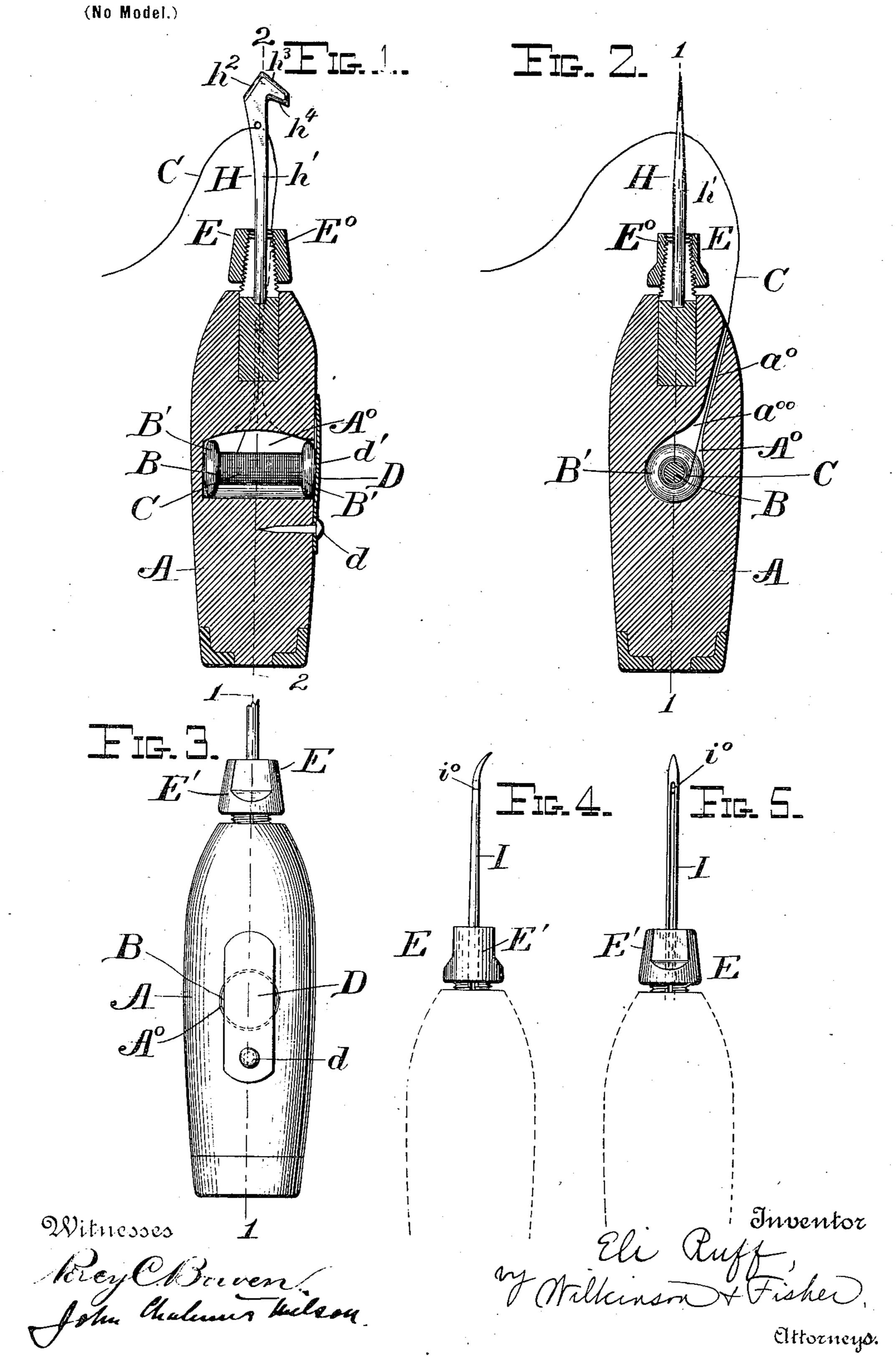
E. RUFF.

HAND IMPLEMENT CARRYING THREAD.

(Application filed Nov. 15, 1898.)



United States Patent Office.

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HAND IMPLEMENT CARRYING THREAD.

SPECIFICATION forming part of Letters Patent No. 617,970, dated January 17, 1899.

Application filed November 15, 1898. Serial No. 696,554. (No model.)

To all whom it may concern:

Be it known that I, ELI RUFF, a citizen of the United States, residing at Red Oak, in the county of Montgomery and State of Iowa, have 5 invented certain new and useful Improvements in Hand Implements Carrying Thread; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in to the art to which it appertains to make and use the same.

My invention relates to improvements in hand implements carrying a thread or twine wound upon a bobbin or spool from which 15 the thread or twine is unwound as needed, and has for its object to produce an implement having a maximum of simplicity in construction and consequent cheapness in manufacture, combined with a convenient degree

20 of efficiency in use.

My invention consists, primarily, in a handle for such an implement embodying a new and convenient form and arrangement of bobbin or spool for the thread or twine, and, sec-25 ondarily, in a peculiar form of tool made to fit such handle, the handle being so constructed as to receive interchangeable tools for various uses.

My invention will be readily understood by 30 reference to the accompanying drawings, wherein the same parts are indicated by the same letters throughout the several views.

Figure 1 represents a section taken through the handle of my tool, the tool itself being a 35 peculiar form devised by me for use in budding or grafting small fruit-trees and being shown in elevation, the section being taken on the lines 1 1 in Figs. 2 and 3. Fig. 2 is a sectional view taken on the line 2 in Fig. 1. 40 Fig. 3 represents an elevation of the tool-handle as seen from the right in Fig. 1, and Figs. 4 and 5 are views illustrating the use of a curved sewing-awl with my tool-handle.

A represents the body of the handle, which 45 is provided with a transverse opening or chamber A⁰, for the bobbin or spool B, which carries the thread or twine C wound thereon. This bobbin or spool B is made of a solid piece of metal, having enlarged rounded ends 50 B' and fits snugly but easily within the chamber A⁰. One end of the chamber A⁰ is open, and the bobbin B is retained within the cham-

ber by means of a plate D, of spring metal, pivoted at one end upon the outside of the handle by means of a nail or screw d, pass- 55 ing through said plate and into the handle, the said plate being so bent as to make frictional contact at its other end with the outside of the handle upon the opposite side of the opening of the chamber A⁰, as seen at 60 d' in Fig. 1, and the intermediate portion of the said plate having a slight outward curve. The plate D normally exerts a slight frictional pressure upon the end of the bobbin, and this frictional pressure may be increased 65 by pressure from the hand of the operator to increase the tension upon the thread or twine C as it is drawn from the bobbin, when desired, although the friction of the bobbin against the walls of the chamber A⁰ and 70 against the normal pressure of the plate D will ordinarily be sufficient to create the necessary degree of tension, except when the thread or twine is to be drawn taut without unwinding from the bobbin.

A longitudinal opening a^0 from the center of the chamber A⁰ is formed toward the tool end of the handle, through which the end of the thread or twine is led to the tool, as shown in Fig. 2, the inner end of this opening a^0 80 where it communicates with the bobbin-chamber A⁰ being enlarged, as shown at a^{00} , and somewhat rounded to allow the thread or twine to unwind from the ends of the bobbin and to prevent the cutting thereof.

The handle may be provided with any suitable form of tool-holding device, such as the chuck E shown, which is of the simplest form commonly in use, the shank of the tool being released or secured by screwing up or un- 90 screwing the cap E⁰, as desired.

While I do not wish to limit myself to any one particular form of tool for use with my improved handle, I have shown in Figs. 1 and 2 a tool specially designed for use in budding 95 or grafting small fruit-trees. In these figures H represents the tool, which is provided with a straight shank h', adapted to fit the chuck E on the handle. The point of this tool is flat and widened and doubly beveled, form- 100 ing cutting edges h^2 and h^3 , and at one side edge, a short distance back of the cutting edge h^3 , the tool is cut away and provided with an internal cutting edge h^4 . The cut-

ting edges h^2 and h^3 permit the operator to make a cut by pressing upon the implement, as is customary in making the necessary slit in the tree for the insertion of the bud, and 5 the cutting edge h^4 is convenient for use in making a draw cut, as in severing the thread used in securing the bud in place, as will be readily understood by any nurseryman. The tool H is provided with a small opening near 10 its point for the passage of the thread, which is thereby held in a convenient position to be wrapped about the tree and bud and drawn out as needed, the implement being all the while held in one hand of the operator, while 15 the other hand is free to insert the bud and wrap the thread in the usual manner.

In Figs. 4 and 5 I have illustrated the adaptability of my tool-handle for use with a sewing-awl, the thread being carried by the 20 point of the awl and inserted through the piece of leather or other material in one operation. The awl I, having either a straight point or a curved point, as shown, is provided with an opening io near its point for the pas-25 sage of the thread and with a groove longitudinally thereof communicating with said opening, within which the thread may lie and

avoid becoming cut during the insertion of the awl.

30 It will be seen from the foregoing description that I provide a simple handle having a great variety of uses, and that I also provide a very cheap implement for use by nurserymen in budding and grafting which possesses 35 great advantages over the implements now

ordinarily in use.

Having thus described my invention, what I claim, and desire to secure by Letters Pat-

ent of the United States, is-

1. In a tool-handle of the character described, the combination with the body of the handle having a transverse chamber therein for the bobbin, and a longitudinal opening leading from the said chamber toward the 45 tool end of the handle, of a bobbin fitting

said chumber in the handle; and a springplate pivotally mounted upon the side of the handle, and arranged to swing over the end of the bobbin and bear thereon, substantially as described.

2. In a tool-handle of the character described, the combination with the body of the handle having a transverse chamber therein for the bobbin, and a longitudinal opening leading from the said chamber toward the 55 tool end of the handle; of a solid-metal bobbin fitting said chamber and arranged to rotate in frictional contact with the walls of said chamber; and a spring-plate pivotally mounted upon the side of the handle, and arranged 60 to swing over the end of the bobbin and bear thereon, substantially as described.

3. In a tool of the character described, the combination with the handle having a bobbin-chamber therein and an opening leading 65 from said bobbin-chamber toward the tool end of said handle; of a took having a flattened point provided with a cutting edge, and having an opening near such point for the passage of a thread; a bobbin, and means for 70 increasing the tension on said bobbin, sub-

stantially as described.

4. In a tool of the character described, the combination with the handle having a bobbin-chamber therein and an opening leading 75 from said bobbin-chamber toward the tool end of said handle; of a tool having a barbed point provided with internal and external cutting edges, and having an opening near such point for the passage of a thread; a bob- 80 bin in said chamber, and means for retaining said bobbin therein, substantially as described.

In testimony whereof I affix my signature in presence of two witnesses.

ELI RUFF.

Witnesses:

R. W. BIESON, WM. PLANCK.