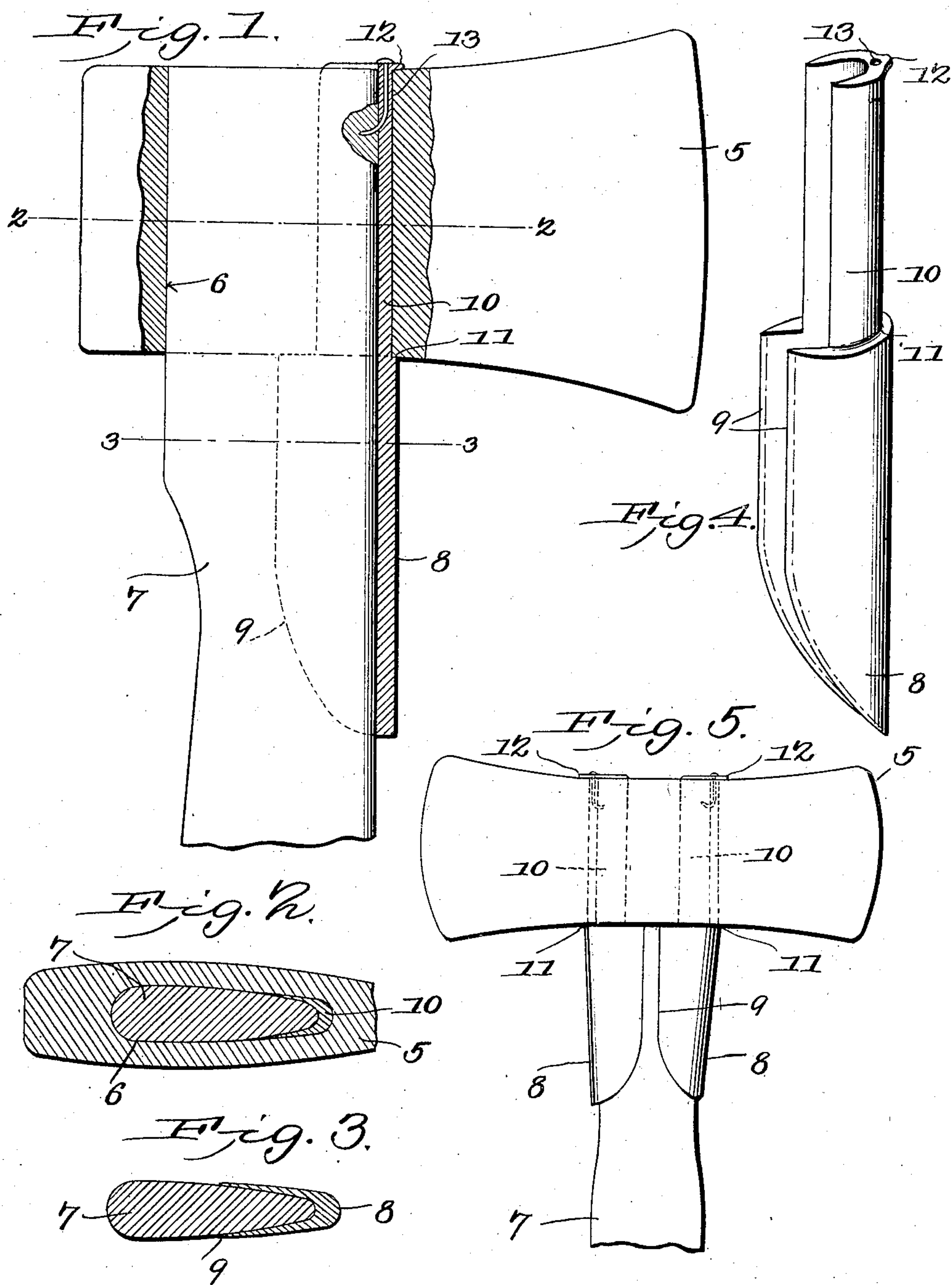


No. 822,006.

PATENTED MAY 29, 1906.

J. H. LYONS.
PROTECTOR FOR TOOL HANDLES.
APPLICATION FILED FEB. 27, 1905.



Witnesses

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UNITED STATES PATENT OFFICE.

JOHN HENRY LYONS, OF LYONS, OREGON.

PROTECTOR FOR TOOL-HANDLES.

No. 822,006.

Specification of Letters Patent.

Patented May 29, 1906.

Application filed February 27, 1905. Serial No. 247,499.

To all whom it may concern:

Be it known that I, JOHN HENRY LYONS, a citizen of the United States, residing at Lyons, in the county of Linn and State of Oregon, have invented a new and useful Protector for Tool-Handles, of which the following is a specification.

This invention relates to an improved guard or shield for tool-handles, and has for its object to provide a simple, inexpensive, and efficient device of this character designed to protect the handle of an ax, mattock, sledge, or other tool and prevent excessive wear or injury to the handle where it enters the eye of the tool.

A further object of the invention is to provide means for preventing accidental displacement of the guard or shield and to form the latter with a longitudinal key-seat for the reception of a locking member adapted to be driven into the tool-handle.

With these and other objects in view the invention consists in the construction and novel combination and arrangement of parts hereinafter fully described, illustrated in the accompanying drawings, and pointed out in the claim hereto appended, it being understood that various changes in form, proportions, and minor details of construction may be resorted to without departing from the principle or sacrificing any of the advantages of this invention.

In the accompanying drawings, forming a part of this specification, Figure 1 is a longitudinal sectional view of an ax, showing a guard or shield constructed in accordance with my invention applied thereto. Fig. 2 is a transverse sectional view taken on the line 2 2 of Fig. 1. Fig. 3 is a similar view on the line 3 3 of Fig. 1. Fig. 4 is a detail perspective view of the guard or shield detached. Fig. 5 is a side elevation showing the device applied to a double-bit ax.

Similar numerals of reference indicate corresponding parts in all the figures of the drawings.

The improved guard or shield may be applied to the handle of an ax, pick, or other tool and for sake of illustration is shown applied to the ordinary form of ax, (indicated at 5,) the latter having the usual eye 6 formed therein for the reception of the helve or handle 7.

The shield is preferably formed of malleable iron or steel, and consists of a body portion 8, bent to conform to the contour of the

handle and having its adjacent longitudinal edges 9 spaced apart to permit the same to readily embrace the handle where the latter enters the eye of the ax, as shown. The body portion 8 is provided with a reduced extension 10, defining an annular shoulder 11, said extension being formed with a terminal laterally-extending lug 12, adapted to engage the top of the ax, while the shoulder 11 engages the bottom of the ax, thereby effectually retaining the guard or shield in position on the helve or handle. The longitudinal edges of the reduced extension 10 are preferably curved rearwardly and spaced apart to form a socket adapted to receive the adjacent end of the handle 7, as best shown in Figs. 2 and 4 of the drawings.

The side walls of the body portion and its reduced extension gradually decrease in thickness toward the longitudinal edges of the same, the latter being preferably tempered or otherwise hardened, as indicated by dotted lines in Fig. 4 of the drawings.

Drilled or otherwise formed in the central thickened portion of the extension 10 is a longitudinally-disposed key-seat 13, the lower wall of which is curved or rounded and communicates with the eye of the ax when the guard or shield is in position on the latter, so that when a nail, key, or other fastening device is introduced in said key-seat and a downward pressure exerted thereon the point of the nail will enter the end of the handle and prevent accidental displacement of the same.

In applying the device the reduced end of the shield is inserted in the eye of the ax with the open end of the shield facing the butt-end of the ax, after which the helve or handle is placed in position and the nail or key driven into the latter, as clearly shown in Fig. 1 of the drawings.

In Fig. 5 the device is shown applied to a double-bit ax, in which event a guard or shield will be placed on each side of the handle, so that no matter which cutting edge of the tool is being used the adjacent portion of the handle will be protected from injury.

From the foregoing it is evident that when a tool-handle has become worn from excessive use the shield will bridge over the worn place, or when applied to new axes, picks, and similar tools the guard will receive the impact of the blow which would otherwise fall on the handle, and thereby prevent injury to the latter.

The shields may be made in different sizes to fit the eyes in different tools and may be nicked, japanned, or otherwise coated or finished to give the same a neat appearance.

5 Having thus described the invention, what is claimed is—

10 The combination with a tool and its handles, of a detachable shield embracing the handle and comprising a soft-iron body portion having its parallel longitudinal edges tempered and spaced apart to conform to the shape of the tool-handles and gradually increasing in thickness from said edges to the center of the body portion and inclined to-
15 ward one end of the latter, said body portion being provided at its opposite end with an annular shoulder for engagement with the base of the tool and having a reduced exten-

sion of approximately one-half the width of the body portion and forming a socket adapted to receive the adjacent longitudinal edge of the handle, the end of the extension being bent to form a central laterally-projecting lug for engagement with the head of the tool and provided with a longitudinal key-receiving recess extending laterally through the walls of said extension and communicating with the eye of the tool, and a key seated in said recess and adapted to pierce the handle.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in the presence of two witnesses.

JOHN HENRY LYONS.

Witnesses:

RICHARD B. LYONS,
D. K. CHARLES.