

W. HAWKINS.

WRENCH.

No. 171,935.

Patented Jan. 11, 1876.

fig. 1

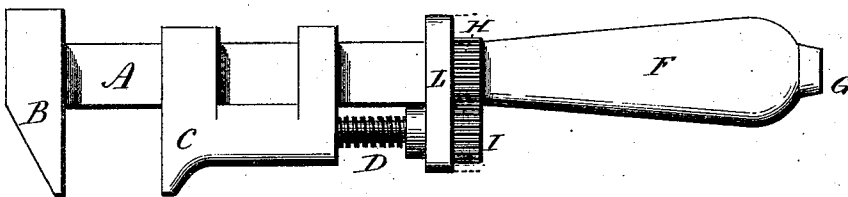
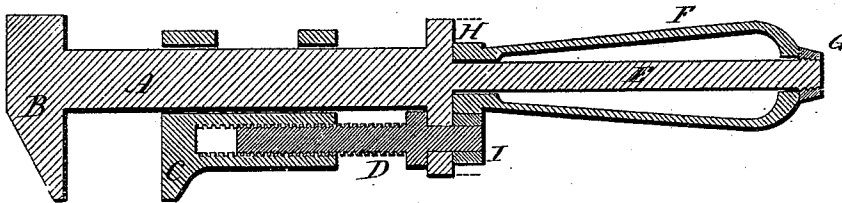


fig. 2



Witnesses:

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UNITED STATES PATENT OFFICE.

WILLIAM HAWKINS, OF BIRMINGHAM, CONNECTICUT.

IMPROVEMENT IN WRENCHES.

Specification forming part of Letters Patent No. 171,935, dated January 11, 1876; application filed November 30, 1875.

To all whom it may concern:

Be it known that I, WILLIAM HAWKINS, of Birmingham, in the county of New Haven and State of Connecticut, have invented a new Improvement in Wrenches; and do hereby declare the following, when taken in connection with the accompanying drawings and the letters of reference marked thereon, to be a full, clear, and exact description of the same, and which said drawings constitute part of this specification, and represent, in—

Figure 1, side view; Fig. 2, longitudinal central section.

This invention relates to an improvement in that class of wrenches commonly called "monkey or screw wrenches," the object of the invention being to afford a more convenient method for turning the screw than the usual thumb-collar; and it consists in constructing the handle so as to revolve on the shank of the wrench, and providing the inner end of the handle with a pinion, and the screw with a corresponding pinion, so that by turning the handle the screw will, through the said pinions, be turned to move the adjustable jaw.

A is the beam, constructed with the fixed jaw B, and with the movable jaw C on the said beam, and with a leading-screw, D, in substantially the usual manner for screw-wrenches. The beam is continued to form a shank, E, over which the handle F is placed, and so as to be revolved freely on the shank, the end of the shank provided with a nut or screw, G, to prevent longitudinal movement

of the handle. The inner end of the handle is provided or constructed with a pinion, H, and the screw D provided with a corresponding pinion, I, so that revolving the handle F will cause the screw D to revolve and move the adjustable jaw. The pinions may be of equal or varying diameters.

This construction enables a much greater force to be applied to the screw than can be done with the usual thumb-collar; hence the wrench may be firmly bound to the nut—a great convenience in many cases, as for carriage-nuts and similar purposes, and the power upon the screw is so great that the wrench may be conveniently used as a hand-vise and for like purposes.

As a protection for the pinions the abutment L may be extended to form a shell or bonnet around the gears, as indicated in broken lines.

I claim—

The combination, in a monkey or screw wrench, of the stationary and adjustable jaws, the adjusting-screw, the pinion I on the said screw, the revolving handle, and pinion H on the shank of the wrench, whereby the revolution of the handle causes a corresponding revolution of the adjusting-screw, substantially as described.

WM. HAWKINS.

Witnesses:

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