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R. P. WAGNER
BOLT HOLDING PLIERS

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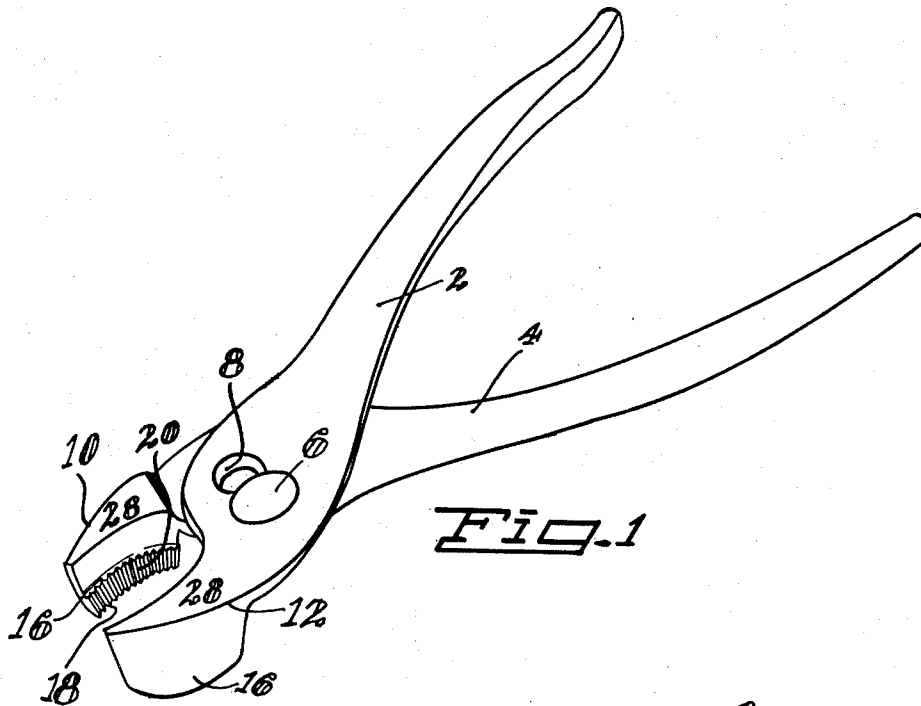


Fig. 1

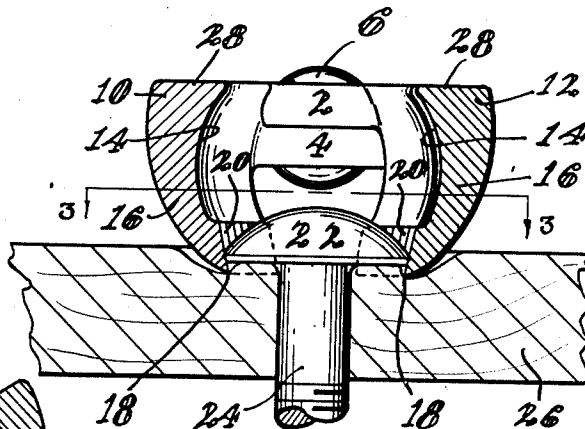


Fig. 2

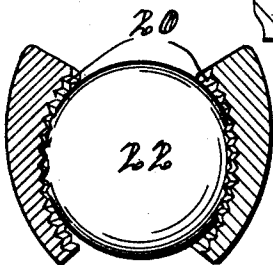


Fig. 3

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BOLT HOLDING PLIERS

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1 Claim. (Cl. 81-13)

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My present invention relates to an improved bolt holding pliers and more specifically to a pair of pliers which in addition to the usual and customary use, may be employed to grasp and hold flat bolt heads as when such bolts are inserted in wood and as frequently happens the flat heads become embedded in the wood and the conventional pliers are unable to provide a firm grip on the bolt head so embedded.

According to my invention in addition to other novel and unique features I provide the nose of each plier portion with sharpened edges on extensions below the noses so that the edges may be driven into wood close to the bolt head and the inner serrated walls of the extensions may easily clamp the periphery of the bolt head.

In the accompanying drawings I have illustrated one complete example of the physical embodiment of my invention according to the best mode I have thus far devised, but it will be understood that various changes and alterations may be made in the exemplified structure within the scope of the appended claim.

In the drawings:

Fig. 1 is a perspective view of the pliers of my invention.

Fig. 2 is a transverse vertical sectional view through the nose portions thereof.

Fig. 3 is a sectional view at line 3-3 of Fig. 2.

Referring now to the drawings I have illustrated the tool of my invention similar in most respects to the conventional pliers and having the opposed handles 2 and 4, pivoted at 6, and the upper handle having an elongated slot 8 for the pivot pin.

The nose portions or jaws 10 and 12 have inner curved gripping faces 14 and below the jaws I form extensions 16 which curve inwardly and terminate in sharpened edges 18. The inner faces of the extensions are ribbed as at 20 to grip the bolt head 22 of bolt 24 shown as positioned in a board 26.

To use the tool according to my invention the jaws are spaced and placed about the embedded bolt head and by striking the upper flat faces 28 of the jaws as with a hammer, the edges 18 penetrate the wood enabling the ribbed jaws to engage the bolt head.

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Having thus fully described my invention what I claim as new and desire to secure by Letters Patent is:

A bolt holding tool of the plier type comprising handles pivotally connected in side by side relation to each other and having portions projecting forwardly and constituting jaws, the jaws being extended downwardly beyond the handles and being arcuate longitudinally and having inner and outer side faces converging forwardly, the said jaws having wide upper faces flat through their area and having their inner and outer side faces arcuate vertically and converging downwardly, the said inner side faces of the jaws being inwardly thickened below their downwardly arcuate portions and forming inwardly offset marginal surfaces along their lower portions bordered by shoulders along their upper edges and extending downwardly at an incline and defining downwardly converging bevelled surfaces having their lower edges intersecting lower edges of the outer surfaces of the jaws and forming sharp lower edges for the jaws, the said marginal surfaces being formed with vertically extending ribs forming teeth adapted to grip the periphery of a bolt head engaged between the said marginal surfaces of the jaws.

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REFERENCES CITED

The following references are of record in the file of this patent:

UNITED STATES PATENTS

Number	Name	Date
148,656	Blair	Mar. 17, 1874
1,099,426	Champ	June 9, 1914
1,195,591	Kammer	Aug. 22, 1916
1,367,362	Earnhart	Feb. 1, 1921
1,813,038	Erne	July 7, 1931

FOREIGN PATENTS

Number	Country	Date
14,126	Great Britain	July 23, 1894
149,396	Great Britain	Aug. 6, 1920