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J. B. DRAHONOVSKY

DEMOUNTABLE RIM WRENCH

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Fig. 1-

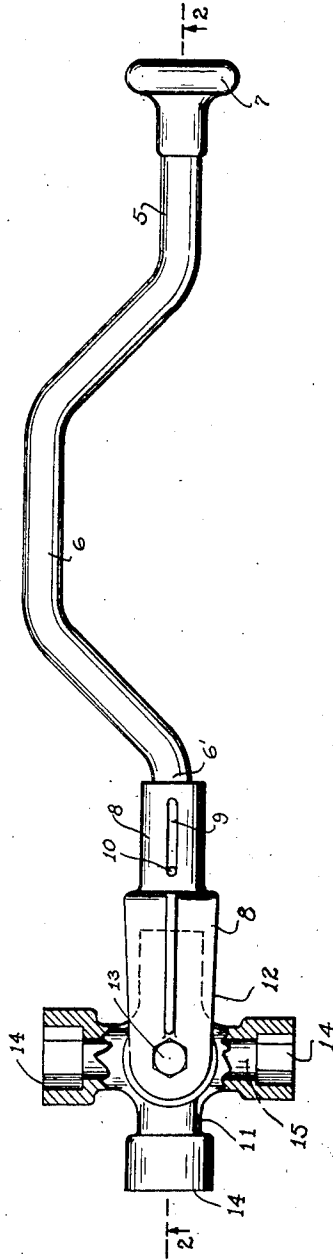
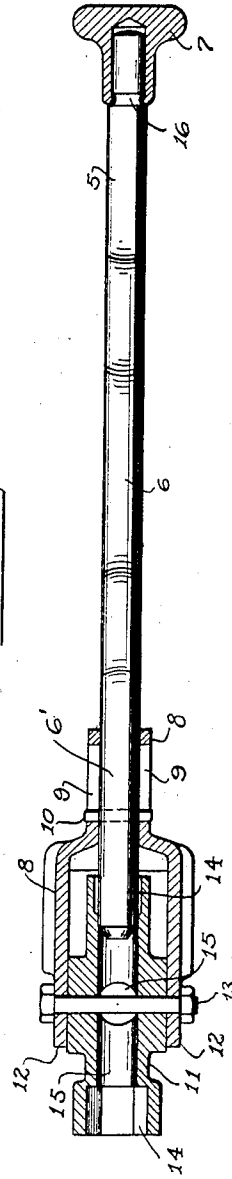


Fig. 2-



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JOHN B. DRAHONOVSKY, OF MILWAUKEE, WISCONSIN, ASSIGNOR, BY DIRECT AND MESNE ASSIGNMENTS, TO AMERICAN GRINDER MANUFACTURING CO., OF MILWAUKEE, WISCONSIN, A CORPORATION OF WISCONSIN.

DEMOUNTABLE-RIM WRENCH.

Application filed January 10, 1922. Serial No. 528,186.

To all whom it may concern:

Be it known that I, JOHN B. DRAHONOVSKY, a citizen of the United States, and resident of Milwaukee, in the county of Milwaukee and State of Wisconsin, have invented new and useful Improvements in Demountable-Rim Wrenches, of which the following is a description, reference being had to the accompanying drawings, which are a part of this specification.

This invention relates to improvements in demountable rim wrenches, more particularly, although not solely adapted for automobile use.

It is one of the objects of the present invention to provide a wrench having a plurality of sockets of various sizes carried by the brace member which may be adjusted for use with the brace member in a very simple manner to fit demountable rim and other nuts of various sizes.

A further object of the invention is to provide a demountable rim wrench which may be adjusted to be used as an ordinary brace wrench for quickly turning a nut, and which may be adjusted to another position when considerable leverage is desired in loosening or tightening nuts on a wheel rim.

A further object of the invention is to provide a demountable rim wrench having means for automatically locking the socket member in adjusted position with relation to the brace member.

A further object of the invention is to provide a demountable rim wrench which is of simple construction, is strong and durable and is well adapted for the purpose described.

With the above and other objects in view the invention consists of the improved demountable rim wrench and its parts and combinations as set forth in the claims, and all equivalents thereof.

In the accompanying drawing in which the same reference characters indicate the same parts in all of the views:

Fig. 1 is a side view of the improved demountable rim wrench, parts broken away and in section to show interior construction; and

Fig. 2 is a central sectional view of the wrench taken on line 2—2 of Fig. 1.

Referring to the drawing, the numeral 5 indicates the brace member which comprises the cranked portion 6, the revoluble handle portion 7 and the bifurcated socket holding member 8 which is slidably mounted on the straight end portion 6' of the brace part 5. Said holding member 8 is formed with a tubular part 8' provided with transverse elongated slots 9 through which a pin 10 extends. Said pin also extends through the straight end portion 6' of the brace part and slidably connects the two parts together.

A socket member 11 is positioned between the arms 12 of the bifurcated holding member 8 and is journaled on a bolt 13 extending transversely through said arms and the socket member. The socket member is in the form of a cross of tubular construction with a nut socket 14 formed on each end and varying in size with relation to each other to fit bolts or nuts of sizes ordinarily used in connection with automobile demountable rims.

The bores 15 of the socket member 11 extend centrally with relation to and open into the nut sockets 14 and are of a size to snugly receive the end portion 6' of the brace member 5 and lock the socket member in adjusted position for use as shown in the drawing.

The handle part 7 is journaled on the outer end of the brace member 5 and is held in position thereon by peening the edge portion of the handle into an annular groove 16 formed around the brace member.

In operation the holding member is pulled outwardly to disengage the socket member from the brace member and the socket member is then adjusted to use the nut socket desired, and the holding member will automatically slide on the brace member to lock the parts together when pressure is exerted on the handle in engaging the nut or bolt to be turned. If the nut or bolt is hard to turn, it is only necessary to use the nut socket which extends laterally and the brace may then be used as a long lever to increase the leverage.

When the nut has been sufficiently loosened

to easily turn, the socket part may be adjusted to project from the end of the brace and the nut may then be freely turned by turning the cranked portion of the brace in the ordinary manner.

From the foregoing description, it will be seen that the demountable rim wrench is of simple construction, and is well adapted for the purpose described.

10 What I claim as my invention is:

1. A demountable rim wrench, comprising a brace member, a holding member carried thereby, and a socket member revolubly connected to the holding member and adjustable to different positions for use, there being a relative movement toward each other of the brace member and the socket member to maintain the socket member in adjusted position.

20 2. A demountable rim wrench, comprising a brace member, a holding member slidably mounted on one end portion thereof, and a socket member revolubly connected to the holding member and adjustable to different positions for use and maintained in adjusted position by engagement with the brace member.

3. A demountable rim wrench, comprising a brace member having a straight portion and a cranked portion, a holding member slidably mounted on the straight portion of the brace member, and a socket member revolubly connected to the holding member and adjustable to different positions for use, the movement of the holding member towards the brace member locking the socket member in adjusted position.

4. A demountable rim wrench, comprising a brace member having a straight portion and a cranked portion, a holding member slidably mounted on the straight portion of the brace member and having a bifurcated end portion, and a socket member having a plurality of nut sockets, said socket member being medially journaled between the arms of the end portion and movable to position one of its nut sockets in register with and to receive the end of the straight portion of the brace member to lock said socket member in an adjusted position of use.

5. A demountable rim wrench, comprising a brace member having a straight end portion and a cranked portion, a holding member having a tubular portion slidably mounted on the straight end portion of the brace member, there being a pin and slot connection between the tubular portion and the straight end portion to limit the sliding movement and prevent independent rotation, said holding member also having a bifurcated end portion, a socket member journaled between the bifurcated portions of the holding member and having a plurality of bores and nut sockets in continuation there-

of, said socket member being rotatable to register any of the bores with and to receive the straight end portion of the brace member to lock the socket member in adjusted position and permit the use of the nut socket in alinement with the straight portion of the brace member or the one at right angles thereto.

6. A demountable rim wrench, comprising a cranked brace member having a straight end portion, a holding member slidably but non-rotatably mounted on the straight end portion of said brace member and having a bifurcated end portion, a tubular socket member journaled between the bifurcated portions of the holding member and movable to position any of its bores in register with and to receive the straight end portion of the brace member to lock the socket member in adjusted position and permit the use of the socket portion of the socket member in alinement with the straight portion of the brace member or the socket portion at right angles thereto.

7. A demountable rim wrench, comprising a cranked brace member having a straight end portion, a revoluble handle mounted on the opposite end of the brace member, a holding member slidably but non-rotatably mounted on the straight end portion of said brace member and having a bifurcated end portion, a tubular socket member journaled between the bifurcated portions of the holding member and movable to position any of its bores in register with and to receive the straight end portion of the brace member to lock the socket member in adjusted position and permit the use of the socket portion of the socket member in alinement with the straight portion of the brace member or the socket portion at right angles thereto.

8. A wrench of the multiple socket type, comprising a brace, a hollow socket holder connected to one end of the brace and located in axial alignment with the outer portion of the brace, a socket head pivoted in the said holder and having radially disposed nut sockets, and a locking member movable longitudinally in the hollow socket holder and into any one of the nut sockets to hold the socket head against pivotal movement.

9. A wrench of the multiple socket type, comprising a brace, a hollow socket holder connected to one end of the brace, a socket head pivoted in the socket holder and having radially disposed nut sockets, and a locking member movable longitudinally in the hollow socket head and manually operated from a point outside of the socket holder and adapted to engage in any of the nut sockets to hold the socket head against pivotal movement.

10. A wrench of the multiple socket type, longitudinally in the hollow socket holder comprising a brace, a hollow socket holder and manually operable from a point outside connected to one end of the brace and located in axial alignment with the outer portion of the brace, a socket head pivoted in the said holder and having radially disposed nut sockets, and a locking member movable 5 10

engagement with a nut socket.
In testimony whereof I affix my signature.

JOHN B. DRAHONOVSKY.