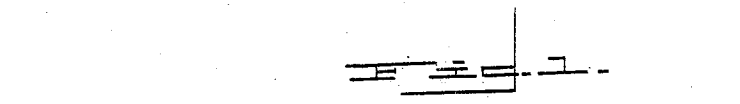
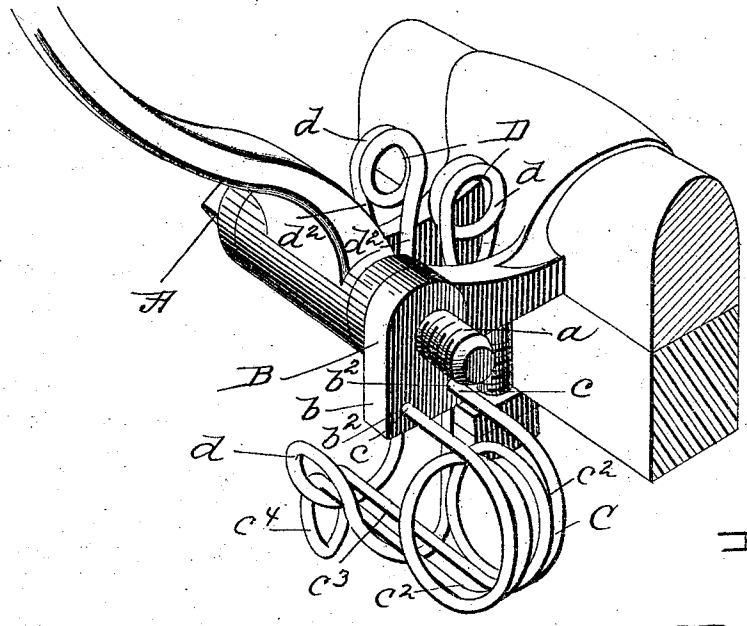
(No Model.)

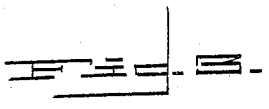
# G. H. PERRY.

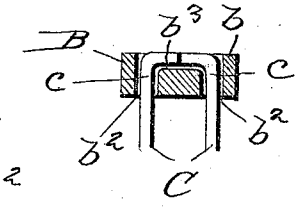
## THILL COUPLING.

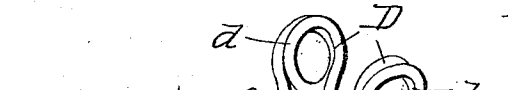
No. 502,989. Patented Aug. 8, 1893.










WITNESSES:

W. N. Pumphrey.

B. F. Thornett.

INVENTOR

George H. Perry

BY

Evert & Appleman

ATTORNEYS

# UNITED STATES PATENT OFFICE.

GEORGE H. PERRY, OF FRANKLIN, TENNESSEE.

## THILL-COUPLING.

SPECIFICATION forming part of Letters Patent No. 502,989, dated August 8, 1893.

Application filed December 14, 1892. Serial No. 455,158. (No model.)

*To all whom it may concern:*

Be it known that I, GEORGE H. PERRY, a citizen of the United States of America, residing at Franklin, in the county of Williamson and State of Tennessee, have invented certain new and useful Improvements in Thill-Couplings, of which the following is a specification, reference being had to the accompanying drawings.

This invention relates to improvements in thill couplings, particularly to that class known as anti-rattlers, the object of the invention being to present a novel form of device embodying certain new and useful improvements over that of my former patent, No. 465,726, dated December 22, 1891, as follows, whereby the said device may be readily and conveniently applied to the ordinary coupling bolt; furthermore, whereby the said device securely locks the nut on the said coupling bolt, and finally the object of the invention is to reduce the cost of manufacture, simplify the construction and employ such novel features, whereby the said device shall be wholly independent of the coupling proper.

With these objects in view the invention consists in various novel details, arrangements and combinations of parts to be hereinafter more fully set forth.

In describing the invention in detail reference is had to the accompanying drawings forming part of this specification wherein like letters of reference indicate corresponding parts in the several views, in which—

Figure 1 is a view in perspective of one form of device embodying my improvements. Fig. 2 is a detail view in perspective of the springs detached, and Fig. 3 is a detail horizontal sectional view of the securing nut, showing the manner of securing the springs therein.

In these drawings:—A, indicates the bolt formed at one end with the usual threaded portions *a*, and engaging these threads is a nut B, having an extended side *b* formed with apertures $b^2$ for the reception of the ends *c c* of the securing spring C, the said ends being bent inwardly and into the groove $b^3$, as shown in Fig. 3. This spring C, comprises the fixed ends *c c*, the coils $c^2$ $c^2$, and the pressure arm $c^3$ having the downwardly turned end loop $c^4$ interlocking with the oppositely bent looper termination *d* of the depending arms $d^3$ of the anti-rattler spring D. This anti-rattler spring D is provided with coiled portions *d d*, and curved spring arms $d^2$ $d^2$, engaging the coupling proper. Thus it will be at once obvious that the function of the spring C, is to exert a downward pressure on the anti-rattler spring which results in effecting a continuous spring pressure on the coupling to entirely prevent rattling.

Having fully described my invention, what I claim, and desire to secure by Letters Patent, is—

1. In a thill coupling, the combination with a thill and axle clip, of the threaded bolt, the nut on the bolt having an extended portion apertured to receive the ends of the spring C, the said spring comprising the bent up ends *c*, *c*, the coils $c^3$, $c^2$, the pressure arm $c^3$, and the downwardly bent loop $c^4$, engaging the anti-rattler spring D, as specified.

2. In a thill coupling, the combination with the thill and axle clip, the threaded bolt, the removably secured nut engaging the threaded bolt and apertured and grooved to receive the bent up ends of the spring C, the anti-rattler spring D, and the interlocking loops $c^4$, *d*, of said springs C, D, as specified.

3. In a thill coupling the combination with the thill and axle clip, of the bolt and nut, the latter being apertured and grooved to receive the bent up ends of the spring C, the anti-rattler spring D, and the interlocking loops $c^4$, *d*, as specified.

4. In a thill coupling, the combination with the thill and axle clip, of the threaded bolt, the nut engaging the threads and being provided with a recessed extension, as specified.

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

GEORGE H. PERRY.

Witnesses:
L. W. BUFORD,
A. J. PARKER.