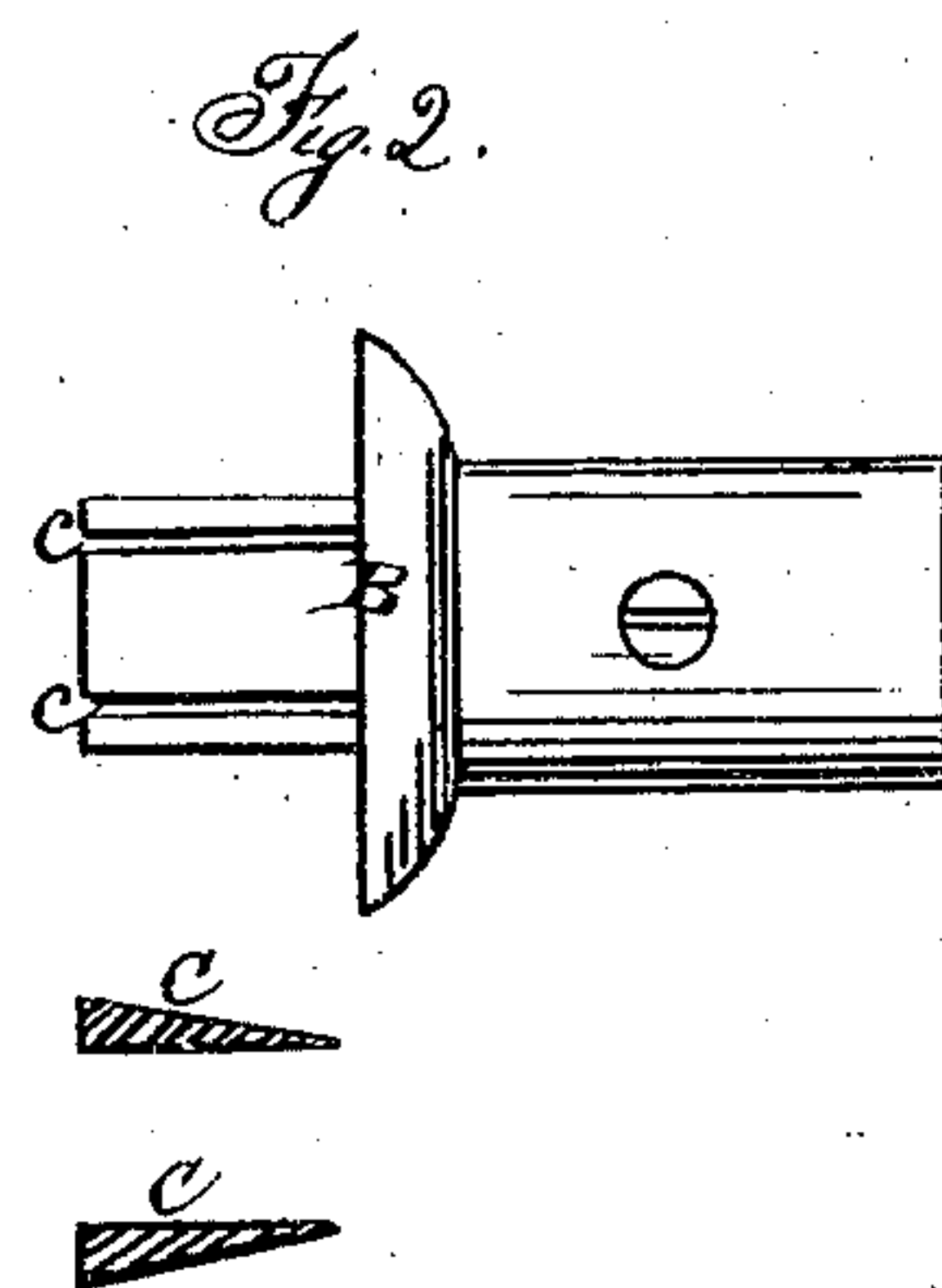
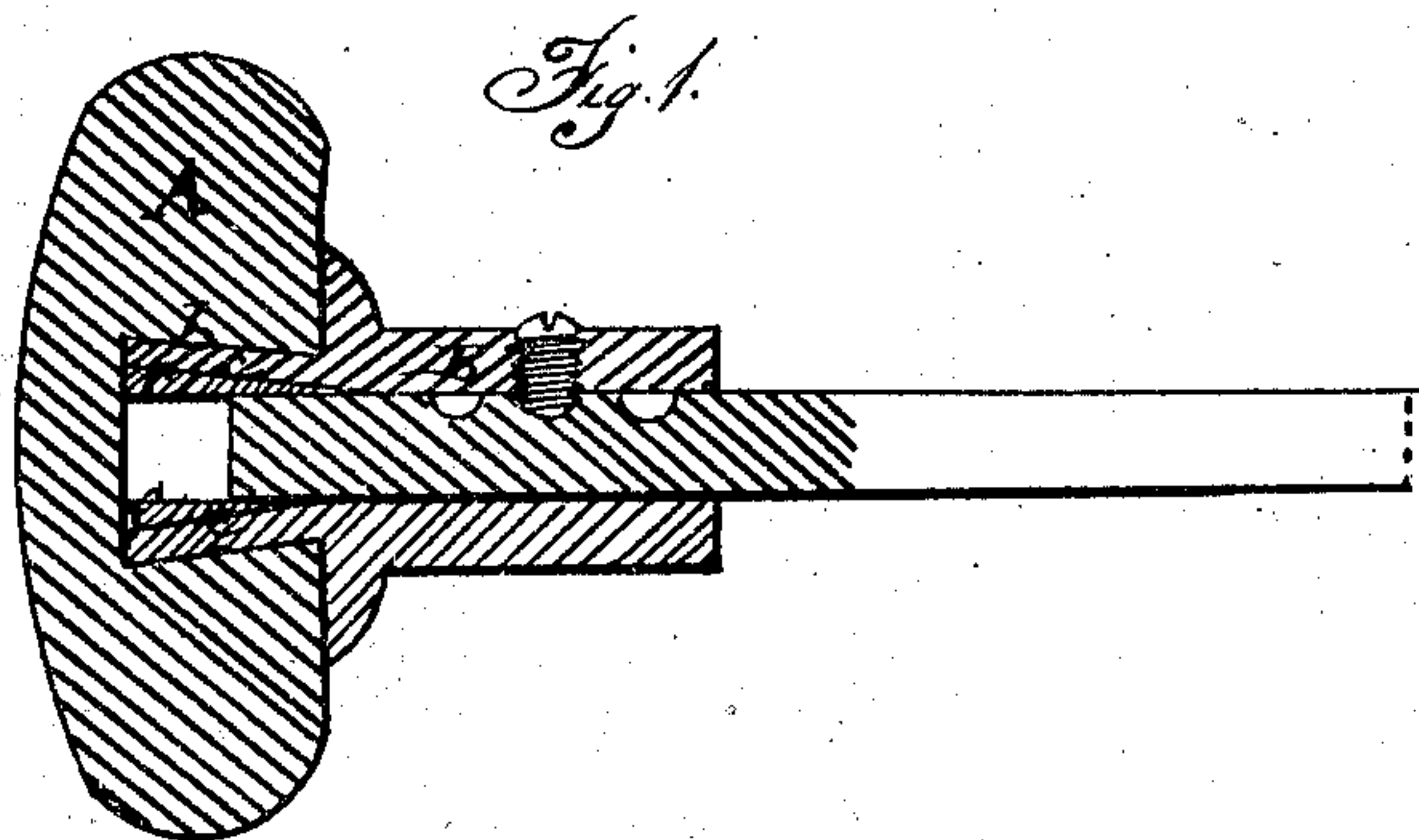


W. Boch.

Attaching Door-Knobs to Spindles.
N^o 75847

Patented Mar. 24, 1868



Witnesses
M. C. C. C.
A. C. C.

Inventor
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United States Patent Office.

WILLIAM BOCH, OF NEWTOWN, NEW YORK.

Letters Patent No. 75,847, dated March 24, 1868.

IMPROVEMENT IN ATTACHING DOOR-KNOBS TO SPINDLES.

The Schedule referred to in these Letters Patent and making part of the same.

TO ALL WHOM IT MAY CONCERN:

Be it known that I, WILLIAM BOCH, of Newtown, in the county of Queens, and State of New York, have invented a new and useful Improvement on Door-Knobs, of which the following is a full, clear, and exact description, reference being had to the accompanying drawing, forming part of this specification, and in which—

Figure 1 represents a longitudinal section of a door-knob, in part, constructed according to my improvement, and

Figure 2 a longitudinal view of the socket in which the spindle fits, with its securing wedges detached.

Similar letters of reference indicate corresponding parts.

This improvement relates to door-knobs in which the spindle is connected with the knob or knobs proper through the intervention of an independent socket or sockets made fast to the latter. Such is the ordinary construction, in which the handles or knobs proper are made of, say, porcelain, glass, or other equivalent material, and the socket to the knob, in which the spindle fits, and to which it is attached, is made of metal. In such constructions the ordinary mode of connecting the socket or sleeve with the knob proper, by cement or pouring in molten lead, is not only defective, as regards getting or working loose, by reason of the softness or flexibility of, say, the lead, but it curtails, to the extent of such filling, the adjustment of the spindle, usually made with two or three holes in it to receive a locking-screw, within or relatively to the one knob proper, to suit different thicknesses of door.

The object of this improvement is to remedy these defects, and the invention consists in a peculiar construction of the tubular socket or sleeve, and connection of the same with the handle or knob proper by a wedge or wedges, acting on the side or sides of the socket, to spread or expand them, and so produce the lock of the sleeve with the handle, with enlarged provision for adjustment of the spindle through the sleeve or socket of at least one handle.

Referring to the accompanying drawing, A represents the one handle of a door-knob, and which may be the knob proper, with which the spindle is usually connected by a locking-screw, fitting through the socket or sleeve, B, of said handle. Both handles or knobs proper may be similarly connected with their sleeves, but it will suffice here to refer to the removable handle of the door-knob, in which the spindle is or may be adjusted, said spindle being permanently attached, it may be, to the sleeve of the other handle. This knob proper, or handle, A, may be of porcelain, glass, or other suitable material, and its socket or sleeve B of metal, as also the spindle which fits therein, said socket entering an inwardly-expanding or swelled-out recess, *b*, in the handle A, but, instead of being secured therein by cement or molten metal, in the ordinary manner, which forms not only an insecure connection, but also, as applied to the removable handle, by filling up a portion of the interior of the socket, curtails the space for reception and adjustment of the spindle, I split or divide, as at *c*, on preferably two and opposite sides, though it might be only one, the inner end of said socket, or, in other words, give an elastic or wing-like character to said sides of the socket, so that, on fitting in wedges C between said wings and the sides of the socket lying at right angles thereto, and driving home the socket or the handle thereon, the back of the recess *b* will, by its action on the thick ends of the wedges, establish the lock of the socket with the handle, by spreading out its split sides to fill the swelled-out portions of the recess *b*.

By this construction, it will be seen, not only is a permanent and secure lock established for the sleeves with the handles of the door-knob, but a long and uninterrupted bearing obtained for the spindle through the sleeves into, it may be, the very handles themselves, the split sides of the socket and arrangement of the wedges not interfering with the passage of the spindle through the sockets, which advantage is the more conspicuous in case of the removable handle or knob proper, as it admits of a more varied or longer adjustment of the spindle relatively to the handle, to suit different thicknesses of doors, for, by it, the one locking-screw may be made to fit any one of a series of holes in the spindle, (shown in red lines,) within the range of the whole length of the sleeve or socket. This makes a door-knob more generally adaptable, or reduces the number of spindles of different lengths necessary to suit different thicknesses of doors, the utility and gain of which it is unnecessary to comment upon.

What is here claimed is—

The metallic socket B, constructed with split sides *c*, for the entrance of the wedges C, so arranged that its interior socket-formation remains the same, whilst its sides are forced outward by driving in the socket to form a rigid connection between it and the knob, substantially as shown and described for the purpose set forth.

WM. BOCH.

Witnesses:

J. W. COOMBS,

A. LE CLERC.