

(No Model.)

E. F. SHELLABERGER.  
STEEL CLEANING BRUSH.

No. 437,626.

Patented Sept. 30, 1890.

Fig. 1.

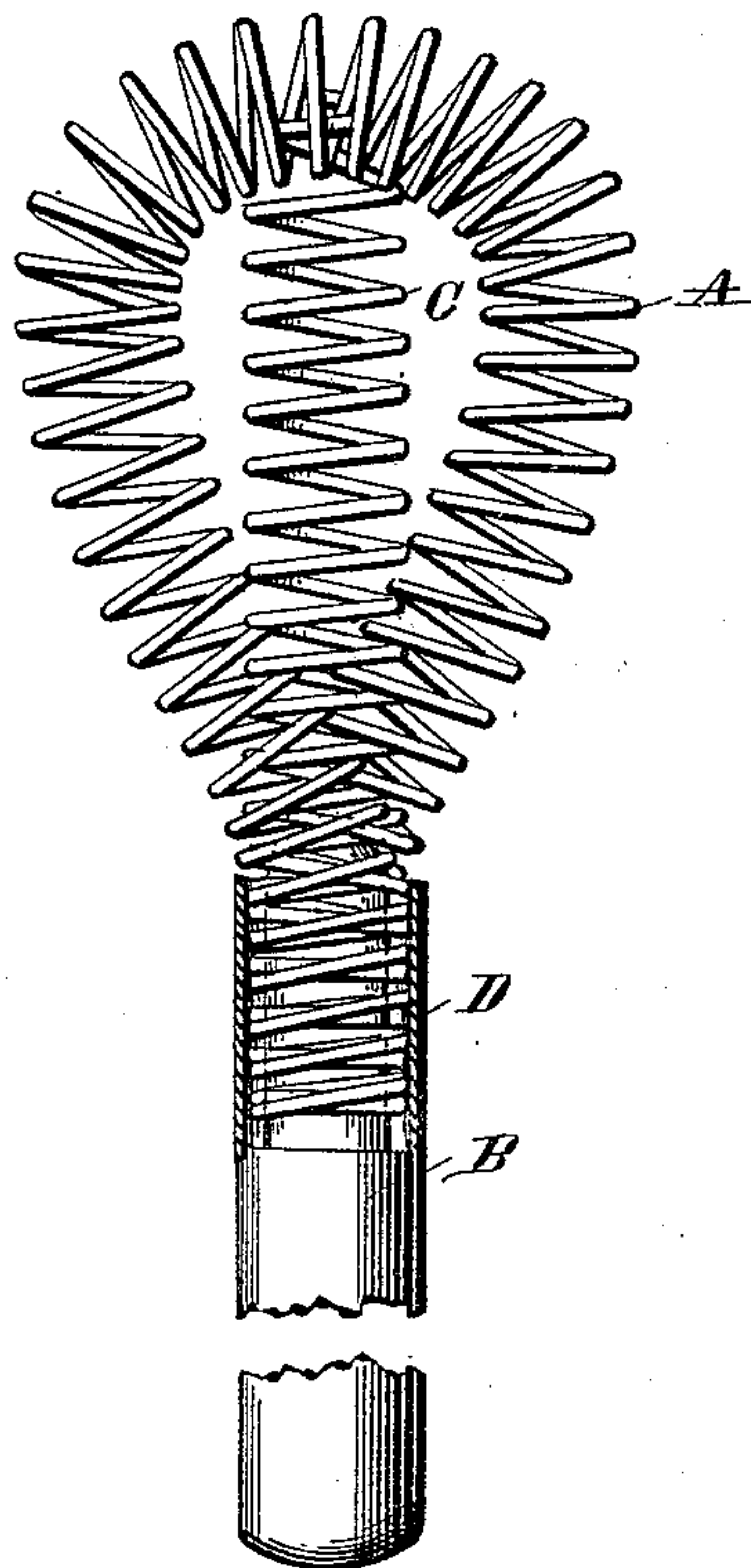
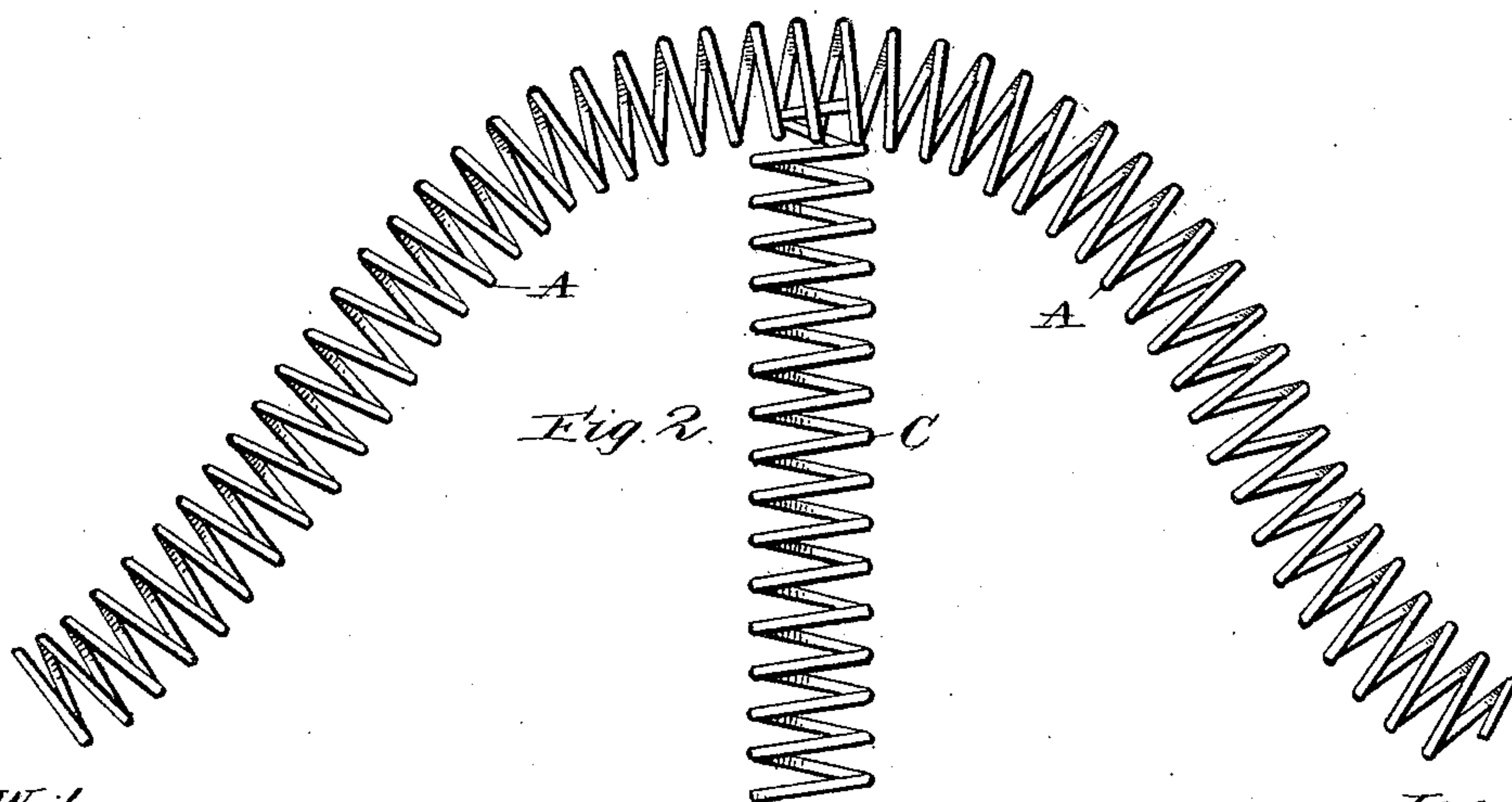


Fig. 2.



Witnesses:  
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# UNITED STATES PATENT OFFICE.

EDWARD F. SHELLABERGER, OF BEAVER FALLS, PENNSYLVANIA.

## STEEL CLEANING-BRUSH.

SPECIFICATION forming part of Letters Patent No. 437,626, dated September 30, 1890.

Application filed November 1, 1889. Serial No. 328,932. (No model.)

*To all whom it may concern:*

Be it known that I, EDWARD F. SHELLABERGER, a citizen of the United States, residing at Beaver Falls, in the county of Beaver and State of Pennsylvania, have invented certain new and useful Improvements in Steel Cleaning-Brushes; 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 letters of reference marked thereon, which form a part of this specification.

This invention relates to brushes, and has for its object to provide a brush of metal for grooming horses, that will not have any scratching-points and which will be simple, cheap, durable, self-cleaning, and perfectly flexible.

The improvement consists in a coil of suitable dimensions bent between its ends, which ends are secured together and to a handle. To obtain an extended surface, short lengths of coils may be interposed between the deflected ends of the main coil. The form shown in the annexed drawings, is not essential to the essence of the invention, as it is obvious that the coils may be bent in various forms to adapt them to the required taste and purpose.

The improvement also consists in the peculiar construction and combination of the parts, which will be hereinafter more fully described and claimed, and which are shown in the annexed drawings, in which—

Figure 1 is a front view, parts being broken

away, of a brush embodying my invention. Fig. 2 is a detail view showing the manner of forming the brush.

The coil A is formed of wire of proper gage, according to the nature of the work and size of brush required. The ends of this coil are brought together and are secured by having the handle B inserted in the opening therein. The intermediate short coil C has its outer end engaged with the coil A and its inner end brought into the plane of the bent ends of said coil A, and fastened with said ends by the handle B, as clearly shown in Fig. 2. The ferrule D on the end of the handle covers the ends of the coils A and C.

Having described my invention what I claim, and desire to secure by Letters Patent, is—

1. A metal brush composed of a coiled wire, which is bent on itself and has its ends brought together, and a handle inserted in said ends and holding them together, substantially as described.

2. A metal brush composed of a coil having its ends brought together, a short coil having its outer end engaged with the main coil and its inner end brought into the plane of the meeting ends of said main coil, and the handle inserted in the meeting ends of said coils, substantially as and for the purpose described.

In testimony whereof I affix my signature in presence of two witnesses.

EDWARD F. SHELLABERGER.

Witnesses:

ELMER E. WHITTAKER,  
J. F. MERRIMAN.