S. OLSEN.

TOOL FOR TWISTING ELECTRIC WIRE SLEEVE CONNECTIONS.

No. 566,614.

Patented Aug. 25, 1896.

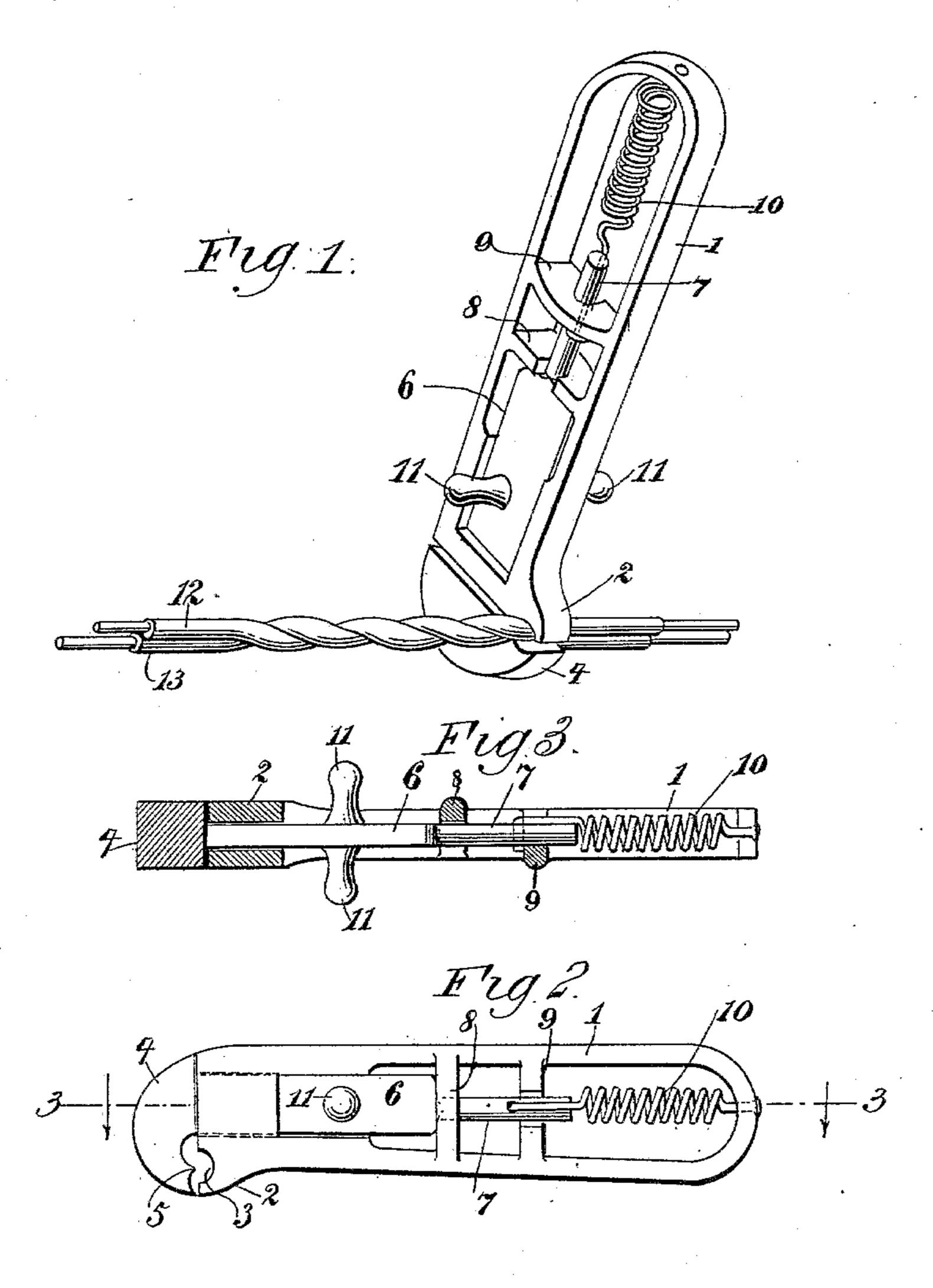
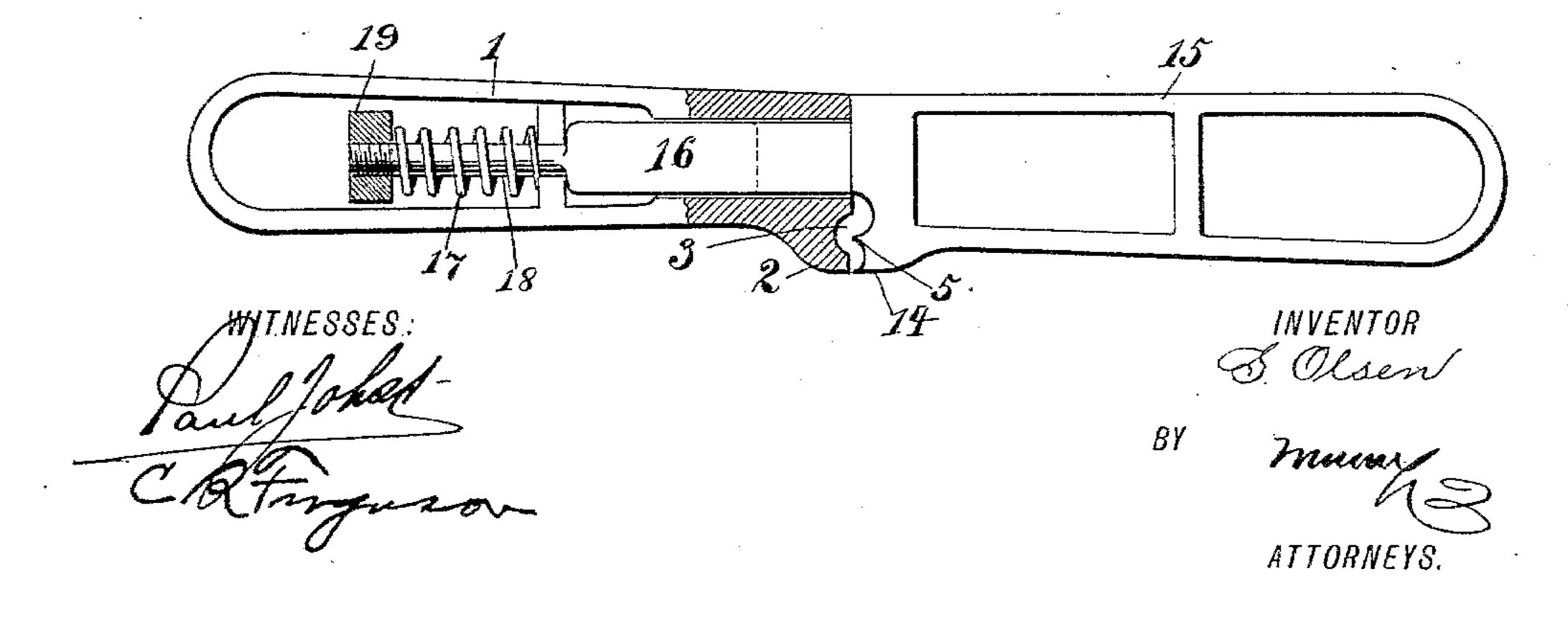


Fig 4



United States Patent Office.

SAMUEL OLSEN, OF NEW YORK, N. Y.

TOOL FOR TWISTING ELECTRIC-WIRE SLEEVE CONNECTIONS.

SPECIFICATION forming part of Letters Patent No. 566,614, dated August 25, 1896.

Application filed April 17, 1896. Serial No. 587,943. (No model.)

To all whom it may concern:

Be it known that I, SAMUEL OLSEN, of New York city, in the county and State of New York, have invented new and useful Improvements in Tools for Twisting Electric-Wire Sleeve Connections, of which the following is

a full, clear, and exact description.

This invention relates to devices for twisting sleeve connections of electric wires; and the object is to provide a tool that may be operated with a back-and-forth movement, somewhat similar to a ratchet-wrench movement, thus avoiding the complete circular movement necessary with the tool commonly employed for this purpose, and which requires an alternate grasping and releasing of the tool.

I will describe a tool embodying my invention, and then point out the novel features in

20 the appended claims.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which similar characters of reference indicate corresponding parts in all the views.

Figure 1 is a perspective view of a tool embodying my invention, showing it in connection with a sleeve. Fig. 2 is a side view thereof. Fig. 3 is a section through the line 3 3 of Fig. 2; and Fig. 4 is a side elevation, partly in section, showing a modification.

The tool comprises a handle 1, terminating in a jaw portion 2, having a transverse semicircular notch 3 to embrace a portion of the sleeve connection. Coacting with the jaw 35 portion 2 is a movable jaw portion 4, having a tooth 5 projecting toward the center of the notch 3 and designed to engage the web portion between the two tubular portions of the sleeve. The jaw portion 4 has an angular shank 6 extended through a similarly-shaped longitudinal opening in the handle 1, and from this shank a stem 7 extends through and has bearings in cross-bars 8 9 in the handle 1, which is here shown in skeleton form.

To automatically draw the jaw 4 toward the jaw 2, I employ a spring 10, which, in Figs. 1, 2, and 3, is shown as connected at one end to the stem 7 and at the other end to the end of the handle. Extended outward from the shank 6 are push-pins 11, against one of which an operator places his thumb or finger when

it is desired to release the tool from a sleeve in order to secure a new grip or hold.

The use of the tool shown in Figs. 1, 2, and 3 is as follows: After placing the ends of the 55 wires in the connected sleeves 12 13 of the coupling-sleeve the lineman will engage and hold the sleeve at one end by means of his belt-vise and will then engage the tool with the sleeve near its opposite end, with the 60 tooth 5 engaging the connecting-web of the two sleeves. Then, by a downward movement of the handle, the sleeves and wires may be twisted. After completing one downward movement the tool may be disengaged from 65 the sleeves and a new grip taken.

In the example of my improvement shown in Fig. 4, I show a movable jaw portion 14, provided with a handle 15, and in this example the jaw 14 has a shank 16, movable through 70 the handle 1, and a spring 17 surrounds the stem 18, engaging at one end against a crossbar of the handle and at the other end against a head or nut 19 on the end of the stem. This last-described tool is designed more particularly for heavy work, where the power of two hands may be required for twisting the sleeve.

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

1. A tool for the purpose described, comprising a handle, a jaw portion on said handle having a transverse notch, a jaw movable longitudinally of the handle, a tooth on the movable jaw extended toward the center of 85 the notch of the jaw on the handle, and a spring for moving the movable jaw toward the other jaw, substantially as specified.

2. A tool for the purpose described, comprising a handle, a jaw portion on said han-90 dle having a transverse notch, a movable jaw having a shank extended longitudinally through the handle, a tooth on the movable jaw extended toward the center of the notch of the jaw on the handle, a spring for mov-95 ing the movable jaw toward the other jaw, and a push-pin on a portion of the movable jaw, substantially as specified.

SAMUEL OLSEN.

Witnesses:
John I. Doody,
John Harper.