

UNITED STATES PATENT OFFICE.

MALCOLM CARY WILLIAMS, OF KANSAS CITY, MISSOURI.

CABLE-SUSPENSION DEVICE.

No. 870,002.

Specification of Letters Patent.

Patented Nov. 5, 1907.

Application filed October 3, 1906. Serial No. 337,220.

To all whom it may concern:

Be it known that I, MALCOLM CARY WILLIAMS, a citizen of the United States, and a resident of Kansas City, in the county of Jackson and State of Missouri, have invented a new and useful Improvement in Cable-Suspension Devices, of which the following is a specification.

My invention relates to devices for suspending cables,—for example, telephone cables,—from span-wires, and the object of my invention is to produce a simple and efficient suspension device which may be attached to and removed from span-wires without requiring the use of special tools.

One embodiment of my invention is illustrated in the drawings which accompany and form a part of this specification, in which

Figure 1 is a perspective view of my cable suspension device as employed in practice, and Fig. 2 is a perspective view of said suspension device turned through an angle of about 180 degrees from the position shown in Fig. 1.

In the figures A represents a span-wire of the usual type, which is suspended between two supporting poles.

B represents my cable suspension device, and C represents any suitable means, such as a loop of tarred rope, for supporting the cable D to the suspension device B.

As shown, my cable suspension device is formed of a single piece of resilient preferably galvanized iron or steel wire bent at one end to form a loop, the two portions *b* and *c* of which are in the same plane, and the end portion *a* of which extends upwardly and is disposed angularly to said plane. The portion *c* is continued into an outwardly extending portion *d* formed by bending the wire outward and backward so as to form a thumb-piece *d* extending substantially in a plane at right angles to the plane of the portion *b c*. The thumb-piece *d* is continued into the ring portion *e*, which as shown, has its plane substantially at right angles to the plane of the portion *b c*.

In order to attach the cable suspension device to the span-wire, the operator grasps said device by the ring *e* and thumb-piece *d* and holding the same with the plane of the loop *b c* parallel to the axis of the span-wire, as shown at A' in Fig. 2, presses the device against the span-wire, so that the latter is squeezed between the lower end *f* of the loop and the upper portion of the thumb-piece *d*, and after the span-wire has been snapped under the above mentioned portion *f*, the device is lowered and tilted to the left, so that the span-wire clears the upper end of the portion *a*, whereupon the operator

turns the device at right angles to its original position, so that the plane of the loop *b c* is now at right angles to the axis of the span-wire, as shown at A'' in Fig. 2. The cable suspension device now being locked upon the span-wire, cannot be removed therefrom by the motions to which the cable D is subjected, but can only be removed by performing in reverse order the above mentioned operations whereby the same was secured to the span-wire.

It will thus be seen that I have provided a very simple and inexpensive device for suspending cables from span-wires, and that no special tool is required either for attaching the device to, or removing the same from, the span-wire, in contra-distinction to devices heretofore employed, in which the suspension device generally is provided with a hook which passes over the span-wire and which must be bent around the same by means of pliers or other tools.

It will be understood that although the device herein described has given good results in practice and is in fact the preferred form of my invention, nevertheless many modifications may be made therein without departing from the principle of my invention, and therefore I do not wish to limit myself to the exact form of apparatus herein disclosed, but

What I claim and desire to secure by Letters Patent is:

1. A cable suspension device consisting of a single piece of resilient wire provided at one end with a loop whereby said device may be attached to a span-wire, said loop having an upwardly-extending end portion angularly disposed to the plane thereof, and means for supporting a cable therefrom.

2. A cable suspension device consisting of a single piece of resilient wire provided at one end with a loop whereby said device may be attached to a span-wire, said loop having an upwardly-extending end portion angularly-disposed to the plane thereof, and provided at the other end with a ring having its plane substantially at right angles to the plane of said loop.

3. A cable suspension device consisting of a single piece of resilient wire provided at one end with a loop, said loop being continued into an outwardly extending portion lying in a plane substantially at right angles to the plane of said loop, and the lower portion of said loop and said outwardly extending portion forming an entrance to said loop which is smaller than the diameter of the span-wire to which said device is to be applied, whereby said device may be snapped onto said span-wire and then turned at right angles thereto for locking the same to said span-wire, and means for supporting a cable from said device.

In testimony whereof, I have hereunto subscribed my name this 25th day of Sept. 1906.

MALCOLM CARY WILLIAMS.

Witnesses:

L. L. LEISHER,
A. BARRETT.