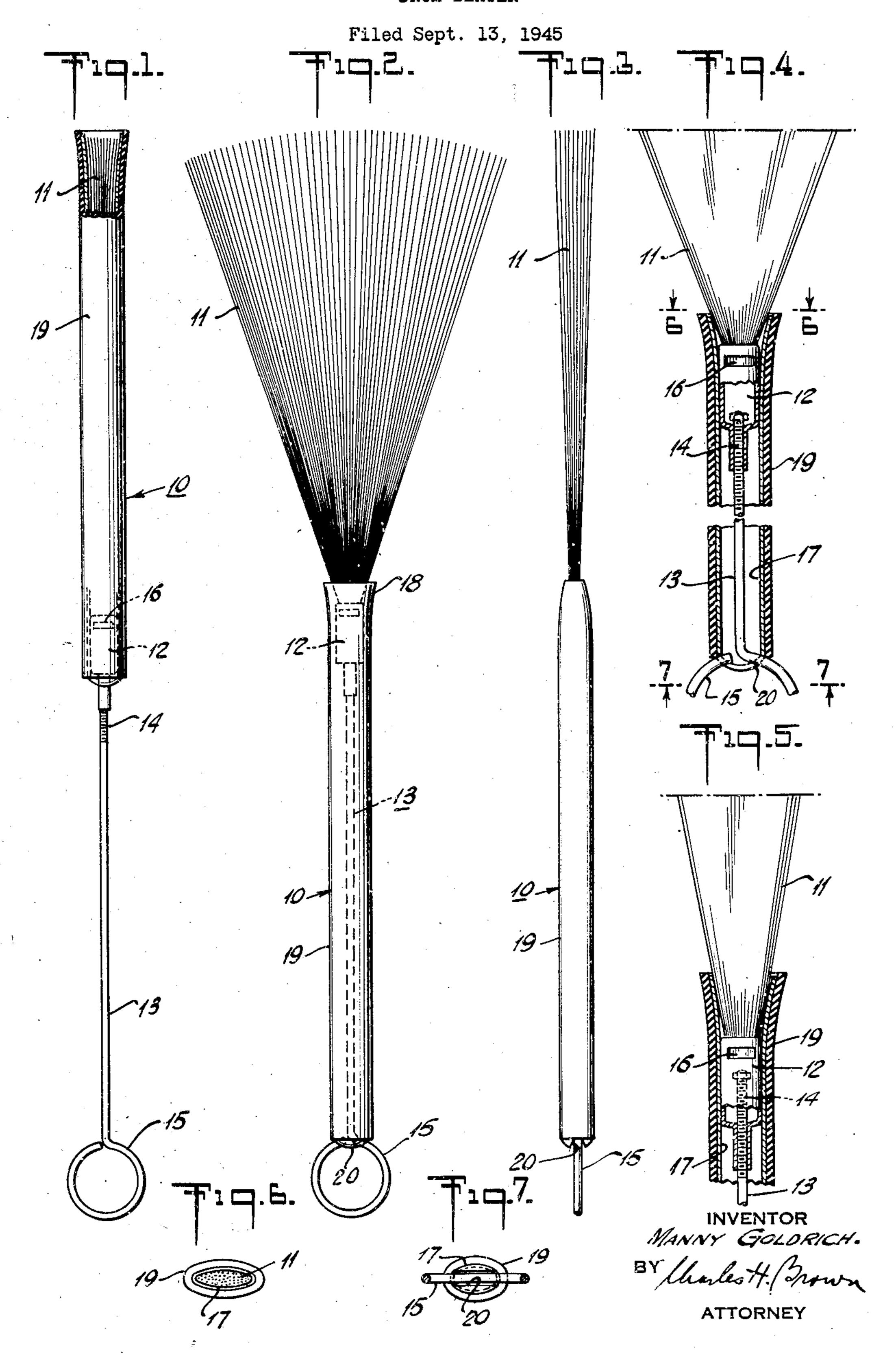
DRUM BEATER



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DRUM BEATER

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8 Claims. (CI. 84—422)

This invention relates to musical instruments, and more particularly to wire brushes, sometimes

referred to as jazz drum switches.

The wire brush is used with the drum or cymbal to obtain patter and swish-like sound effects. It comprises a tubular handle having at one end a plurality of thin gauge steel wires which spread out in the manner of a fan and are fastened to a clip or lug seated within and slidable along the length of the handle. For adjusting the spread of 10 the wires, there is provided a metal rod which is fixedly connected at one end to the lug in the interior of the handle. The other end of the rod terminates in a loop or a ball located outside the handle to enable the rod to be easily grasped by 15 the hand and moved along the longitudinal axis of the handle, thereby permitting adjustment of the effective length and the spread of the wires.

One difficulty experienced with known types of wire brushes is that the length of the rod which 20 protrudes from the handle changes for different adjustments of the wires, thus interfering with the balance or feel of the instrument in the hand of the user.

Another difficulty is caused by undesired changes in adjustment of the wires during usage, due to inadvertent movement of the rod.

The present invention overcomes the foregoing difficulties.

According to the invention, the rod is threaded 30 at the end nearest the wires to permit adjustment of the effective length and spread of the wires. The free end of the rod at which the loop is located always maintains the same position on the handle for all adjustments, when the wire brush is ready for use with a drum. At the end of the handle nearest the loop, there is provided a groove or slot which is sufficiently wide to accommodate the lower end of the loop and thus lock the rod on the handle, thereby preventing undesired movement of the rod during usage.

The following is a description of the wire brush of the invention, in conjunction with a drawing, wherein:

tion with the wires pulled entirely into the interior of the handle and the adjusting rod extending out for its whole length;

Fig. 2 illustrates the wire brush ready for use., fan, and the rod is locked in position on the handle:

Fig. 3 is a side or edge view of Fig. 2;

Fig. 4 is an enlarged fragmental view of Fig. 2 in section;

Fig. 5 is a view similar to that of Fig. 4 and shows the adjustment of the rod for a smaller spread of the wires;

Fig. 6 is a cross-section of Fig. 4 along the line 6-6; and

Fig. 7 is a cross-section of Fig. 4 along the line 7—7.

Throughout the figures of the drawing, the same parts are indicated by the same reference numerals.

Referring to the drawing in more detail, there is shown a wire brush or jazz drum switch comprising a tubular handle 10 of elliptical crosssection; a plurality of fine quality, thin gauge, rust-proof piano steel wires !! held together at one end by a metallic lug or clip 12; and an adjustment rod 13 having one end 14 threadedly engaging an extension of the lug 12 and its free end formed into a loop 15.

The lug or clip 12 is crimped at 16 to hold the steel wires firmly, and is slidable along the interior of the handle. It will be evident that this lug can have a different shape than that shown and eliminate the extension, if desired, without departing from the principles of the invention.

The threaded end !4 of the rod !3 is provided with a large end (such as a nut) in the interior of the lug or clip 12. This nut forms a stop, to limit threaded movement of the rod at one extreme position and also prevent the rod from coming loose from the lug.

The handle 10 essentially comprises a tubular sleeve 17 which may be of any suitable material such as metal or plastic. The end 18 of the sleeve 17, which is nearest the lug 12, is preferably flared. The other end of sleeve 17 is slotted at 20 to accommodate the loop 15 when the rod 13 is pushed all the way into the sleeve. In this position, the slot locks the rod in position on the handle. Although the handle has been shown as elliptical in cross-section, it may, if desired, be circular. Surrounding the tubular sleeve 17 is, optionally, a soft or moulded rubber covering 19 to furnish a good gripping surface for the user. The rubber Fig. 1 illustrates the wire brush of the inven- 45 covering 19 may be eliminated, and, if desired, the sleeve 17 made of moulded rubber.

In making an adjustment of the effective length and spread of the wire brush, the rod 13 is first pulled out a short distance from the slot 20 The thin wires are spread out in the manner of a 50 and the rod then turned (rotated) until the desired amount of spread and length of wires is obtained. The rod is then pushed back into the handle as far as it can go, with the loop resting in the groove or slot 20, as shown in Figs. 2, 3 55 and 4. The wires II, due to their tendency to

spread out (their springiness, so to speak), exert a force on the rod i3 in such direction as to tend to pull the loop 15 into the slot 20 and hold it in this position. In this position, the rod cannot move with normal use of the instrument, and the adjustment remains the same until the user again pulls the rod out to make another adjustment at which time the same procedure is repeated. It will be seen that the slot in effect acts as a lock to prevent inadvertent change in adjustment of 10 the wires.

Since the rod 13 is pushed back into the handle and the loop 15 always rests in the groove 20 after an adjustment is made, regardless of the effective length and spread of the wires, the rod 13 will always maintain the same position on the handle during usage and the instrument will furnish the musician with the same feeling of balance.

Fig. 1 shows the rod pulled out for its entire length, in which position the wires are hidden in the handle. This is the position in which the wire brush is carried when not being used, in order to prevent damage to the wires 11.

To obtain the greatest spread and greatest effective length of the wires, the rod is pushed all the way into the handle with the threaded end 14 assuming the position shown in Fig. 4.

Fig. 5 shows the threaded end of rod 13 almost as far into the lug or clip 12 as it can go. In this position the effective length and spread of the wires is a substantial minimum. The wires are bunched together more closely in Fig. 5 than in Fig. 4 and will produce a louder sound for the same force exerted on the switch.

What is claimed is:

- 1. A musical instrument comprising a wire brush having a tubular handle open at both ends, a plurality of wires adapted to protrude from one end of the handle, a rod in the interior of said handle and extending from the other end of said handle for adjusting the effective length and spread of the wires, and means on said rod cooperating with one extreme end of said handle for locking said rod in position for different playing adjustments of said wire brush.
- 2. A musical instrument comprising a wire brush having a tubular handle open at both ends, a plurality of wires adapted to protrude from one end of the handle, a rod in the interior of said handle and extending from the other end of said handle for adjusting the effective length and spread of the wires, means at one end of said rod for locking said one end to said handle in the same relative position on said handle for different playing adjustments of said wire brush.
- 3. A musical instrument comprising a wire brush having a tubular handle open at both ends, a plurality of wires adapted to protrude from 60 one end of said handle, a clip for said wires, said clip being slidable in said handle, a rod in the interior of said handle and extending from the other end of said handle and having one end threadedly engaging said clip for adjusting the 65 effective length and spread of the wires.
- 4. A musical instrument comprising a wire brush having a tubular handler, a plurality of wires adapted to protrude from one end of said handle, a clip for said wires, said clip being slidable in said handle, a rod in the interior of said handle and having one end threadedly engaging said clip for adjusting the effective length and spread of the wires, said rod having a loop located

externally of said handle at its other end, said handle having a slot at the end adjacent said loop for preventing rotation of said rod when said rod is pushed for its whole length into said handle.

- 5. A wire brush or jazz drum switch comprising a tubular handle of elliptical cross-section flared at one end, a plurality of wires adapted to protrude from said flared end and held together by a clip slidable in said handle, a slot at the other end of said handle, and a rod adjustably secured at one end to said clip, said rod having a finger gripping element at its other end adapted to fit into said slot.
- 6. A musical instrument comprising a wire brush having a tubular handle open at both ends, a plurality of wires adapted to protrude from one end of the handle, a rod in the interior of said handle for adjusting the effective length and spread of the wires, said rod protruding from the other end of said handle and terminating in a loop outside the handle, said handle having a groove in said last end which is nearest said loop, said groove having such dimensions as to enable said loop to rest therein when said handle is pushed down with the sides of said groove restraining movement of said loop in a direction at an angle to the length of said handle, whereby there is provided a desired spread of the wires outside of the handle.
- 7. A musical instrument comprising a wire brush having a tubular handle open at both ends, a plurality of wires adapted to protrude from one end of the handle, a rod in the interior of said handle and adjustably fastened at one end to one end of said wires for adjusting the effective length and spread of the wires, said rod protruding from said handle and terminating at its other end in an enlarged finger grasping surface outside of said handle, said handle having a groove in the other end which is nearest said finger grasping surface, said groove having such dimensions as to enable a portion of such finger grasping surface to rest therein when said handle is pushed down with the sides of said groove restraining movement of said surface in a direction at an angle to the length of said handle to thereby lock said rod in said handle.
- 8. A musical instrument comprising a wire brush or jazz drum switch having a tubular handle open at both ends, a plurality of wires adapted to protrude from one end of said handle and held together by a clip slidable in said handle, a slot at the other end of said handle, and a rod adjustably secured at one end to said clip, said rod having a finger gripping element at its other end adapted to fit into said slot.

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Great Britain _____ May 5, 1927

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