

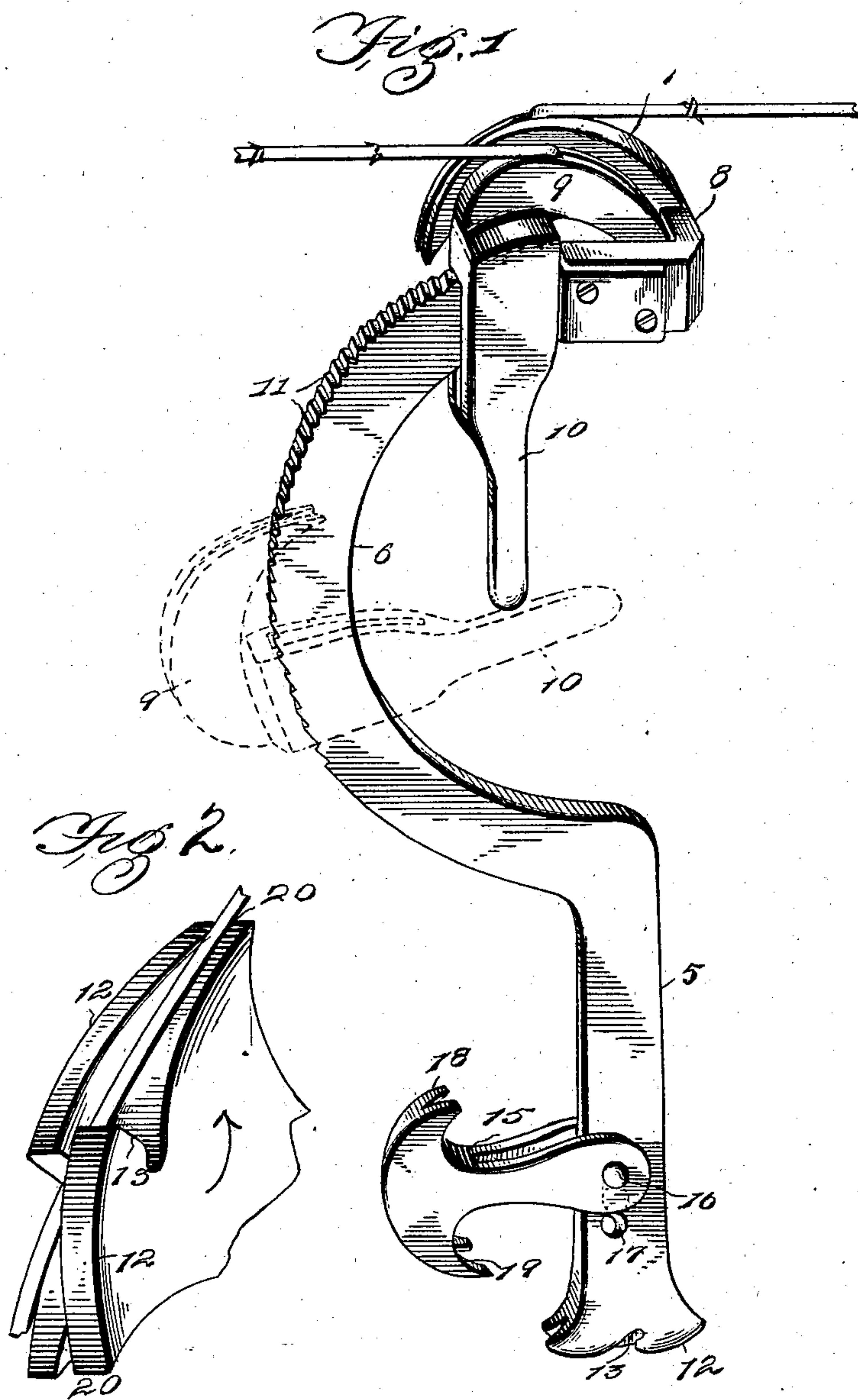
No. 708,613.

Patented Sept 9, 1902.

D. M. BAILEY.
WIRE WORKING TOOL.

(Application filed Sept. 16, 1901.)

(No Model.)



Witnesses

C. M. Simpson
Geo. E. Parker

by

D. M. Bailey Inventor
C. A. Snow & Co.
Attorneys

UNITED STATES PATENT OFFICE.

DAVID M. BAILEY, OF CALDWELL, KANSAS.

WIREWORRING-TOOL.

SPECIFICATION forming part of Letters Patent No. 708,613, dated September 9, 1902.

Application filed September 16, 1901. Serial No. 75,528. (No model.)

To all whom it may concern:

Be it known that I, DAVID M. BAILEY, a citizen of the United States; residing at Caldwell, in the county of Sumner and State of Kansas, have invented a new and useful Wireworking-Tool, of which the following is a specification.

The object of my invention is to provide a combination-tool especially adapted for use in the erection, alteration, and repair of wire fencing, although it may be employed to advantage on any line of wire used for any purpose.

The tool is so constructed as to permit of the drawing together and splicing of the adjacent ends of the two wires, or, where a break has occurred, without the employment of any auxiliary connecting devices, and it may also be used to form tightening or other loops in a length of wire.

In the accompanying drawings, Figure 1 is a perspective view of a wireworking-tool constructed in accordance with my invention and illustrating the same as employed in the connection of two wires. Fig. 2 is a detail perspective view of one end of the tool, illustrating the construction of the loop-forming devices.

The body portion or handle of the tool comprises a straight portion 5 and an arched portion 6, formed integral therewith, the arched portion being substantially semicircular in form and its outer end terminating in approximately the plane of the portion 5. At the outer end of the arched portion is secured a wire-engaging claw 7, arranged to one side of the body of the tool and having a flattened hammer-head 8, which may be utilized to advantage in the driving of staples or nails or for similar purposes.

Mounted loosely on the arch 6 is a traveling wire-engaging claw 9, the body or shank of the claw being slotted to permit the passage of the portion 6, and at its inner end a handle 10 is provided for convenience in manipulating the claw by hand when necessary. The outer edge of the arch 6 is provided with ratchet-teeth 11 for engagement with the upper walls of the slot in the traveling claw, so that the latter in operation may be held in an adjusted position and any rearward movement being prevented. The claw 9 is placed

a trifle to one side of the arch, and when the two claws are in alinement the traveling claw will be between the arch and the fixed claw 7.

In the employment of the described portion of the tool for the purpose of connecting two wires the traveling claw is moved around on the arch, as indicated by dotted lines, and one wire is engaged in said claw, and the opposite wire is secured in the fixed claw 7. By exerting sufficient force at the opposite end of the tool the traveling claw will be forced to slide from the dotted-line position to that illustrated in full lines, bringing the end of the wires closely together. The portion 5 of the handle is now held loosely in one hand, and by grasping the arched portion 6 in the other hand the tool may be turned as a brace and the ends of the wires twisted together. A joint so formed is exceedingly strong and will hold under all ordinary circumstances.

At the opposite end of the tool-handle is a loop-forming device of the character more clearly shown in Fig. 2. The end of the handle is widened, and its end face is curved and provided with two arcuate flanges 12, each extending from one edge of the curved ends to a point slightly past a central line and at this point being separated from each other for a distance sufficient to permit of the entrance of a wire. The ends of the flanges terminate in inclined or slightly-recessed shoulders 13, which operate to form the wire into a loop. The tool is pressed tightly against the wire, the latter being between and parallel with the arcuate flanges, as shown in Fig. 2. The tool is then turned, as a brace, until it assumes a position substantially at right angles to that indicated in Fig. 2, the wire engaging in the recesses of shoulders 13. Further turning movement in the same direction will cause the arcuate flanges to engage the wire, the latter riding up over the flanges until a loop is formed, the length of the loop being in a plane at a right angle to the plane of the wire shown in Fig. 2. After the formation of the loop the wire may be twisted to any desired extent, the loop being held on the undercut shoulders, owing to the fact that such shoulders extend in opposite directions, respectively, beyond a common medial line in which the loop is located. The tool may be disengaged by a slight turn in reverse direction,

the shoulders 13 being withdrawn and the loop passing into the space between the two flanges.

At the lower portion of the handle 5 is fulcrumed a staple-extracting claw 15, provided with two sets of engaging teeth 18 and 19, the teeth 19 being widely separated and adapted for engagement with the wire on either side of a staple to be extracted. In extracting the staple in this manner the arched end of the handle is pressed downwardly, the curved end of the portion 5 forming a fulcrum against the post.

The device may be employed in a variety of ways and for different purposes, such as the extraction of nails or staples or the driving of the same, or it may be used to stretch and splice the ends of a broken wire or to form tightening-loops in the length of a wire, as described.

While the construction herein described and illustrated in the accompanying drawings is the preferred form of the device, it is apparent that many changes may be made in the form, proportion, and minor details of construction without departing from my invention.

Having thus described my invention, what I claim is—

1. A wireworking-tool comprising a handle having a toothed arch, a fixed claw carried by the handle and a movable claw carried by the arch and adapted to be engaged by the teeth thereon and held opposite the fixed claw in position to permit of the twisting of the ends of the wire.

2. A wireworking-tool comprising a handle

having an arch, a fixed claw arranged at one end of the handle and situated to one side thereof, a traveling claw mounted on the arch and adapted to be moved to a point opposite the fixed claw.

3. A wireworking-tool comprising a handle 5 having a toothed arch 6, a fixed claw 7, a sliding claw 9 adapted to engage said toothed arch, the fixed claw being provided with a hammer-head.

4. A wireworking-tool comprising a handle having an arched portion and having at one end a curved face, arcuate flanges arranged on said curved face and having oppositely-disposed wire-engaging shoulders.

5. A wireworking-tool comprising a handle having an arched portion and provided at one end with a pair of separated arcuate flanges terminating in recessed shoulders, the ends of said shoulders extending respectively in opposite directions beyond a common medial line in which the wire is situated after the formation of a loop.

6. A wireworking-tool comprising a handle having an arched portion and at one end arcuate flanges 12 provided with oppositely-facing shoulders 13, the opposite ends of said curved portion terminating in claws 20, substantially as specified.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in the presence of two witnesses.

DAVID M. BAILEY.

Witnesses:

THOS. M. DREW,
J. A. RYLAND.