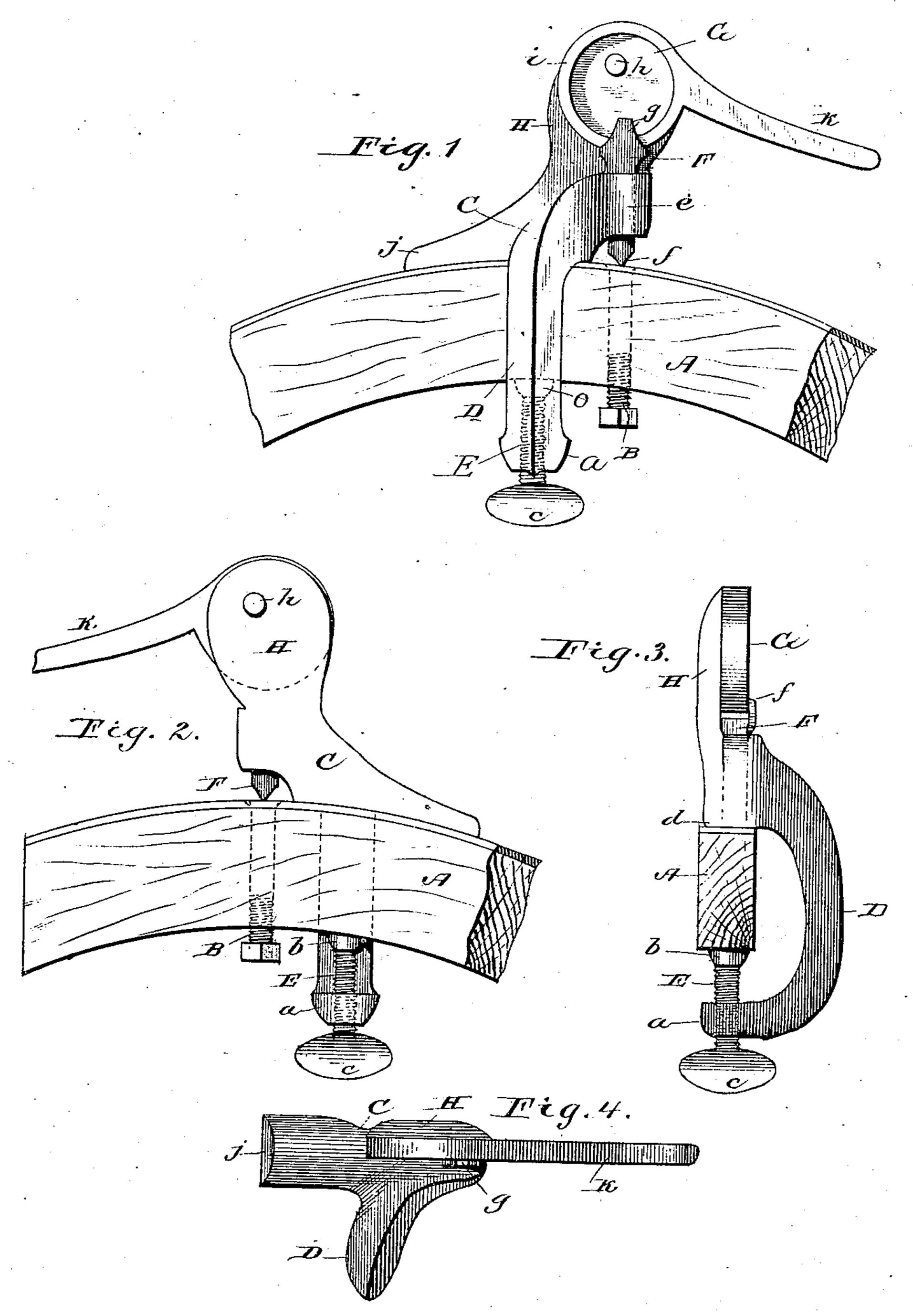
A. M. COLT. Bolt-Holder.

No. 226,836.

Patented April 27, 1880.



Attest. Allow, Michaeleson. A. M. cott.
Inventor.

By A.J. Affrica

United States Patent Office.

ALVA M. COLT, OF BATAVIA, NEW YORK.

BOLT-HOLDER.

SPECIFICATION forming part of Letters Patent No. 226,836, dated April 27, 1880.

Application filed January 26, 1880.

To all whom it may concern:

Be it known that I, ALVA M. COLT, a citizen of the United States, residing at Batavia, in the county of Genesee and State of New York, have invented certain new and useful Improvements in Bolt-Holders; 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 the art to which it appertains to make and use the same, reference being had to the accompanying drawings, and to letters or figures of reference marked thereon, which form a part of this specification.

This invention relates to mechanism for inserting bolts in wheels for securing the tires

thereupon.

The invention more particularly relates to a clamp adapted to be removably fastened upon the rim, and provided with a plunger operated by a cam or eccentric lever to drive such plunger down upon the bolt-head to force the bolt through the hole therefor made in the tire and felly, and hold said bolt against turning while the nut is being screwed into place against the face of the felly.

In the drawings illustrating my invention, in which similar parts are correspondingly designated in the several figures, Figure 1 is a front elevation of my device applied upon a portion of a wheel. Fig. 2 is a rear elevation of the same; Fig. 3, an edge or end elevation of the same, and Fig. 4 a top-plan view.

A may represent a portion of a tire and felly, and B a screw-bolt for connecting the

35 two in place in its hole.

C is a metal frame having projecting lip j and a depending arm, D. This arm has a substantially right-angular projection, a, carrying a screw, E, which latter has a swivel button or disk, b, on its upper end, and a thumb-piece, c, at its lower end, by which thumb-piece the screw is operated to secure the device by compression upon a wheel's rim, the projection a having a threaded orifice to receive the said screw.

The upper inner surface, d, or arm D is flattened, as shown, to afford, in conjunction with the lip j, a level bearing-surface, between which and the disk b the rim of the wheel is clamped

by the movement of the screw, as clearly in- 50 dicated in Fig. 3.

The arm D is sufficiently large to adapt it to be applied to rims of various thicknesses.

In the frame C, forward of the clamping devices just described, is a vertical socket, e, in 55 which is arranged a plunger, F, having a pointed lower end, f, and a right-angular upper lip, g.

G is an eccentric or cam, pivoted at h to a portion, H, of the frame C, and having a right- 60 angular flange, i, and a lever or handle, k, the eccentric and its handle k constituting an eccentric or cam lever with its fulcrum at the pivot h

pivot h.

The lip g of the plunger F engages with the 65 flange i of the eccentric lever, whereby said plunger is adapted to be operated by the said eccentric lever.

It will be noticed that the point of engagement of the plunger F with the lever is out 70 of line with the fulcrum of the said lever; hence said lever will not be moved by any upward pressure of the said plunger, but will hold said plunger at any point upon the periphery of its eccentric.

The operation is as follows: The device having been applied to the rim of the wheel by means of its clamp, before described, so that the plunger shall stand directly over the bolt, and the bolt having been previously inserted 80 in its hole and forced down through the felly, the lever is depressed, carrying down the plunger upon the bolt-head and forcing the bolt tightly into place. The lever then automatically locks itself and the plunger upon 85 the bolt-head, and the point of the plunger is so tightly pressed against the said bolt-head that in the subsequent operation of turning up the bolt-nut the bolt is not and cannot be turned, so that the operation of inserting and 90 securing the bolts is greatly facilitated.

Having thus described my invention, what I claim is—

1. A device for holding a bolt to the rim of a wheel while the nut is being turned to its 95 place, consisting of a frame, a clamp-arm, a clamp-screw, a plunger, and an operating eccentric lever, substantially as described.

2. An eccentric lever having a plunger attached thereto, in combination with a clamparm, a frame, and a clamp-screw, substantially as shown and described.

3. The combination of a frame, C, having a lip, j, with the clamping devices and bolt-holding devices, substantially as shown and described.

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

ALVA M. COLT.

Witnesses:
HENRY EASTON,
EUGENE KING.