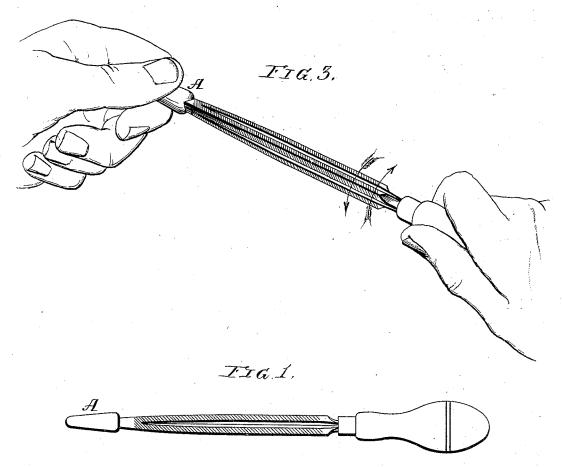
## H. DISSTON.

## Tips for Saw-Files.

No. 142,900.

Patented September 16, 1873.



IIG. 2.



Wilnesses,

Thomas Mc Ilvan Hubert Houson Henry Diseter by his attys. Howens and Sur

## UNITED STATES PATENT OFFICE.

HENRY DISSTON, OF PHILADELPHIA, PENNSYLVANIA.

## IMPROVEMENT IN TIPS FOR SAW-FILES.

Specification forming part of Letters Patent No. 142,900, dated September 16, 1873; application filed September 5, 1873.

To all whom it may concern:

Be it known that I, HENRY DISSTON, of Philadelphia, Philadelphia county, State of Pennsylvania, have invented an Improved Detachable Tip for Saw-Files, of which the fol-

lowing is a specification:

The object of my invention is to provide a saw-file with a detachable tip or pad, which will afford facilities for the easy manipulation of the tool, and will at the same time protect the thumb and fingers of the operator from the abrasion which results from the manipulating an ordinary saw-file. I obtain this object by a round tip, A, of rubber, shown in Figures 1 and 2 of the accompanying drawing, the said tip having a central tapering orifice, a, for receiving the pointed end of the file, to which it will adhere with sufficient tenacity. The sharpening of saw-teeth with accuracy and rapidity is an operation requiring considerable tact and experience, as the position of the file must be constantly changed and repeatedly turned to impart not only proper taper to the saw-teeth, but the proper bevel to the edges of the same.

The manner of manipulating a saw-file will be readily understood by referring to the sketch, Fig. 3. The thumb of the operator's left hand is applied to the end of the file near the point, and it is the action of his thumb at this point on which the operator depends for guiding and manipulating the necessary lateral pressure to the file, while with the handle in his right hand he occasionally turns the file to the right or to the left, as shown by the arrows, so that one of its faces shall be presented in the proper

position to the tooth of the saw. The repeated partial turning of the file combined with the pressure of the thumb necessarily subjects the latter to severe abrasion, so that it is usual to employ a thumb stall or pad, for which I substitute the detachable tip A of rubber, the latter made round transversely, and of the tapering form shown longitudinally, and having at its thick end a central tapering orifice, into which the point of the file is forced, the contractile property of the material insuring the necessary adhesion of the tip to the file. While the tip presents a slightly yielding surface for receiving the pressure of the operator's thumb, the character of the rubber is such that there is no fear of the slipping of the thumb on its surface; at the same time, the tip being round, it presents no impediment to the repeated turning of the file. It has been found, in practice, that this rubber tip is a much more convenient adjunct to a saw-file than the usual thumb stall or pad.

When necessary, the tip can be readily detached from one file and appended to another.

I claim as my invention-

The within-described rubber tip, having a central tapering orifice for receiving the end of a saw-file, as set forth.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

HENRY DISSTON.

Witnesses:

WM. H. WRIGHT, J. S. SINGER.