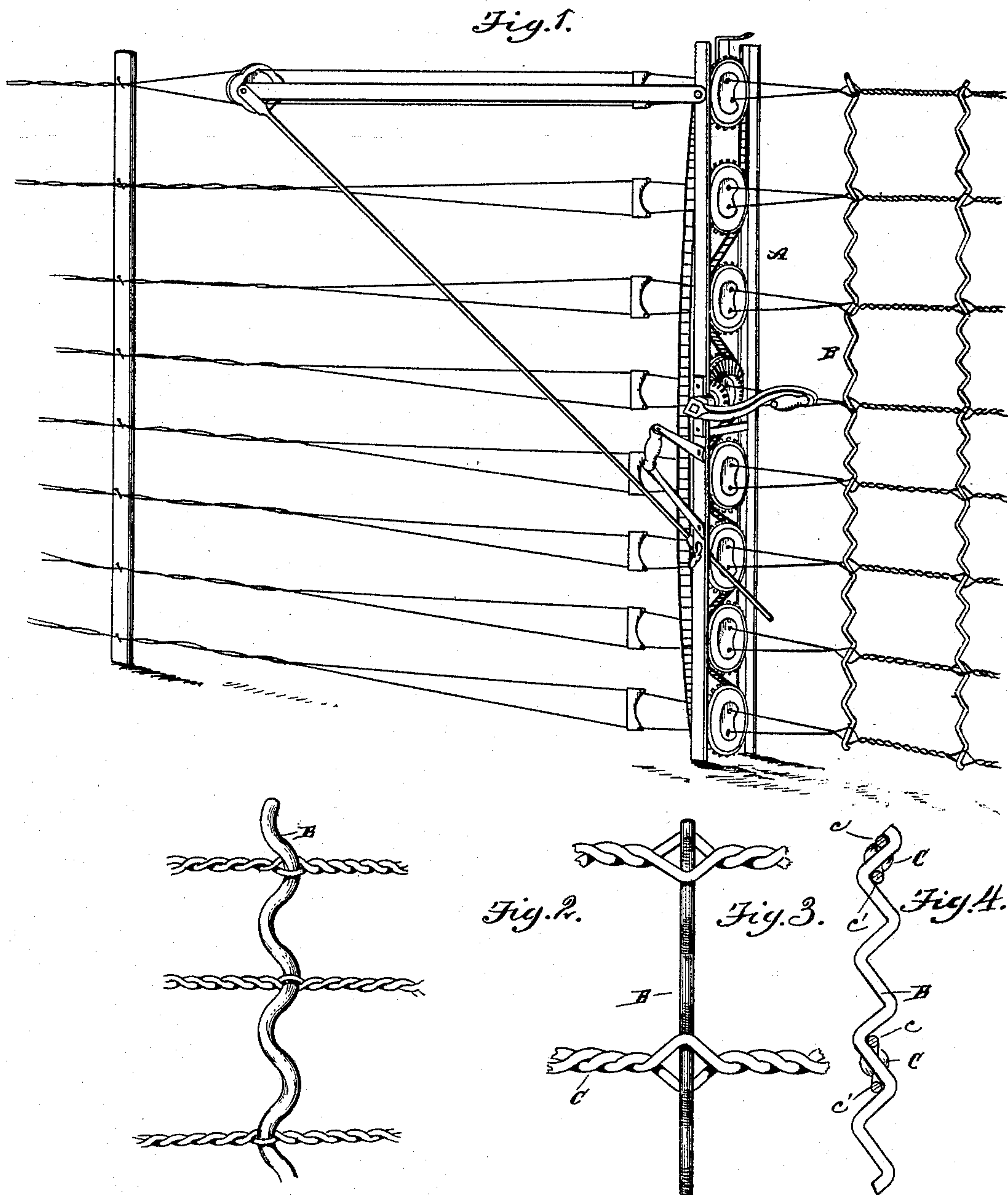


(No Model.)

J. & C. LANE.
WIRE FENCE.

No. 518,506.

Patented Apr. 17, 1894.



WITNESSES
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UNITED STATES PATENT OFFICE.

JOHN LANE AND CORNELIUS LANE, OF HOLLY, MICHIGAN.

WIRE FENCE.

SPECIFICATION forming part of Letters Patent No. 518,506, dated April 17, 1894.

Application filed July 18, 1893. Serial No. 480,804. (No model.)

To all whom it may concern:

Be it known that we, JOHN LANE and CORNELIUS LANE, citizens of the United States, residing at Holly, county of Oakland, State of Michigan, have invented a certain new and useful Improvement in Wire Fences; and we declare the following to be a full, clear, and exact description of the invention, such as it pertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification.

Our invention relates to wire fences, and consists in certain improvements therein, hereinafter described and claimed.

In the drawings, Figure 1 represents our improved fence in process of construction, and illustrating the manner in which the same is constructed. Figs. 2, 3 and 4 illustrate the principles of construction, showing two forms of the wire picket, Fig. 4 showing a cross sectional view of the fence on a line of the surface of the picket, showing the position of the two parts.

Similar letters refer to similar parts.

In carrying out our invention, A represents a wire fence machine adapted to construct wire fences by the weaving in of pickets between pairs of strands of wire, which are twisted around the picket, and upon each other in the usual form of construction of such fences. Such a machine is more particularly illustrated and described in a patent to ourselves dated February 21, 1893, and numbered 492,214, and therefore needs no further description.

B B B represent metal pickets, consisting of wire spirals, substantially as shown in Fig. 2, or simply corrugated or convoluted wire, as shown in Figs. 3 and 4. The strands, which are twisted, are marked C C C. After being twisted to the spiral or convoluted forms, the metal pickets are cut to lengths and inserted in the strands in the place of the wooden pickets in the ordinary weaving or construction of the fence, and the strands as hereinbefore stated are thereupon twisted about them, thus holding them firmly in place, and with no liability or possibility of slipping through the openings formed between the

strands. This is more fully illustrated on a larger scale and in detail in Figs. 2 and 3.

In the twisting of the strands, the tendency is necessarily to rotate the picket about an axis conformable to the strand that is being twisted. As the picket is firmly held between two or more strands, it necessarily resists this tendency, and the consequence is that, if the corrugations or loops or spirals are formed of the appropriate size, each member of the twisted strand will respectively assume a position as shown in the cross section, Fig. 4, in which the strand *c* occupies the concave portion on one side of the convolution of the wire picket B, and the opposite strand *c'* occupies a position upon the concave side of the opposite convolution. The action of twisting thereby compels the pickets to assume the position shown in Figs. 2 and 4, depending somewhat on whether the spirally twisted pickets or the convoluted pickets are used, the principle, however, being the same in either case. It will be observed that the strands *c c'* are somewhat separated, and that they occupy a position conforming nearly to the perpendicular plane of the fence. If the fence, therefore, be observed from the side, owing to the slight separation of the strands, *c, c'*, as they engage the pickets, and the fact that these strands are arranged substantially in the plane of the fence, they present a greater surface to the eye and become more easily seen, and the fence thus becomes—to use the expression—more tangible than would be the case if the strands were twisted on a straight wire picket.

It is obvious that the metal pickets may be straight between the wires, and only bent or have an offset at the points where the wires engage them, at which points they may be convoluted to a sufficient extent to enable the wires to grasp them and hold them in the manner hereinbefore stated.

What we claim is—

1. In a wire fence, the combination of corrugated metal pickets, and two or more longitudinal strands composed of double wires, each wire of said strands being drawn into the corrugations upon opposite sides of the picket by the operation of twisting, and each strand

being reversely twisted upon the picket with reference to any adjacent strand substantially as described.

2. A wire fence composed of two or more
5 longitudinal strands of wires, each strand composed of two wires, said strands engaging metal pickets having corrugations transversely to the lines of the strands, each wire of the strands being drawn into either side
10 of the corrugations respectively and locked therein by the twisting, the strands being al-

ternately twisted upon the pickets from right to left and left to right, substantially as described.

In testimony whereof we sign this specification in the presence of two witnesses. 15

JOHN LANE.
CORNELIUS LANE.

Witnesses:

EMERSON M. NEWELL,
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