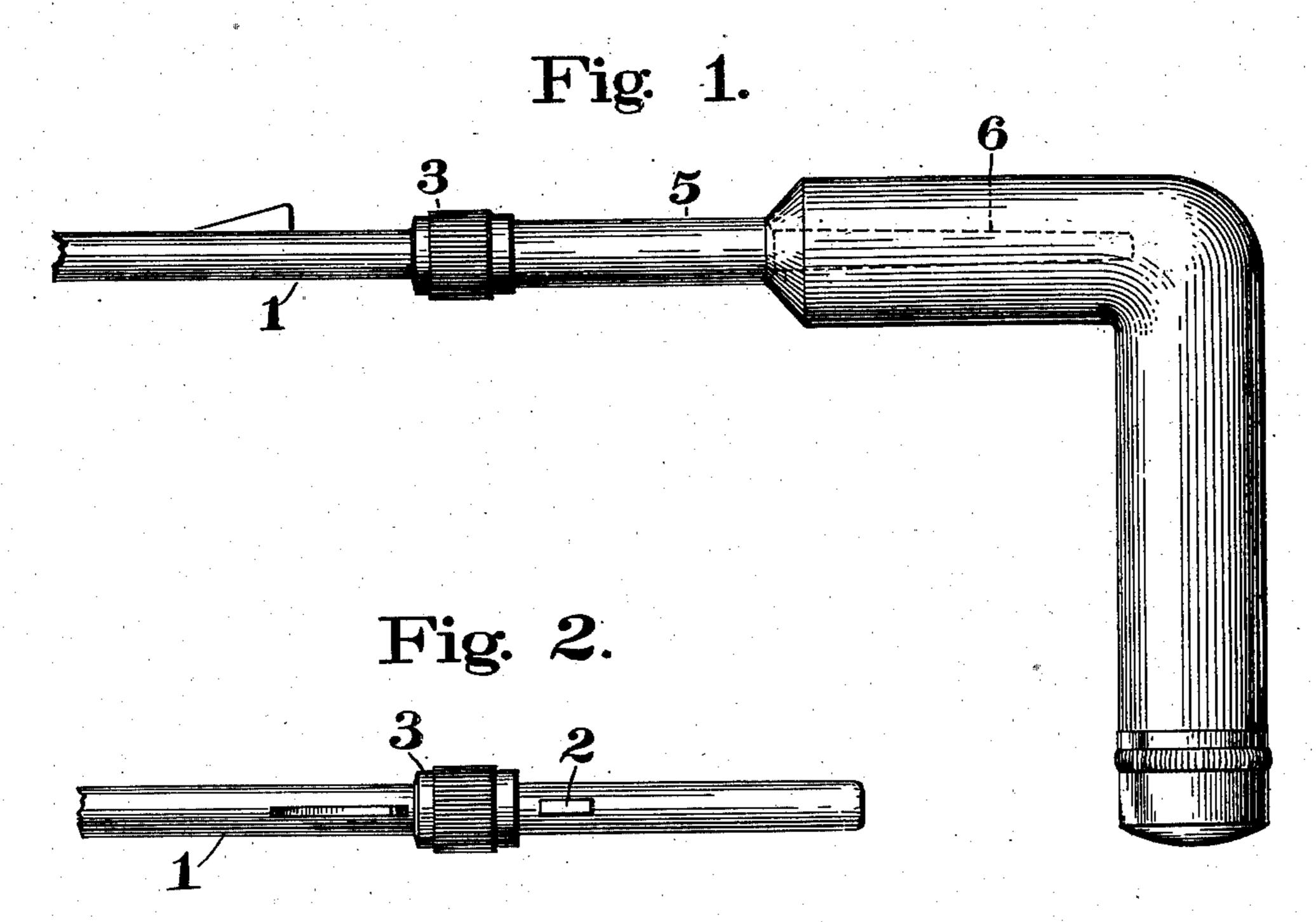
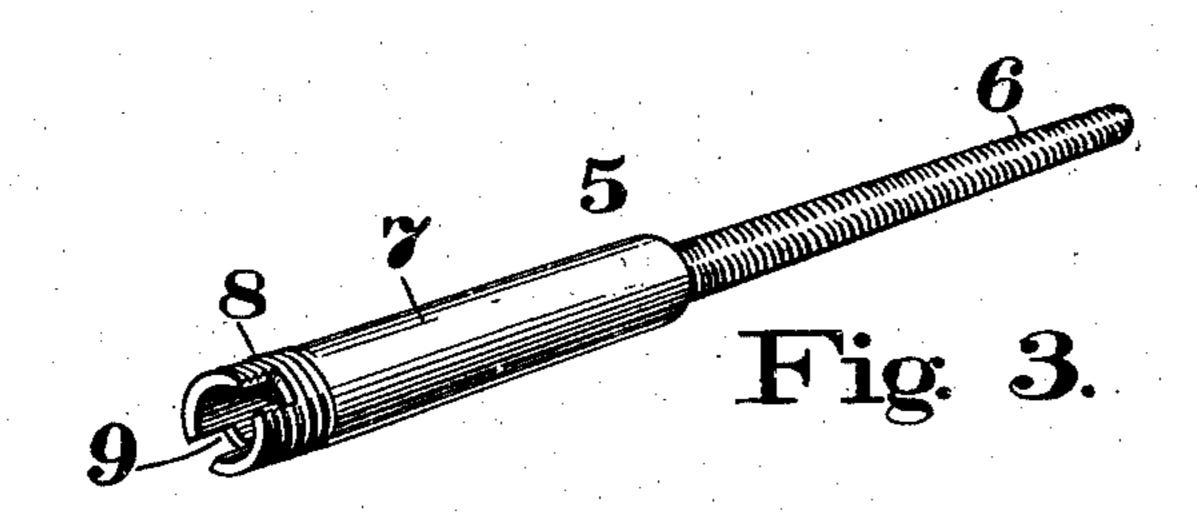
J. ROSE.

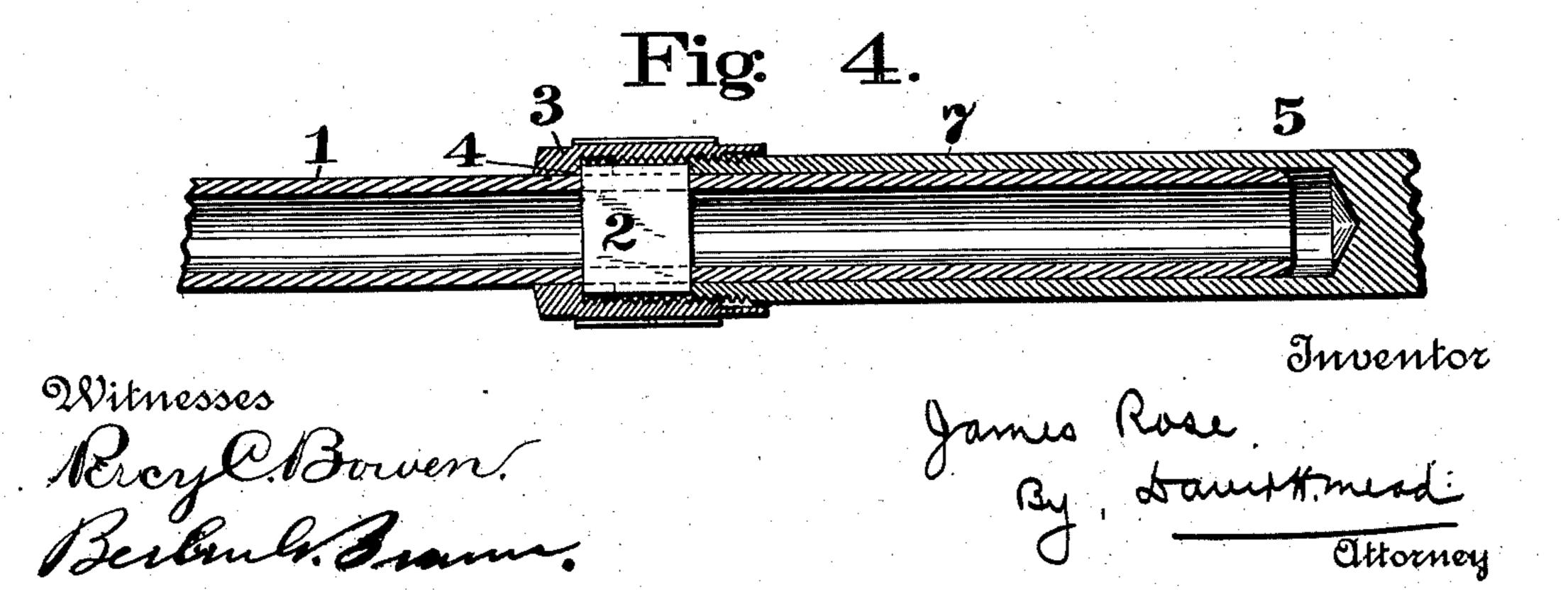
UMBRELLA STICK.

APPLICATION FILED MAY 7, 1903.

NO MODEL.







United States Patent Office.

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UMBRELLA-STICK.

SPECIFICATION forming part of Letters Patent No. 741,978, dated October 20, 1903.

Application filed May 7, 1903. Serial No. 156,040. (No model.)

To all whom it may concern:

Be it known that I, James Rose, a citizen of the United States, residing at Lancaster, in the county of Lancaster and State of Pennsylvania, have invented certain new and useful Improvements in Umbrella-Sticks; and I do declare the following to be a full, clear, and exact description of the invention, 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, and to the figures of reference marked thereon, which form a part of this specification.

This invention relates to umbrella-sticks; and it relates particularly to means whereby handles may be attached to and removed

from sticks, as desired.

In devices as heretofore made by which the detachment of handles is provided for the 20 means employed are defective and objectionable in various particulars. Usually their incorporation into the stick involves cutting away or weakening of the stick near or at the juncture of the stick and handle, at which point most strain comes in holding the umbrella when raised. The usual means employed for connecting the parts is a spring of some form and which allows lateral or longitudinal play between the stick and handle, which play increases as the parts wear in use, rendering the joint defective.

The object of the present invention is to provide means whereby umbrella-handles may quickly and easily be connected to or be removed from sticks, which means shall strengthen rather than weaken the stick at the point where the stick and handle are connected and shall afford a connection between the parts in which no play or vibration is pos-

40 sible.

With this object in view the invention consists, essentially, of the means for detachably connecting umbrella-handles to sticks, which consists of an internally-screw-threaded sleeve capable of sliding on a stick, a stop on the stick by which the movement of the sleeve is limited, and a hollow projection from a handle receiving the end of the stick and having external screw-threads adapted to be engaged by those in the sleeve.

The invention consists, further, of various I handle.

novel details of construction, whereby the object of the invention is attained and the effectiveness of the device insured.

One form of embodiment of the invention 55 is illustrated in the accompanying drawings, in which—

Figure 1 is a side view of the end of an umbrella-stick having a handle connected thereto by my improved means. Fig. 2 is a side 60 view of the end of an umbrella-stick having the connecting-sleeve in place thereon and showing the stop by which the movement of the sleeve is limited. Fig. 3 is a perspective view of the portion of the connecting device 65 which is attached to the handle; and Fig. 4 is an enlarged sectional view of the parts of the joint, showing the same in the position assumed when a handle is attached to a stick.

In the drawings, 1 represents the handle 70 end of an umbrella-stick, the form of stick being the ordinary tubular metal article usually employed. Arranged near the end of the stick is the stop or projection 2, extending a short distance from the face of the 75 stick. This stop may be formed in any suitable way, as by raising the metal of the stick or by attaching pieces to the faces thereof. I prefer, however, to pierce the stick and introduce into the opening a plug 2, of metal, 8c projecting a short distance from opposite sides of the stick, as shown in the drawings.

Surrounding the stick 1 and arranged above the stop or projection is a sleeve 3, internally screw-threaded and having on the 85 end thereof removed from the handle end of the stick a flange 4, by which the opening in this end is contracted to a size to allow the sleeve to slide freely on the stick and at the same time to prevent its passing the stop on 90 the rod. The space between the screwthreads on the sleeve and the rod is of a size to permit the introduction between the parts of a portion of the projection from the handle. In order to give the joint a finished ap- 95 pearance by covering all the screw-threads on the portion of the joint attached to the handle and to be hereinafter described, the sleeve has an overhanging smooth surface on the end thereof toward the handle to over- 100 lap the threads on the attachment to the

The portion 5 of the fastening device, which is attached to the handle, consists of the reduced end 6, adapted to enter the handle, and the hollow end 7 for receiving the 5 end of the stick. The reduced end 6 is preferably externally screw-threaded for introduction into a wooden handle or is roughened to afford a holding-surface when it is introduced into a handle and retained by 10 cement or the like. The hollow end 7 has an opening of a size to receive and closely confine the end of the stick. It has on the outer end the screw-threads 8, adapted to engage those on the inner face of the sleeve 3, and 15 the thickness of the screw-threaded portion corresponds to the space between the rod and the inner face of the sleeve.

The end of the hollow portion 7 has in it one or more openings or indentations 9, of a 20 size and shape corresponding to the stop or projection 2.

In connecting the parts when constructed as described the hollow end of the part 5, to which the handle is connected, is passed over 25 the end of the stick until the projection or stop enters the openings 9, and the sleeve is then screwed upon the part 7 until the flange abuts against the end of the stop 2. With the parts thus placed in position a perfectly 30 rigid joint between the stick and handle is made and no play between the parts in any direction is possible, while at the same time the removal of one handle and the substitution of another can quickly be accom-35 plished by an unskilled person and without

An important advantage which my form of connection possesses over others for the

the use of tools.

same purpose is that by it the stick is reinforced at the point just above the handle 40 where most strain comes in holding an umbrella when raised instead of being weakened, as by the other devices for the purpose.

Having thus described my invention, what I claim as new, and desire to secure by Letters 45

Patent, is—

1. The means for detachably connecting an umbrella stick and handle comprising a stick having an opening therethrough, a plug located in the opening and projecting from op- 50 posite sides of the stick, an internally-screwthreaded sleeve capable of sliding on the stick and adapted to abut against the plug, and a hollow externally-screw-threaded projection from a handle adapted to receive the 55 end of the stick, and having indentations in its end adapted to receive the ends of the plug, substantially as described.

2. The means for detachably connecting an umbrella stick and handle comprising a stick 60 having an opening therethrough, a plug located in the opening and projecting from opposite sides of the stick, a sleeve having a portion of its inner face screw-threaded and the remainder smooth and adapted to abut 65 against the plug, and a hollow externallyscrew-threaded projection from a handle having indentations in its end adapted to receive the ends of the plug, substantially as described.

In testimony whereof I affix my signature

in presence of two witnesses.

JAMES ROSE.

Witnesses:

CHAPMAN N. FOWLER, Percy C. Bowen.