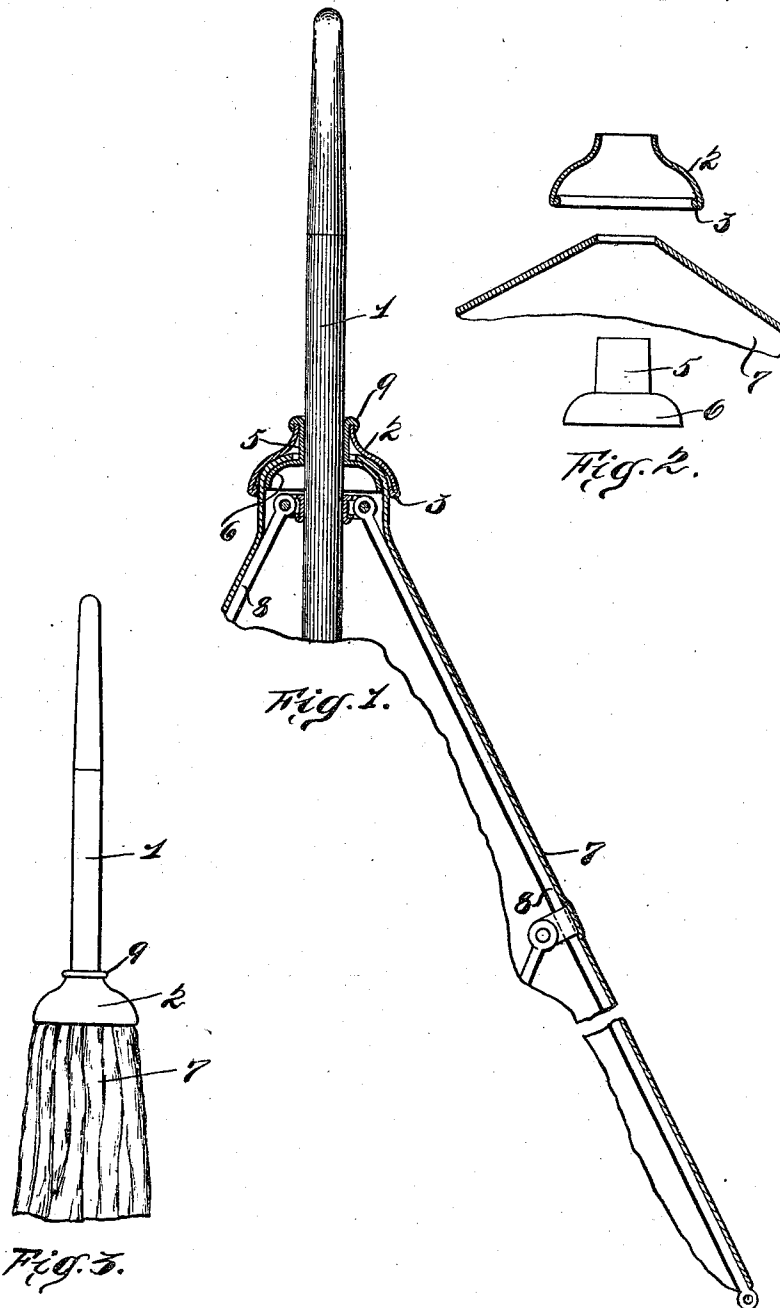


C. RABER & G. GUNDLACH.
FABRIC CLAMP FOR UMBRELLAS.
APPLICATION FILED NOV. 10, 1910.

989,416.

Patented Apr. 11, 1911.



Witnesses:
C. A. Jarvis
Mabel Dittenhoefer

Inventors
George Gundlach
Charles Raber
by *Warren Wright*
attorney.

UNITED STATES PATENT OFFICE.

CHARLES RABER AND GEORGE GUNDLACH, OF NEW YORK, N. Y.

FABRIC-CLAMP FOR UMBRELLAS.

989,416.

Specification of Letters Patent.

Patented Apr. 11, 1911.

Application filed November 10, 1910. Serial No. 591,711.

To all whom it may concern:

Be it known that we, CHARLES RABER and GEORGE GUNDLACH, citizens of the United States, residing at Brooklyn, city and State of New York, have invented certain new and useful Improvements in Fabric-Clamps for Umbrellas, of which the following is a clear, full, and exact description.

The object of this invention is to provide a clamp for securing the fabric at the apex of an umbrella to the rod in order to provide a neater, more compact and more attractive fastening, to reduce the cost of the same, and to do away with stitching the fabric in place as is commonly done today.

In carrying out our invention, we provide a pair of dish or cup shaped ferrules or disks, one adapted to fit within the other, the outer preferably provided with a turned-over rim in order to prevent tear or wear on the cloth. Between these two ferrules we locate the fabric of the umbrella at the apex, clamping the same tightly between the two ferrules by upsetting the hub of the inner dish-shaped ferrule over the outer ferrule. These two ferrules are then forced by pressure over the rod of the umbrella, where they may be fastened in any manner known to the art. We prefer that they be wedged in place and held by the adhesion of the metal of the inner ferrule against the umbrella rod.

The scope of our invention will be pointed out in the claim.

In the accompanying drawing, Figure 1 is a transverse central section of a part of an umbrella showing the application of our improved invention thereto. Fig. 2 is a view of the outer ferrule in section, below which is shown the cloth, and immediately below which is shown the inner ferrule all in section before being secured one to the other. Fig. 3 is a view of our device in side elevation, as applied to an umbrella, only part of the umbrella being shown in such view.

As shown in the accompanying drawing, we provide a dish-shaped ferrule 2, preferably having an ornamental outer surface, and having its lower rim 3 turned over to

produce a rounded edge. We provide an inner ferrule 6 having a flanged skirt and a hub portion 5. The fabric 7 is placed in position between the two ferrules, and the hub 5 of the inner ferrule forced through the apex of the fabric, so that the skirt of the inner ferrule will pull the fabric into the dish-shaped recess of the outer ferrule, and hold it in place. We then upset that part of the hub extending through the outer ferrule, so as to make a permanent clamp upon the fabric. This ferrule 6 is turned over as indicated at 9 in the drawing. We then insert the whole over the end of the umbrella rod 1, which should be of greater diameter than the interior of the hub, and by proper mechanism force the same down in the desired position on the rod. As the fabric is fast to the clamp thus formed, and as the outer end of the fabric in the umbrella is fast to the rib 8, pull on the ferrule tends at all times to hold it in place in addition to its adhesive grip upon the rod.

We claim as our invention:

The herein described fabric holding clamp for umbrellas and the like, consisting of the umbrella rod, its ribs, its fabric covering, said fabric covering having a circular opening through which the rod protrudes, an inner ferrule having a hub and a flared skirt at the lower end of the hub, the hub adapted to be passed through the fabric, an outer ferrule of greater diameter than the inner ferrule, having flared sides and a contracted neck, the lower ends of the flared sides having the metal thereof overturned inwardly and resting below the lower edge of the inner ferrule, the hub of the inner ferrule being turned over and forced down upon the outer ferrule at its restricted orifice to firmly clamp the fabric therebetween, substantially as shown and described.

Signed at New York city, New York, this 9th day of November 1910.

CHARLES RABER.
GEO. GUNDLACH.

Witnesses:

MABEL DITTENHOEFER,
ALBERT H. T. BANZLEAF.