

E. GUERRERO.
BELT-COUPLING.

No. 186,128.

Patented Jan. 9, 1877.

Fig. 1.

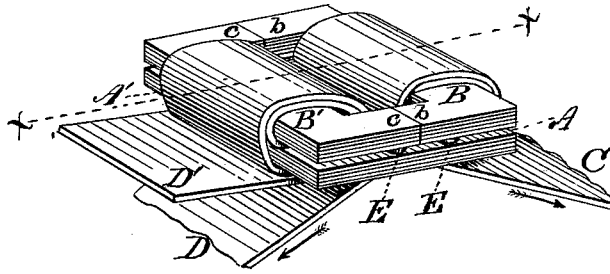


Fig. 2.

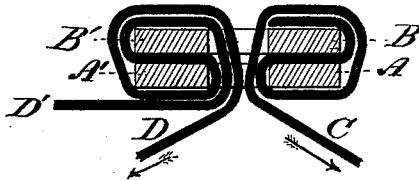
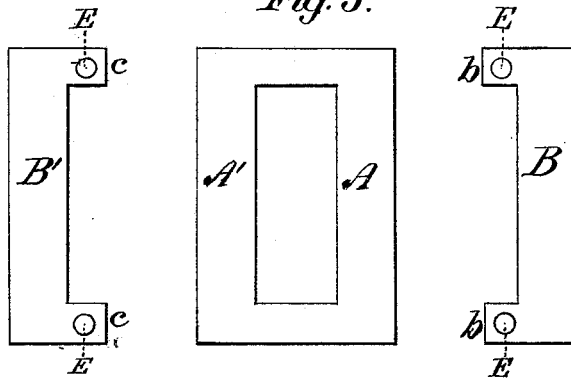


Fig. 3.



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ENRIQUE GUERRERO, OF HAVANA, ISLAND OF CUBA.

IMPROVEMENT IN BELT-COUPPLINGS.

Specification forming part of Letters Patent No. **186,128**, dated January 9, 1877; application filed December 26, 1876.

To all whom it may concern:

Be it known that I, ENRIQUE GUERRERO, of the city of Havana, in the Island of Cuba, have invented a new and Improved Belt-Coupling; and I do hereby declare that the following is a full and exact description of the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon.

The object of my invention is to produce a simple, inexpensive, and efficacious belt-coupling.

In the accompanying drawings, Figure 1 is a perspective view of my improved belt-coupling. Fig. 2 is a transverse section of the same in the line *xx* of Fig. 1. Fig. 3 is a plan view of the several parts of my coupling in detail, showing the under side of the key-pieces B B' and the bosses E E.

My belt-coupling consists of a metal frame, A A', and two key-pieces, B B', which key-pieces, being superimposed on the frame so that the ends *b b* and *c c* come in contact with each other, form a secondary frame of the same size and shape as the frame A A'. If deemed preferable, these key-pieces may be cast in one piece. Upon the under side of the key piece or pieces may be cast bosses E E, projecting from the face thereof a little less than the thickness of the belt designed to be coupled; or the side bars B B' of the key-pieces may be made thinner than the ends *b b* and *c c* thereof; or, in lieu of the end pieces *b b* and *c c*, there may be formed on the ends of the side bars B B' of the key-pieces ears, projecting downward, and overlapping the ends of the side bars A A' of the frame, or entering slots or eyes provided therein for their reception; or these several devices may be entirely dispensed with and the key-pieces made to consist simply of two side bars. C and D, Figs. 1 and 2, represent the ends of a belt coupled by my improved device. The end C is passed upward through the openings in the frame and the key-pieces; thence over the top of the side bar B of the key-piece; thence downward and under the side bar A of the frame; thence again upward through the opening in the frame, and between the inner face of the side bar A and the former turn of the belt; thence between the upper face of the side bar A and

the under face of the side bar B; thence around the outer and upper faces of the side bar B, and under the first turn of the band, until the end comes flush with the inner face of the side bar B of the key-piece, Fig. 2. The end D, by a series of similar convolutions in the reverse direction, is looped around the side bar A' of the frame and the side bar B' of the key-piece, and, finally, passed down through the openings in the key-piece and the frame, and out under the frame, and left to project slightly, as indicated by D'. The strain upon the belt, being exerted in the opposed directions, (indicated by the arrows in Figs. 1 and 2,) will cause the several parts of the coupling to firmly clamp and gripe the belt, and the greater the strain exerted the firmer will be the gripe.

When the belt becomes slack from use, or it is desired from any cause to shorten it, it is only necessary to draw on the projecting end D', and to ease the belt around the frame and key-piece until the desired length is attained.

In practice, the openings in the frame and key-piece should be of a width but very little greater than the thickness of the belt multiplied by the number of times it has to be passed through the openings. In this way a smooth joint is formed on the under side of the belt, which will pass around any shaft or drum without hitching.

Having thus described my improved belt-coupling, what I claim therein as my invention, and desire to secure by Letters Patent, is—

1. The combination of the frame A A' and key-piece or key-pieces B B', adapted to receive and hold the belt C D, substantially in the manner and for the purpose herein set forth.

2. The combination of the belt C D with the frame A A' and key-piece or key-pieces B B', substantially in the manner and for the purpose herein set forth.

This specification signed and witnessed this 26th day of December, 1876.

ENRIQUE GUERRERO.

Witnesses:

C. I. PRILLIN,
JOSÉ M. MACIAS.