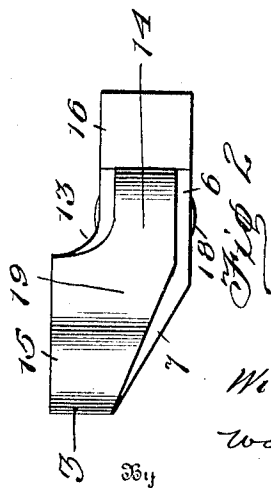
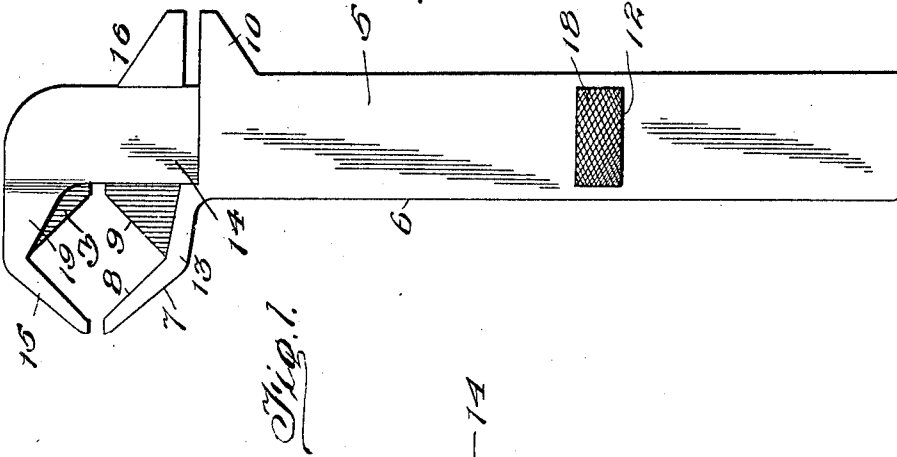
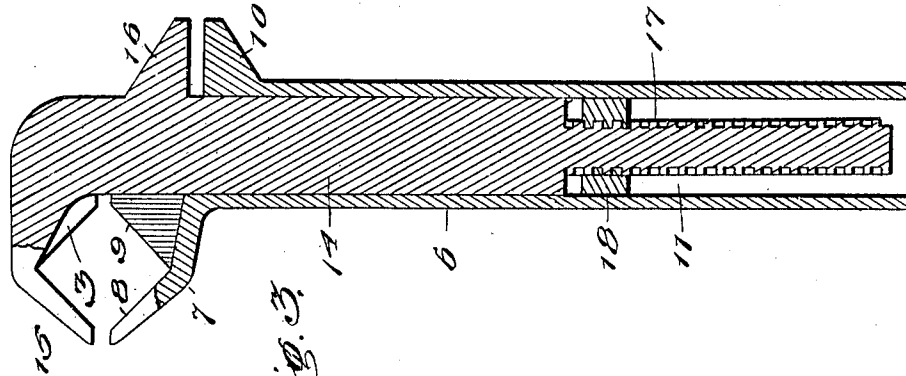


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WRENCH.
APPLICATION FILED NOV. 30, 1907.

969,880.

Patented Sept. 13, 1910.



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969,880.

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To all whom it may concern:

Be it known that I, WILLIAM G. KELLER, a citizen of the United States, residing at Avon, in the county of Livingston and State of New York, have invented certain new and useful Improvements in Wrenches, of which the following is a specification.

This invention relates to the class of wrenches, and has for its object to provide a wrench adapted for various uses, and which may be manufactured at a relatively low cost.

Other objects and advantages will be apparent from the following description and it will be understood that changes in the specific structure shown and described may be made within the scope of the claim without departing from the spirit of the invention.

In the drawings forming a part of the specification, and in which like numerals of reference indicate similar parts in the several views, Figure 1 is a side elevational view of the present wrench, Fig. 2 is an end view, Fig. 3 is a vertical longitudinal sectional view.

In carrying out the aim of my invention, I construct a wrench comprising an open-ended handle oblong and rectangular, in cross section, its two widest faces each having a square transversely extending slot 12, approximately mid-length, these two slots registering. At one end I provide the handle with a jaw 10 of a width equal to the width of said handle and extending laterally therefrom, the gripping face of this jaw extending in alinement with the end of the handle as shown in Fig. 1. At a point immediately opposite the jaw 10, I provide the handle with an offset jaw extending laterally from and beyond the end of the handle, this offset jaw comprising the base portion 13, from which is obliquely continued the engaging lip 7, held approximately at an angle of 45 degrees to the handle as shown. A solid jaw 9 extends from said base portion 13, having its outer gripping face held at an angle of 90 degrees to said lip. A shank 14 rectangular in cross section is slidably held within said handle and provided with the threaded stem 17 which is engaged by the cylindrical nut 18, revolvably held within the slots 12. This shank 14 is provided with the laterally offset jaw head 19, having an obliquely extending lip 15, for co-action with the engaging lip 7, and

held at an angle of 90 degrees to said engaging lip. The under face of this jaw head 19 is provided with a solid jaw 3 positioned adjacent to said lip 15, and having its face extending at an angle of 90 degrees to said lip, and arranged for co-action with said jaw 9. Extending from the jaw head 19 in alinement with the jaw 10, is the laterally extending jaw 16 arranged for co-action with the jaw 10. As clearly disclosed in Fig. 2, one edge of the engaging lip 7, and the obliquely extending lip 19, as well as one face of the jaw 9 and the jaw 3 of said head, all extend and lie in a common plane. From this it will be seen that by means of my construction the jaws 7 and 15 respectively may be adjusted and conveniently inserted within the hub of a vehicle wheel, the offset portions allowing free manipulation of the stock 6 outwardly of the vehicle hub.

It will of course be understood that the jaws 7 and 15 respectively are used to obtain great adjustments, and the jaws 10 and 16 respectively are used for ordinary purposes and are particularly adapted for use upon flat surfaces.

A wrench as herein described will be found extremely useful for many purposes and it will be seen that a wrench of this character may be placed upon the market at a relatively low figure.

From the foregoing description it will be seen that a wrench is constructed having an adjustable socket located to one side of the wrench for receiving nuts of various sizes, and for the purpose previously described, and further by the employment of the finger gripping jaws 7 and 15, which form the socket, a bolt having a round head and rectangular shaped shank adjacent to the head may be turned when the gripping meeting ends of the jaws are brought into a binding contact with said rectangular portion of the bolt. In gripping a bolt of this character the round head of the latter will be freely received within the socket of the wrench previously referred to.

What I claim is:

A wrench comprising a handle, an inclined finger gripping jaw forming a part of the latter, a shank slidably carried by said handle, an inclined finger gripping jaw forming a part of the shank, means for adjusting and holding said shank, the corresponding ends of said jaws being capable

of adjustment to and from one another, an
adjustable socket projecting from one side
of the wrench thus formed, wings forming
a part of said jaws and located in rear of
5 the receiving end of the socket, said wings
having engaging edges remote from the
fingered ends of said jaws, the flat inner sur-
faces of said wings forming the base of the
socket, the terminal reduced gripping ends
10 of said jaws being adapted to grip a bolt ad-

jacent to the head portion thereof with the
latter located within the socket and out of
contact with the wings thus formed.

In testimony whereof I affix my signature,
in presence of two witnesses.

WILLIAM G. KELLER.

Witnesses:

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EDWARD A. NOBLE.