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BRAKE BAND CLENCHER.

APPLICATION FILED SEPT. 4, 1918.

1,307,013. Patented June 17, 1919.

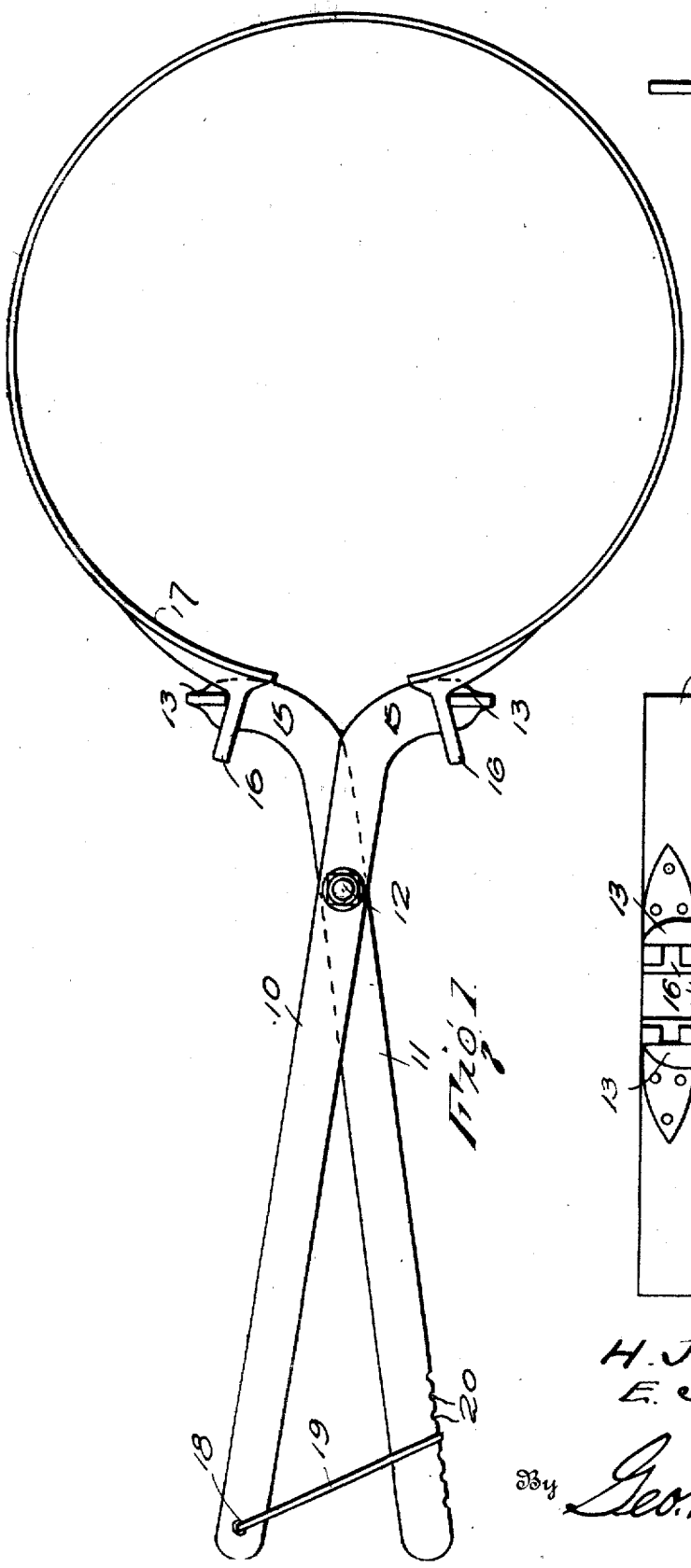


Fig. 1.

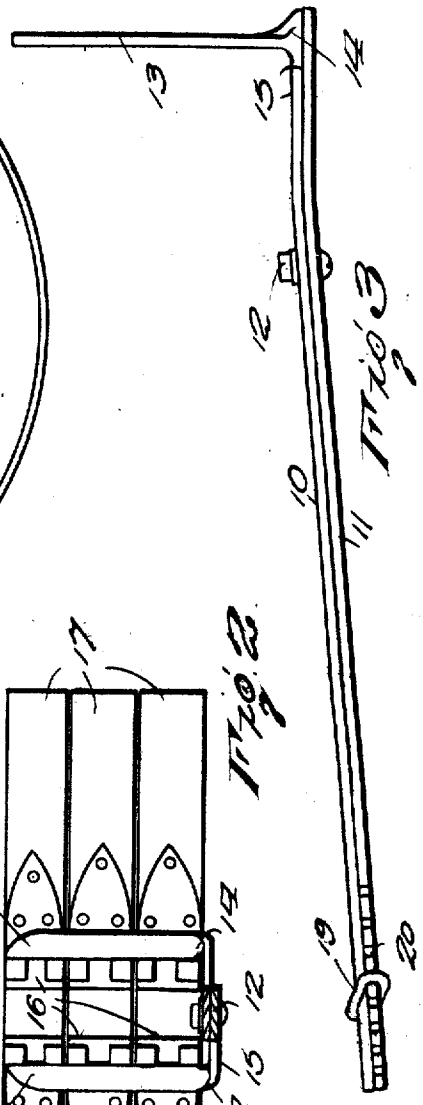


Fig. 3.

Fig. 2.

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BRAKE-BAND CLENCHER.

1,307,013. Specification of Letters Patent. Patented June 17, 1919.

Application filed September 4, 1918. Serial No. 252,572.

To all whom it may concern:

Be it known that we, HARRY J. McCAFFREY and EDGAR J. ROBERGE, citizens of the United States, and residents of Dallas, in the county of Dallas and State of Texas, have invented certain new and useful Improvements in Brake-Band Clenchers, of which the following is a specification.

This invention relates to the class of tools, and more particularly to an improvement for clenching brake bands and applying the transmission case over said brake bands with facility.

The object of the invention is to provide an improved Ford brake band clencher adapted for holding the brake bands in place while the transmission case is being replaced, the device being particularly adapted for use in making repairs when it is necessary to place new fabric lining on the brake bands, which brake bands work inside of the transmission case, and it is impossible to replace said transmission case over said brake bands without clenching the brake bands together. The invention obviates the necessity of clenching or holding these bands together by wire or string, thereby permitting their application and the placing of the transmission case and the securing thereof with efficiency, as well as obviating the possibility of the pieces of wire or string falling down into the machinery and making it necessary to take down the entire transmission and causing two or three hours' extra work in removing the same and replacing the bands and transmission case.

With the above and other objects in view, as will appear as the description proceeds, the invention comprises the various novel features of construction and arrangement of parts which will be more fully described herein and set forth with particularity in the claim appended hereto.

Reference is had to the accompanying drawings forming a part of this application, in which like reference characters indicate the corresponding parts throughout the several views, in which—

Figure 1 is a face view of our improved Ford brake band clencher,

Fig. 2 is a sectional view thereof showing the same applied to the brake band as indicated in Fig. 1, and

Fig. 3 is an edge elevation of the clencher tool.

Referring to the drawings in detail, our improved brake band clencher tool comprises handles 10 and 11 pivoted detachably as shown at 12 through the medium of a bolt or the like. The handle portion 10 and the handle portion 11 beyond the pivot, which latter is located near the jaw ends thereof, have prongs or jaws 13 disposed with their edge portions at right angles to the edge portions of the handles and extending at right angles in a common direction therefrom in spaced parallel relation. This construction is produced by twisting the jaws at right angles as shown at 14 at the ends of outwardly curved shanks 15, the jaws being disposed intermediately between the top and bottom edges of the right angularly curved parts 15 of the handles, so as to present jaws extending in parallel relation at right angles to the handles, which are very thin, so as to occupy a minimum of space when applied to the lugs 16 of the brake bands 17, for the purpose of clenching or compressing the latter in applying the same to the drums.

It is preferred that the complemental portions, including the handles and the adjacent curved portions and the jaws, be formed from single pieces of strap metal so that it will only be necessary to bend and twist these pieces for producing the desired shape while the sections may be subsequently pivotally connected at points approximately intermediate their ends in cross-like form.

It should be noted that the handles are disposed with their flat faces toward each other, thus, providing strength in the direction where the strain takes place, while still allowing the use of light material in the manufacture of the tool. In order to hold the bands clenched when the device is engaged therewith, the handle 10 is provided with an aperture 18 receiving a link 19 therein, said link being elongated and designed to engage in a series of notches 20 carried by the outer edge of the handle 10, so as to give the desired degree of compression or clenching to hold the brake bands in position while the transmission cover is being placed into position and bolted.

In the use of the device, in replacing the transmission or brake bands, the bolts holding down the transmission cover are removed and the bands taken out and replaced with new or relined bands. The bands held

by the improved tool are then fitted over the transmission drums and held in place instead of using wire or strings which are apt to fall down into the motor or work down on to the magneto so as to require the motor to be torn down to remove the pieces, thus, requiring extra time. With this device the bands can be applied and held by the link of the device, in a very short time, so as to facilitate the application of the transmission cover and rebolting of the same, as well as permitting the pins and washers to be properly placed in the top of the bands for insuring the proper relation of the parts. Owing to the fact that the jaws of the device lie flat against the bands, only a minimum of space is taken up so that the transmission cover will readily fit in place when the over may be bolted in position and the device be removed through the hole in the transmission cover. It is to be noted particularly that the side edges of the sections form the contacting faces of the jaws thereby equally distributing the strain on the jaws, curved portions, and handle portions. Moreover, because of the arranging of the curved portions 15 in a plane slightly inclined to the longitudinal plane of the handle portions, the latter may be effectively manipulated while at the same time the jaws are effectively maintained in an engaged position.

From the foregoing description taken in connection with the accompanying drawings, it is thought that a clear and comprehensive understanding of the construction, operation, and advantages of our invention may be had, and while we have shown and described the device as embodying a specific structure, we desire that it be understood that such changes may be made in said structure as do not depart from the spirit and scope of the invention as claimed.

Having thus described our invention, what we claim as new, and desire to secure by Letters Patent, is:

A brake band clencher comprising complemental sections, each formed from a single piece of strap metal and pivoted together at points approximately medially of their ends and arranged in cross-like form, the portions to one side of the pivot point constituting handles, the portions to the other side of the pivot being curved transversely of their length outwardly in opposite directions and lying in a plane slightly inclined with respect to the longitudinal plane of the handle portions, the free portions continuing from the curved portions being twisted and extended at right angles from the curved portions and arranged in a plane at right angles to the longitudinal plane of the curved portions to provide relatively parallel jaws adapted to engage the lugs on a brake band, the side edges of the sections forming the contacting faces of the jaws thereby equally distributing the strain on the sections, and means for releasably holding the jaws in clamping relation.

In testimony whereof, we affix our signatures hereto.

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