F. DAVIS.

DOOR-BOLT.

No. 190,561. Patented May 8, 1877.

fig. 1

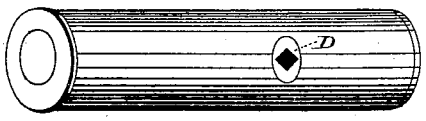


fig. 2

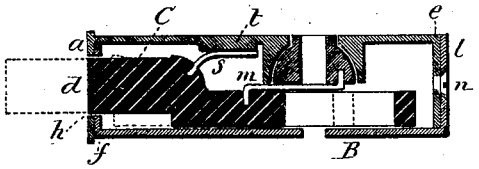


fig. 3

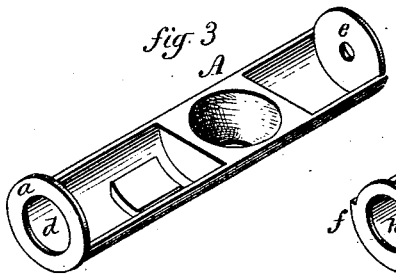
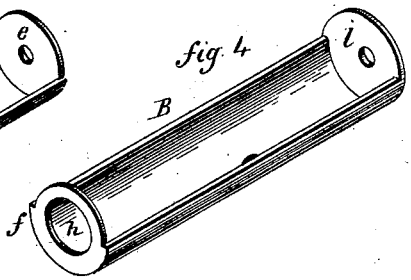


fig. 4



Witnesses.

J. H. Shumway

Clara Broughton.

Frank Davis Inventor.

By Atty.

John E. Earle

UNITED STATES PATENT OFFICE.

FRANK DAVIS, OF NORTH ADAMS, MASSACHUSETTS, ASSIGNOR OF ONE-HALF HIS RIGHT TO HOBART B. IVES, OF EAST HAVEN, CONNECTICUT.

IMPROVEMENT IN DOOR-BOLTS.

Specification forming part of Letters Patent No. **190,561**, dated May 8, 1877; application filed March 30, 1877.

To all whom it may concern:

Be it known that I, FRANK DAVIS, of North Adams, in the county of Berkshire and State of Massachusetts, have invented a new Improvement in Door-Bolts; and I do hereby declare the following, when taken in connection with the accompanying drawings and the letters of reference marked thereon, to be a full, clear, and exact description of the same, and which said drawings constitute a part of this specification, and represent, in—

Figure 1, a perspective view; Fig. 2, a longitudinal central section; and in Figs. 3 and 4, perspective views of the two parts of the case.

This invention relates to an improvement in that class of door-bolts which are constructed to be inserted into a round hole bored in the edge of the door, and operated by a knob on the surface of the door extending into the bolt-case; and it consists in the details of construction, as hereinafter described, and more particularly recited in the claim.

The case is composed of two half-cylinders, A B. The one part, A, is constructed with a full end, *a*, to form the face-plate. This has an opening, *d*, through which the bolt is to pass. At the other end there is a similar head, *e*, formed.

The other part, B, is constructed with a head, *f*, corresponding to the head *a*, and so as to set within it, with a perforation, *h*, corresponding to the perforation *d* in the other part. At the other end is a similar head, *l*, corresponding to the head *e* of the other part, and the two constructed so that the head *f* sets within the head *a* of the other, and the head *l* outside the head *e* of the other part, as seen in Fig. 2.

C, the bolt, is placed within the case, and so as to fit one side as a guide, its head passing through the perforations *h* and *d* in the head, and so as to work freely back and forth therein. This bolt prevents the separation of the two parts at that end. At the other end a screw, *n*, or other suitable device is provided to secure the case together.

Within the other part of the case the hub D is arranged in a suitable seat for the introduction of a square spindle-knob, by means of which the hub may be turned. The hub is attached to the bolt by a pitman, *m*, so that the hub operates after the manner of a crank, and when the knob is turned in one direction the bolt will be thrown out, as in broken lines, Fig. 2, and in the other direction will be drawn in.

To temporarily lock the bolt in either of its two positions a spring, *s*, is attached to the bolt by one end, its other end working over a lug, *t*, on the inner surface of the case, so that when drawn in the end of the spring will fall back of the lug, or when thrown out will fall forward of the lug, as seen in Fig. 2, the spring, however, yielding sufficiently for the moving of the bolt by the turning of the knob, but yet of sufficient strength to securely hold the bolt in either position.

I claim—

In a cylindrical bolt-case, the two parts A B, each formed with two heads, so as to set the one over the other, with a perforation through the two outer heads to guide the bolt, and thereby secure that end of the case, and a connection of the two parts at the other end, substantially as described.

FRANK DAVIS.

Witnesses:

JOHN E. EARLE,

CLARA BROUGHTON.