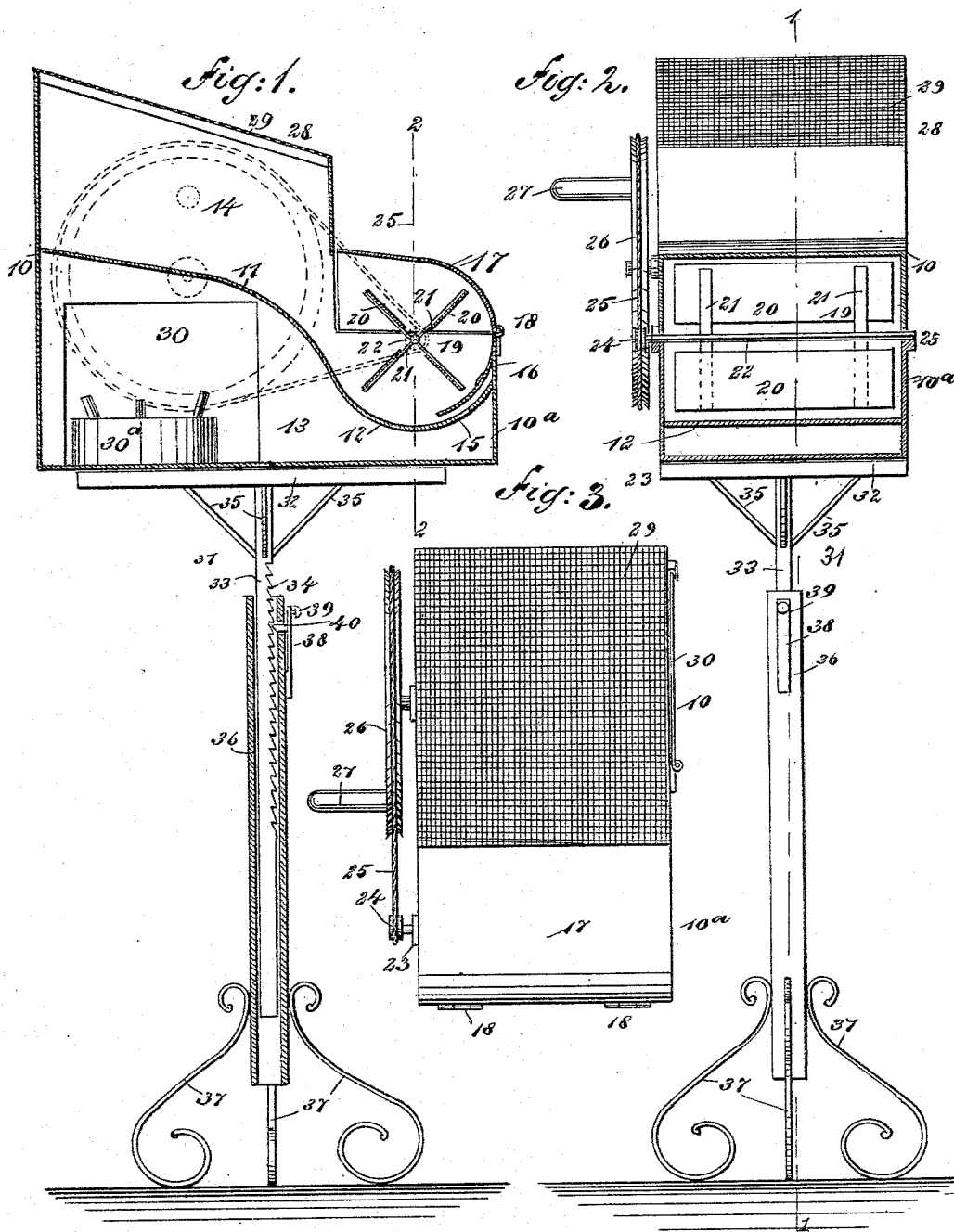


(No Model.)

J. N. POWELL.
HAIR DRYING MACHINE.

No. 494,889.

Patented Apr. 4, 1893.



WITNESSES:

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UNITED STATES PATENT OFFICE.

JOSEPH N. POWELL, OF ELMWOOD, ILLINOIS.

HAIR-DRYING MACHINE.

SPECIFICATION forming part of Letters Patent No. 494,889, dated April 4, 1893.

Application filed December 29, 1891. Serial No 416,456. (No model.)

To all whom it may concern:

Be it known that I, JOSEPH N. POWELL, of Elmwood, in the county of Peoria and State of Illinois, have invented a new and Improved
5 Hair-Drying Machine, of which the following is a full, clear, and exact description.

My invention relates to improvements in devices for drying the human hair, and the object of my invention is to produce a simple
10 apparatus or machine by means of which women's hair, after having been shampooed, may be quickly and nicely dried without resort to the usual tedious methods.

A further object of my invention is to produce a machine by means of which artificial
15 heat may be forced through the hair without injury to the same, and with perfect safety to the person.

To this end, my invention consists in certain features of construction and combinations of parts, which will be hereinafter described and claimed.

Reference is to be had to the accompanying drawings forming a part of this specification,
25 in which similar figures of reference indicate corresponding parts in all the views.

Figure 1 is a vertical section of the machine, on the line 1—1 in Fig. 2. Fig. 2 is a vertical
30 transverse section on the line 2—2 in Fig. 1, and Fig. 3 is a plan view of the machine.

The machine is provided with a hollow case 10, which is preferably made of sheet metal, and which has a prolongation 10^a at one end. The case is divided by a partition 11, which
35 is curved downward and upward where it enters the prolongation 10^a, so as to provide for the movement of the fan, into two chambers 13 and 14, arranged one beneath the other, the lower chamber 13 being adapted to contain the heating lamp, and the upper chamber
40 serving as a flue through which the warm air passes. In the curved portion 12, beneath the fan, is an opening 15, through which warm air passes from the lower to the upper chamber, and above this opening is a curved deflector 16, which is fixed to the wall of the
45 case, and which causes the air to pass forward into the path of the fan wings. The upper portion of the prolongation 10^a of the case is formed into a cover 17, which is hinged
50 to the main portion of the case, as shown at

18, and which provides for the insertion and removal of the fan 19, which fan is mounted transversely in the case above the curved portion 12 of the partition 11, and the fan has the
55 usual wings 20, which connect by means of supporting arms 21 with a shaft 22, the shaft extending transversely through the case, and turning in bearings 23. One end of the shaft projects through one wall of the case and terminates in a grooved pulley 24, which is driven
60 by means of a belt or cord 25, passing over a large pulley 26, which is turned by a crank 27, and is pivoted on one side of the case 10. The pulley 26 is made very much larger than
55 the pulley 24, so that the fan may be driven very rapidly. The main portion of the case 10 has an inclined top 28, which is covered with screening 29, or otherwise perforated. The case has a door 30 opening into the lower
70 chamber 13, and this door provides for the admission of air and the insertion and removal of an alcohol lamp 30^a, by means of which the hot air is produced, and when the lamp is
75 burning, the air will be heated in the chamber 13, and will pass through the opening 15 to the upper chamber 14, and the rotation of the fan will force the air up through the perforated top of the case. This case is adapted
80 to be arranged immediately behind the chair in which the person sits, and the moist hair of the person is spread out over the perforated top 28, so as to receive the full benefit of the rising hot air.

To provide for adjusting the case to suit
85 the height of the person, it is mounted on an adjustable tripod 31, which has a flat top 32 adapted to support the case, and the top has a depending stem 33, with ratchet teeth 34 on one side, the top and stem being thoroughly
90 braced by braces 35. This stem projects downward into a vertical pipe 36 mounted on legs 37, and near the upper end of the pipe is secured a flat spring 38, having a knob 39 at its
95 free end, which serves as a handle, and having on its inner side a pawl 40, which projects through a hole in the pipe and engages the teeth 34, thus enabling the stem 33, and consequently the case 10, to be held at any desired height.

In practice, the alcohol lamp is lighted and placed in the heating chamber 13: the hair

to be dried is spread over the perforated top of the case, and the operator rapidly rotates the wheel 26, thus driving the fan 19, and forcing a current of warm air through the hair, which will be quickly dried by the operation.

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

10 1. A hair drying machine, comprising a casing having a prolongation at one end and having a lower chamber for containing a lamp and an upper chamber communicating with the lower chamber and having a portion of
15 its top inclined and perforated, and a fan mounted in one end of the upper chamber and serving to draw the heated air from the lower chamber into the upper chamber and force it out of the same through the perforated top, substantially as described.

20 2. A hair drying machine, comprising a casing divided into an upper and lower chamber communicating with each other, the lower

chamber being adapted to receive a lamp, and the upper chamber having a portion of its top 25 inclined and perforated, a fan mounted in the prolongation of the upper chamber, and an adjustable support for the casing, substantially as herein shown and described.

3. A hair drying machine, comprising a 30 casing having a prolongation at one end and provided with a partition curved downward and upward and apertured where it enters the prolongation and dividing the casing into a lower heating chamber and an upper cham- 35 ber said upper chamber having a portion of its top inclined and perforated, a fan in the end of the upper chamber in the prolongation of the casing a deflector over the aperture of the partition, and an adjustable sup- 40 port for the casing, substantially as herein shown and described.

JOSEPH N. POWELL.

Witnesses:

W. A. CLINCH,
J. H. SPRING.