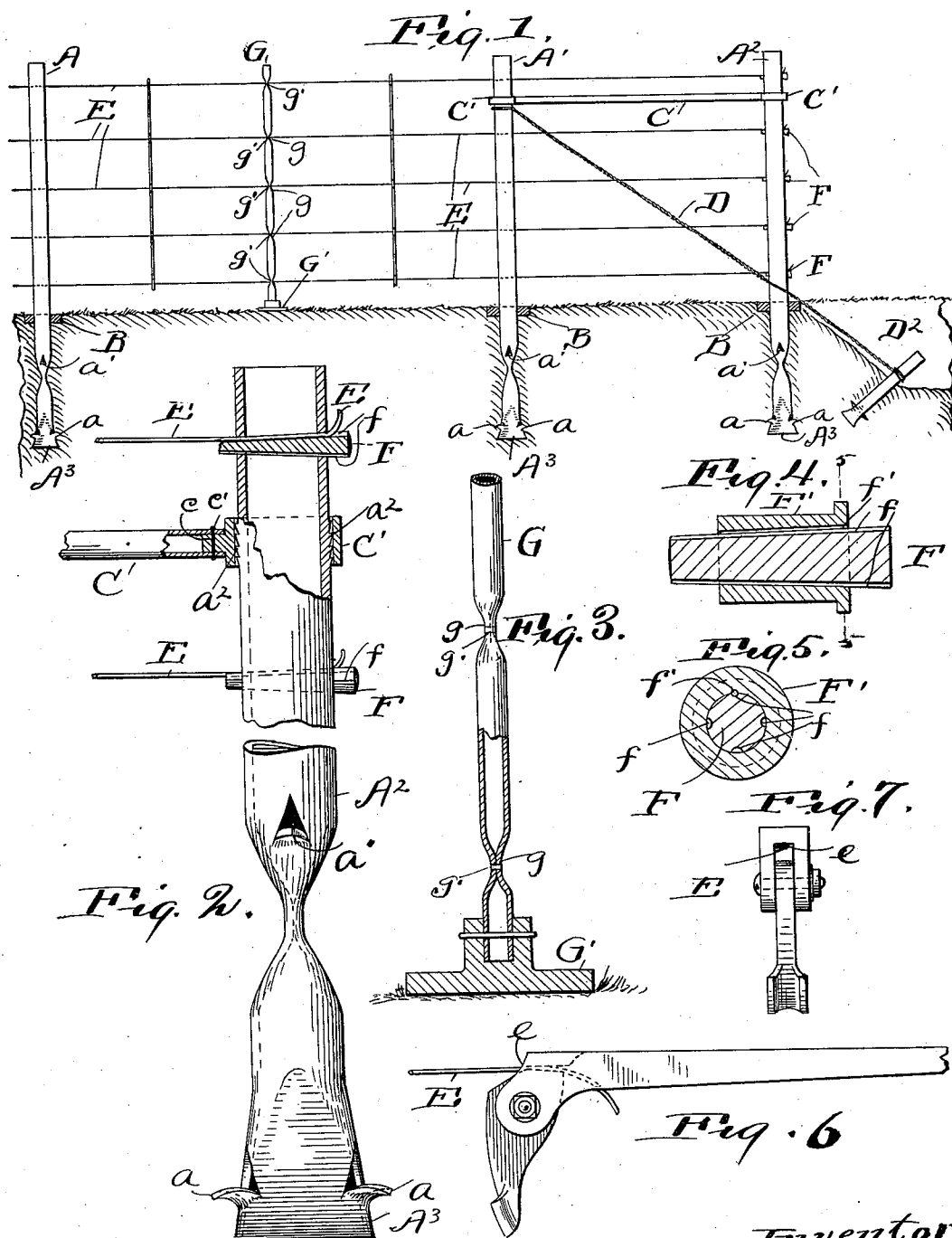


(No Model.)

S. C. DAVIS.
WIRE FENCE.

No. 579,918.

Patented Mar. 30, 1897.



Witnesses.
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UNITED STATES PATENT OFFICE.

SIMEON C. DAVIS, OF CLEVELAND, OHIO.

WIRE FENCE.

SPECIFICATION forming part of Letters Patent No. 579,918, dated March 30, 1897.

Application filed January 9, 1896. Serial No. 574,866. (No model.)

To all whom it may concern:

Be it known that I, SIMEON C. DAVIS, of Cleveland, Cuyahoga county, Ohio, have invented certain new and useful Improvements in Wire Fences; 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 pertains to make and use the same.

My invention relates to improvements in fences, and more especially to wire fences; and it consists in the peculiar construction of the fence and the mode of setting it up.

In the drawings, Figure 1 represents a view in elevation illustrating two panels of a fence embodying my invention. Figs. 2, 3, 4, 5, 6, and 7 are views showing more clearly some of the parts in detail.

Referring to the drawings, A, A', and A² represent the main posts of my fence. These posts are preferably tubular in cross-section and formed of pieces of water or gas pipe. At the lower portion of the posts A A' A², I spread it, as at A³, thus forming a chisel-shaped end. At the sides of the spread lower end A³ of the post I cut into the same in a downward diagonal direction, and by turning the cut portion outward form wings a a'. Similar wings a' may be formed higher up on the post, as shown in Figs. 1 and 2, by flattening the tube at that portion and turning the cut portion outward. I may, however, cut diagonally into the tube without flattening it, and then turn the cut portion out to form the wings a a'.

Near the upper end of the posts A' A², I provide spurs a², preferably by nicking the part with a cold-chisel. The function of these spurs will be hereinafter fully set forth. In order to hold the posts A A' A² more firmly in the ground and also to prevent any lateral or side play of the fence, either from wind-pressure or from animals running or leaning against it, I provide the post with a flange B. The flange B is preferably made of burnt clay, tiling, or cement and thick enough (about three or four inches) to resist lateral displacement when embedded in the ground.

C represents a brace-bar formed of tubing, which extends between posts A' and A² at or near their upper ends. The manner of se-

curing the brace-bar C to the posts is shown more clearly in Fig. 2, and consists in providing a collar C' of slightly greater diameter than the diameter of the post. The collar C' is provided at one side with a nib or projection c, which is adapted to fit the interior or bore of the brace-bar. When collar C' is in position on the end of the brace-bar C, the parts are preferably locked or held together by means of a key c', which passes through a hole formed in both brace-bar C and nib c. In order to hold the brace-bar in position on the posts A' A² and to prevent it from vertical displacement, the collars C are passed over the upper ends of the posts and slid down until they are in contact with the spurs a². They are then driven down, the spurs a² forming an enlargement of the post at this part and filling up and engaging the aperture of the collar C'. The above-described construction is shown more clearly in Fig. 2 of the drawings, Fig. 1 showing the location of the brace-rod in relation to the posts and line-wire, which is a short distance below the top wire of the fence and between the posts A' A².

D represents a guy-wire. The upper end of the same is secured to post A' at or near brace-rod C, preferably by giving it one or more turns around the said post. The wire is brought downward in a diagonal direction and passed around post A² at or near the level of the ground. From thence it passes downward diagonally into the ground and is secured around or to a tubular stake D'. The tubular stake D' is placed in the ground in the following manner: A ditch or hole D² is formed in the ground close to the foot of post A², and at its bottom the stake D' is driven in a downward and diagonal direction toward the said post, leaving a short upper end projecting, around which the guy-wire is given a turn or fastened, thus anchoring the guy-wire. After the guy-wire is secured to the stake the ditch is filled with earth and the anchorage is thus made more secure and is out of sight. In order to tighten the guy-wire or draw it up, it is twisted in the ordinary manner.

The posts A' A² with their wings a a' and flanges B in connection with the cross-bar C

and guy-wire D with anchor D' form a very firm end panel which will resist both a strain in the direction of the fence-line and also any lateral or side strain, as shown, and also resist upheaval in cold weather.

E represents the line-wires of a fence, which pass from post to post and are suitably secured thereto. In order to hold the ends of the line-wires and thus keep the wires tight and in position, I have provided a lock which consists of a tapering plug provided with two or more grooves *ff*, each groove being different in cross-section and depth, so that wires of different gage may be used as line-wires and securely locked to the end post A².

I form the plug with grooves for the following reasons: In the first place the line-wires of the same fence may be and often are of different gages, and hence the necessity of supplying a plug with grooves of different depth and width. Also by forming the grooves in the plug and adapting the grooves to different gages of wire the line-wire is engaged by the plug-groove for quite a distance around its surface, and hence the plug has a firmer grasp on the wire, and any strain on the wire will act to tighten the plug or pull it in its seat to a much greater extent than if the groove was in the bushing or seat only as heretofore.

My preferred method of using the lock-plug F is shown in Fig. 2, and is as follows: The free end of the line-wire E is first passed through a hole provided in post A². This end is then grasped by a stretcher, preferably formed as shown in Figs. 6 and 7 of the drawings, the wire being clamped, as shown at *e*. The wire is stretched in the usual manner, and the plug F, having one of its grooves (according to the gage of the wire) so placed that the wire will rest therein, is driven into the hole in the post and the wire is locked in place, as shown in Fig. 2.

In Figs. 4 and 5 I have shown a modified form of wire-locking device. This locking device is provided with the same plug F, having the grooves *ff*, but instead of making the hole in the post to fit the plug F, I provide a bushing F', the bore of which corresponds with the outer circumference of the plug F. The bore of the bushing F' has formed in it a groove *f'*. With the above-described construction of locking device the plug F need not be made so long, as it need not extend from side to side of the post, as in Fig. 2, the bushing F' forming sufficient bearing for the plug F, and hence when the bushing is inserted in the outer hole in the post and the plug driven home the wire is locked securely in place. Instead of a bushing, as shown in Figs. 4 and 5, I may provide only a segmental

portion of the bushing with groove therein instead of the entire cylinder.

G represents a supporting or stay post which is formed of tubing of less diameter than the main posts A A' A², and is indented at points *gg* in order that the holes *g'g'* may be punched therein instead of drilling both sides of the tube, as would be necessary if the tube were cylindrical at these points. The holes *g'g'* are for the passage and support of the line-wires E.

Post G is located, preferably, about midway between the main posts A A', and is provided with a foot-flange G', suitably secured to its lower end, thus forming a firm footing and resisting downward pressure which might cause the lower end of the post G to enter the ground were it not for the foot G'.

What I claim is—

1. In a wire fence, a tubular post provided, at its lower portion, with spread chisel-shaped end having at the sides thereof outwardly-extending wings formed integral with the post, substantially as shown and described.

2. In a wire fence, a tubular post provided, at and near its lower end, with flattened portions, both of which are provided, at their sides, with outwardly-extending wings formed integral with said post.

3. In a wire fence, the combination with the end panel composed of two posts, a cross-brace extending between the said posts, a diagonal guy-wire extending from the upper part of one post to the lower portion of the opposite post, and engaging both posts, of an anchor formed of tubing, which has its lower end spread or flattened into chisel shape, and provided with outwardly-extending wings, said guy-wire being directly secured around the anchor, substantially as and for the purpose shown and described.

4. In a wire fence, the combination with the main posts, of stay-posts located between the main posts, said stay-posts being formed of tubing having compressed portions and holes at the parts where the line-wires pass through, substantially as shown and described.

5. In a wire fence, the combination with the line-wires, of a locking-plug having grooves therein of different sizes, and a bushing or segment, said bushing or segment provided with a groove cooperating with either groove of the plug to hold or lock the line-wire, substantially as shown and described.

In testimony whereof I sign this specification, in the presence of two witnesses, this 26th day of December, 1895.

SIMEON C. DAVIS.

Witnesses:

W. E. DONNELLY,
ELLA E. TILDEN.