

E. E. SCHMID.
STRAIN INSULATOR.
APPLICATION FILED DEC. 27, 1910.

Patented Dec. 10, 1912.

1,046,868.

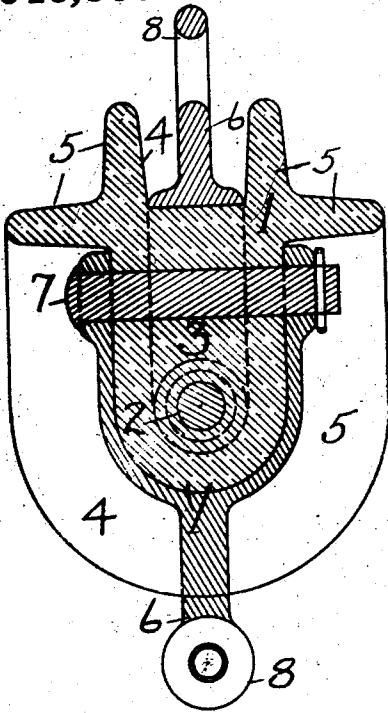


FIG. 1.

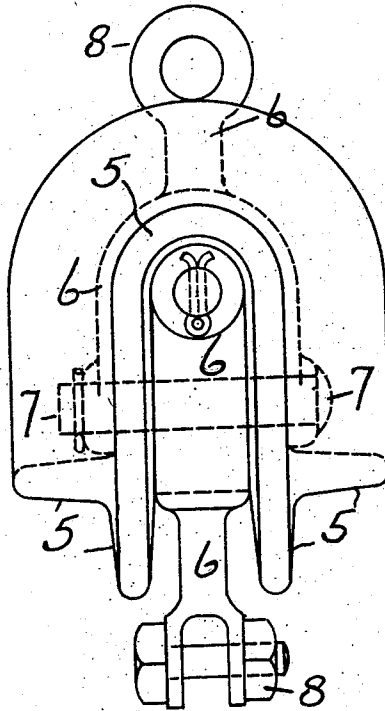


FIG. 2.

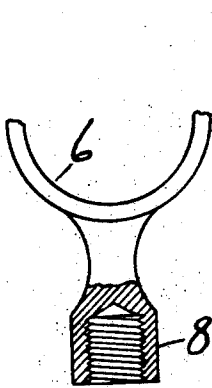


FIG. 4.

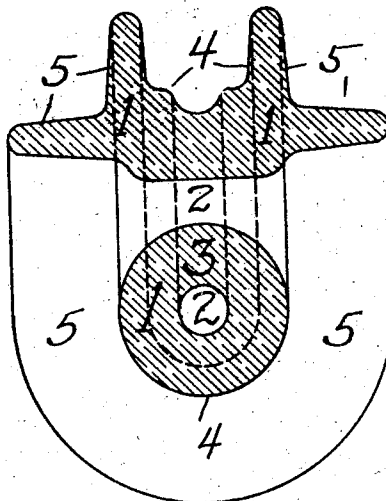


FIG. 3.

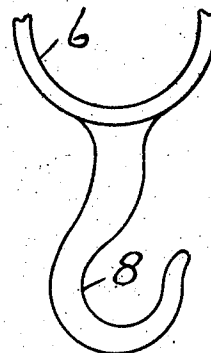


FIG. 5.

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UNITED STATES PATENT OFFICE.

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STRAIN-INSULATOR.

1,046,868.

Specification of Letters Patent.

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To all whom it may concern:

Be it known that I, ERNEST EMMEL SCHMID, a citizen of the United States of America, residing in the borough of Manhattan, city, county, and State of New York, have invented a certain new and useful Improvement in Strain-Insulators, of which the following is a specification.

My invention relates to strain insulators in which the insulating material is held under compression and more particularly to the class used on high tension transmission lines requiring a large surface insulation between the conductors or metal parts, and has for its object the production of a cheap and durable device so shaped that equal surface insulation is between the metal parts throughout.

A further object is to provide an insulator which can be used with strands or assembled with stirrups provided with any desired terminal.

The foregoing and other features of my invention will now be described in connection with the accompanying one sheet of drawings, forming part of this specification, in which I have represented the insulator in its preferred forms, after which I shall point out more particularly in the claims those features which I believe to be new and of my own invention.

Figure 1, is a sectional elevation of my insulator provided with the assembled stirrups, the said section is taken on the central vertical line and at right angles to view shown in Fig. 2. Fig. 2, is elevation at right angles to that shown in Fig. 1. Fig. 3, is a sectional elevation showing my insulator same as Fig. 1 only used without the stirrups and used with the strands the preferred form. Figs. 4 and 5, show details of the terminal ends of the stirrups which I employ.

In my invention I employ an insulator 1, made of porcelain or any other material having electrical insulating properties, provided with holes 2 at right angles to each other, these holes are separated by a wall 3. Both ends of each of the holes are connected by a channel or saddle 4, provided with extending flanges and because the saddles are at right angles to each other, a continuous

angular flange 5, is formed as will be readily understood by referring to Figs. 1, 2, and 3. When this insulator is used with strands they are passed through the holes 2 and shackled in a noose or loop; when any strain is put upon the strands, the part 3 of the insulator 1 is under compression. It is well known in the art that porcelain and other molded compounds are stronger under compression. The strands lie in the saddle 4 and are separated from each other by the insulating wall 3 and the large surface presented by the angular flange 5 as will be readily understood. The insulating surface is the same between the strands throughout its entire length.

If metal hooks or other fastenings are preferred for this insulator, I provide a stirrup 6 having a slip bolt 7 adapted to ride in the saddle 4, the bolt engaging the hole 2. These stirrups may have any shape terminal 8 as indicated in Figs. 4 and 5, for example.

I wish it distinctly understood that my strain insulator herein illustrated and described is in the form which I desire to construct it, and that any changes or variations may be made without departing from the salient features of my invention and I therefore intend the following claims to cover such modifications as naturally fall within the lines of invention.

I claim:

1. A strain insulator adapted to receive two interlocking conductors at right angles to each other and provided with a continuous angular flange following the intersecting contour of the conductors, one side of the said angular flange being parallel to the horizontal axis the other side of the angular flange being parallel to the vertical axis throughout.

2. A strain insulator made of insulating material adapted to receive two interlocking strands at right angles to each other and provided with a continuous right-angular flange, extending between the two strands, of equal cross-section throughout its entire length.

3. A strain insulator made of an insulating material provided with saddles at right angles to each other adapted to receive inter-

locking strands, said saddles forming a continuous angular flange projecting beyond the saddles, one side of the angular flange being parallel to the horizontal axis and the
5 other side of the angular flange being parallel to the vertical axis.

This specification signed and witnessed,

at Room 1312, West Street Bldg., in the city of New York, this 24th day of October, A. D. 1910.

ERNEST EMMEL SCHMID.

In the presence of—

EDWD. VAN WINKLE,
MARIE E. McLEAN.