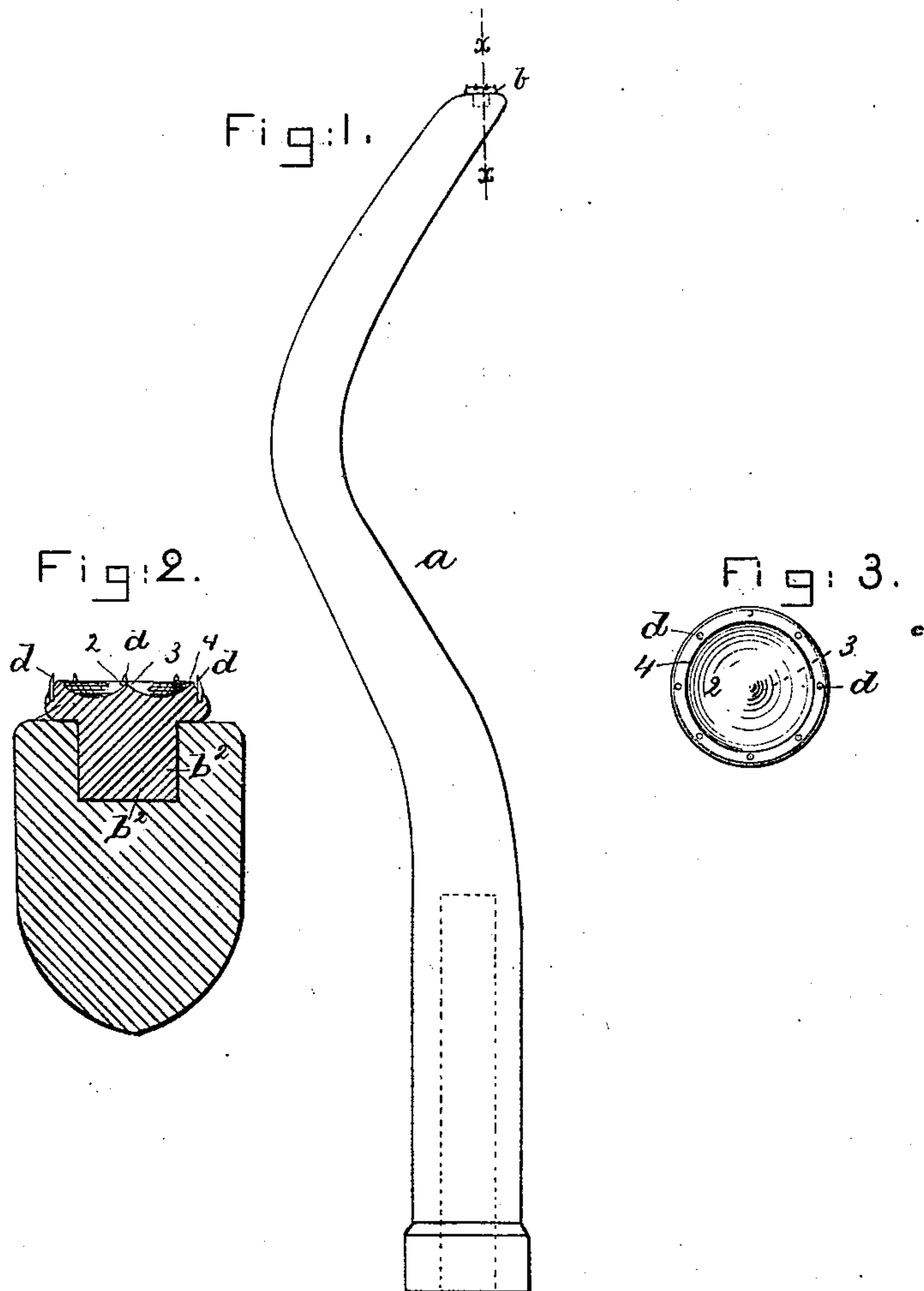


(No Model.)

L. GODDU.
NAILING MACHINE.

No. 250,723.

Patented Dec. 13, 1881.



WITNESSES

L. F. Connor.

Bernice J. Noyes.

INVENTOR

Louis Goddu.
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Atty

UNITED STATES PATENT OFFICE.

LOUIS GODDU, OF WINCHESTER, ASSIGNOR TO GORDON McKAY AND JAMES W. BROOKS, TRUSTEES, OF CAMBRIDGE, MASSACHUSETTS.

NAILING-MACHINE.

SPECIFICATION forming part of Letters Patent No. 250,723, dated December 13, 1881.

Application filed October 6, 1881. (No model.)

To all whom it may concern:

Be it known that I, LOUIS GODDU, of Winchester, Middlesex county, State of Massachusetts, have invented an Improvement in Nailing-Machines, of which the following description, in connection with the accompanying drawings, is a specification.

This invention in nailing-machines relates to improvements in the horn, whereby the nail driven through the leather against the horn will be turned and clinched and the leather held from movement during the clinching operation.

In this my invention I have provided the tip of the usual horn with a small annular groove for a clinching-surface, and also with one or more teeth or points to enter the inner or other sole next them sufficiently far to prevent the latter and the shoe moving horizontally as the point of the nail is being clinched on the horn. This groove, rising from its bottom in both directions, produces two concaved clinching-surfaces, which insure the curling or clinching of the point of the nail or fastening being driven, notwithstanding variations in inclination of the nail, and operates better than when a cap or single round cavity is employed.

Figure 1 represents in elevation the upper part of a rotating horn common to machines for nailing boots and shoes; Fig. 2, an enlarged vertical section, on the line *xx*, through the tip of the horn; and Fig. 3, an enlarged top view of the clinching-surface at the tip of the horn.

The horn *a* is and may be of any usual construction common to machines for driving fastenings into boots and shoes, it being shown of the kind which is adapted to be rotated.

The nail-clinching surface *b* at the tip or upper end of the horn is herein shown as formed of a block of steel set into the horn, as shown, and having a shank, *b*². This block is provided with an annular groove, 2, leaving a small conical central high point in line with

the usual nail-driver and an annular rim, 4. The groove 2 from its bottom rounds to the point 3 and rim 4, presenting concaved surfaces, against which the points of the nails or fastenings driven through the outer sole, upper, and inner sole of the boot or shoe, or through a piece of leather in the usual way, strike and are turned and well clinched.

I am aware that the tip of a horn has been provided with a cap or conical cavity, as in United States Patent to L.R. Blake, No. 217,324, July 8, 1879; but in the said Blake invention the clinching-surface was not so shaped as to bend the nail as soon as it emerged through the stock or sole, as does the central portion, 3, in this invention.

About the rim 4, I have placed teeth or points *d*, which extend far enough above the rim 4 to engage or penetrate the inner or other sole or part of leather being nailed sufficiently to retain the same in place and obviate lateral movement when a nail is being driven or clinched. After each nail is driven the operator slightly lifts the shoe from the horn and frees it from the teeth or pins.

I claim—

1. A horn provided at its top with a clinching-surface made as an annular groove with a raised center, 3, all substantially as and for the purpose described.

2. The horn grooved or concaved to provide a clinching-surface, and provided with teeth or points to enter and hold the sole, substantially as described.

3. A horn provided at its tip with teeth or points to enter and hold the sole in place, substantially as described.

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

LOUIS GODDU.

Witnesses:

G. W. GREGORY,
B. J. NOYES.