass is being wound with the other hand.

This construction furnishes a very durable and effective stretching apparatus.

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

The combination, in a fence-wire stretcher, of the U-frame *d*, having pawl *g*, the ropes *a*, the shaft *b*, having ratchet thereon, and the pivoted jaws *h h'*, the jaw *h* having projection *i*, and the grooved jaw *h'* having projections *k*, as shown and described.

GILBERT SWEET MANNING.

Witnesses:

JOHN N. MANNING,
JNO. H. WAYMAN,