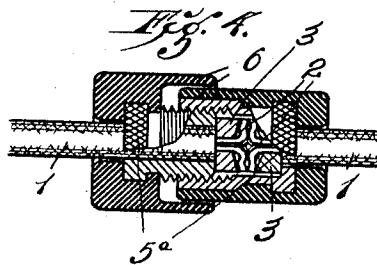
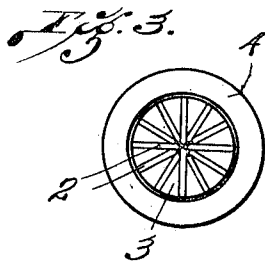
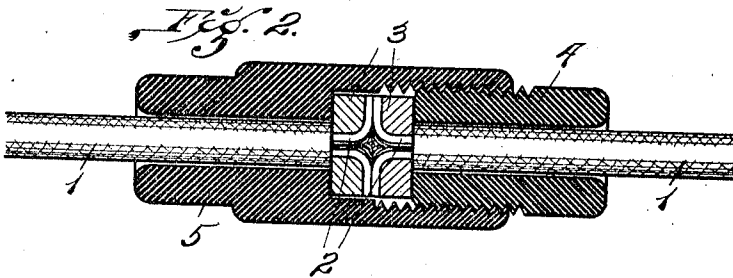
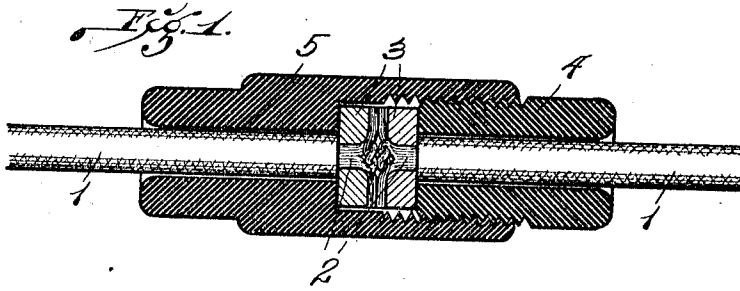


O. THIEME.
 TERMINAL CONNECTION.
 APPLICATION FILED OCT. 28, 1909.

974,449.

Patented Nov. 1, 1910.



Witnesses:

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UNITED STATES PATENT OFFICE.

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TERMINAL CONNECTION.

974,449.

Specification of Letters Patent.

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To all whom it may concern:

Be it known that I, OTTO THIEME, a citizen of the United States, residing at St. Louis, Missouri, have invented a certain new and useful Improvement in Terminal Connections, of which the following is a full, clear, and exact description, 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, forming part of this specification, in which—

Figure 1 is a sectional view through my improved terminal connection. Fig. 2 is a similar view of a modified form. Fig. 3 is an end elevational view of the construction shown in Fig. 2. Fig. 4 is another modified form.

This invention relates to a new and useful improvement in terminal connections for electrical conductors, the object being to construct a device of the character described in such manner that it will be cheaply and easily made, and quickly assembled and taken apart, in connecting and disconnecting the terminals of electrical conductors.

In the drawings, 1 indicates the usual insulation on the conductors 2, said conductors being composed of strands, as is well known. The insulation is stripped from the ends of the conductors, and washers 3 are strung on said stripped portion, after which the strands constituting the conductors 2 are preferably twisted and tied in the form of a knot, as shown, their ends being spread out fan-like over the faces of the washers.

A universal coupling connection, preferably made of insulation, and consisting of a threaded male portion 4 and a threaded female portion 5, is employed to clamp the ends of the conductors together. These insulation pieces are provided with shoulders behind the washers 3, and when in position and assembled, protect the coupling against moisture and from being dangerous.

To uncouple the parts shown in Fig. 1, it is only necessary to unscrew the universal insulation clamping members, slipping said parts lengthwise the insulated conductor. The washers can, of course, be separated one from the other and the connection broken.

In Fig. 2, I have shown the same arrangement, except that instead of knotting the

strands of the electrical conductor, said strands are bent outwardly over the faces of the washers, as shown in Fig. 3. This connection is designed particularly for heavy electrical conductors.

In Fig. 4, I have shown a modified form, in which the universal clamping nuts 5^a are made up of metal so as to constitute an additional electrical connecting medium. This metal is cast in insulation protecting parts 6, which, as shown, are unthreaded, but are designed to telescope one within the other.

If desired, the universal nuts in all the forms of my invention can be non-circular in cross section, that is, can be square or hexagonal, for the purpose of cooperation with an ordinary monkey-wrench, whereby the parts can be tightened or loosened; or the parts can be provided with openings or pins for cooperation with a spanner.

The ends of the strands of the cable which pass through a washer, are preferably free, so that they may move slightly. This is desirable in making electrical connection, because the strands can be displaced or separated to accommodate the complementary strands, and in this way a close physical contact can be made by which a good electrical contact results. Because of this, I prefer not to use solder in my terminal connection, although solder may be employed at other points, if desired.

What I claim is:

In a terminal connection, the combination of the terminal ends of an electrical conductor composed of a strand of wire coated with insulation as usual, threaded insulation pieces designed to cooperate with each other to clamp the strands together, washers arranged upon the ends of the conductors to be electrically connected, the ends of said strands being bent over the outer faces of said washers in such manner as to have slight play in adjusting themselves to the complementary parts when a connection is made.

In testimony whereof I hereunto affix my signature in the presence of two witnesses, this 21st day of October, 1909.

OTTO THIEME

Witnesses:

M. P. SMITH,
B. S. PAISLEY.