

May 27, 1941.

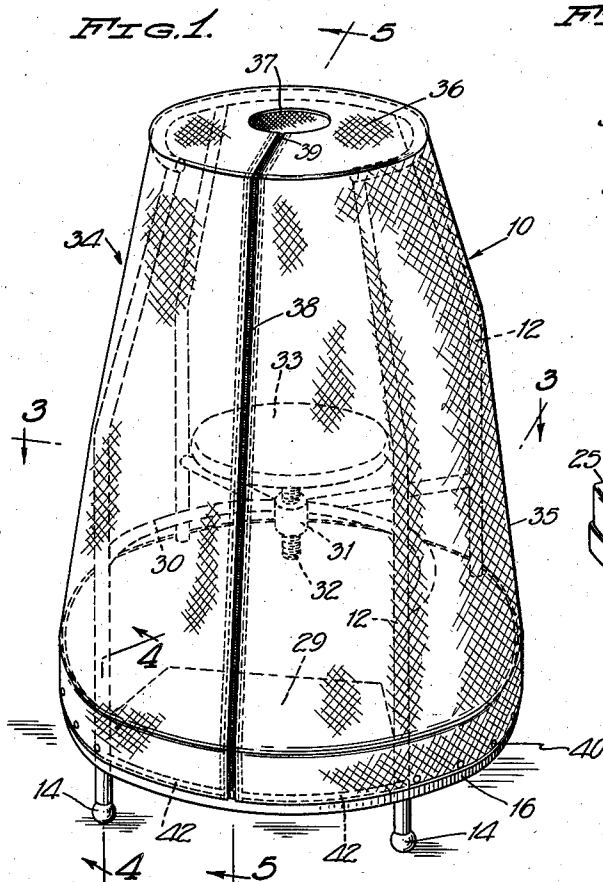
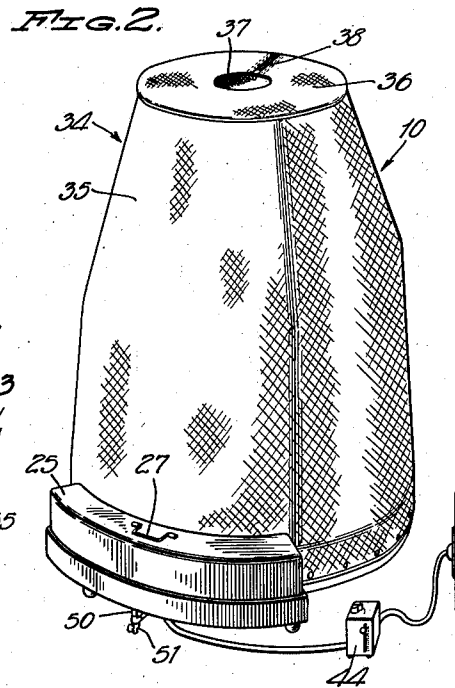
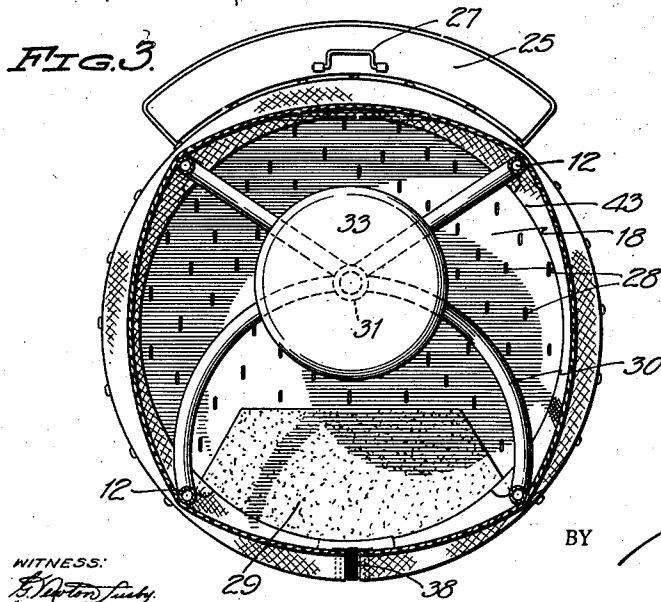
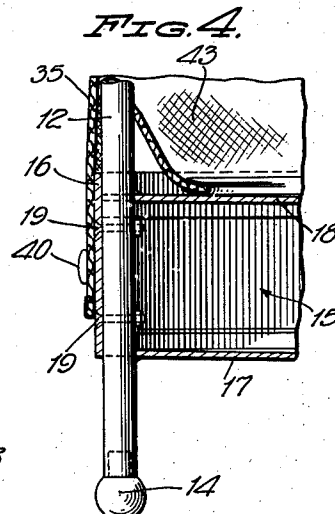
A. J. CARL

2,243,550

STEAM BATH CABINET

Filed April 11, 1940

2 Sheets-Sheet 1



ALICE J. CARL.
INVENTOR.

BY

Ely & Pattison.
ATTORNEYS.

WITNESS:
E. J. Carl
1941.

May 27, 1941.

A. J. CARL

2,243,550

STEAM BATH CABINET

Filed April 11, 1940

2 Sheets-Sheet 2

FIG. 5.

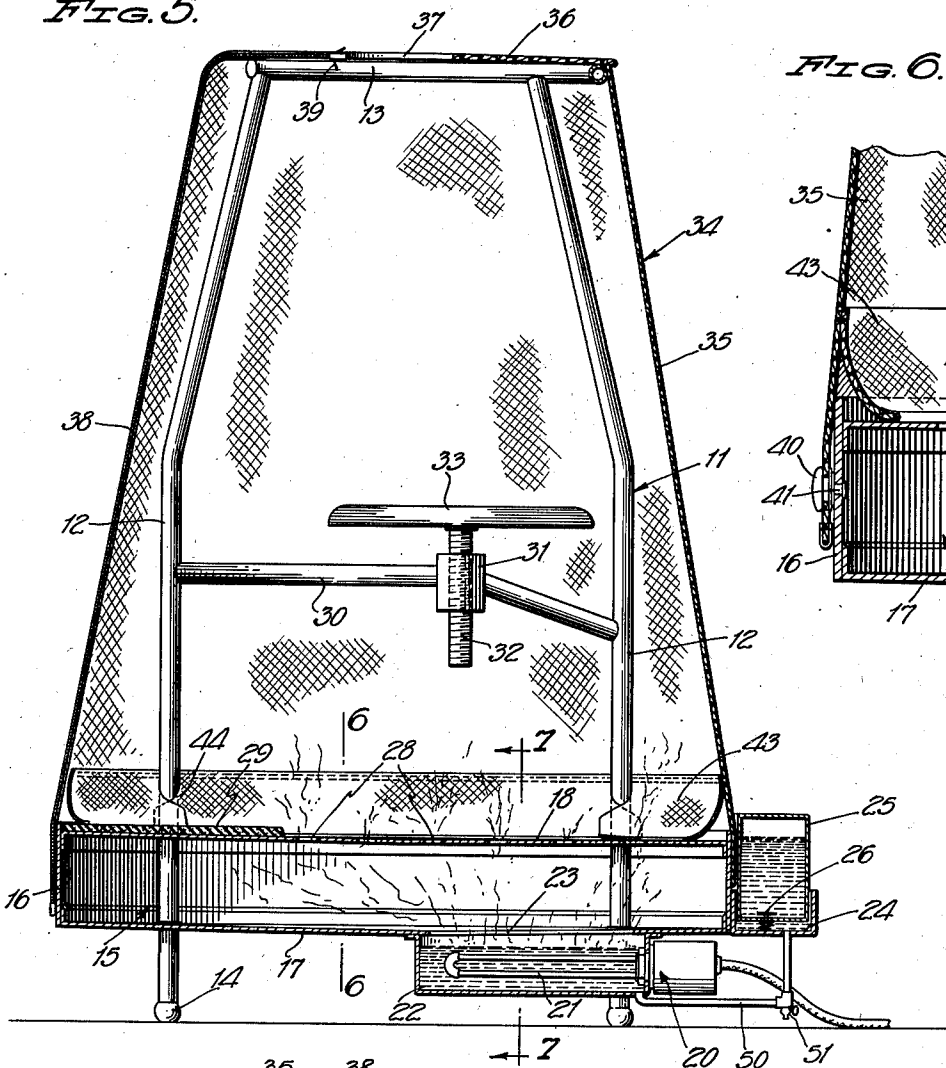


FIG. 6.

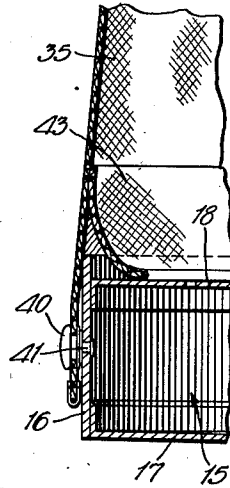
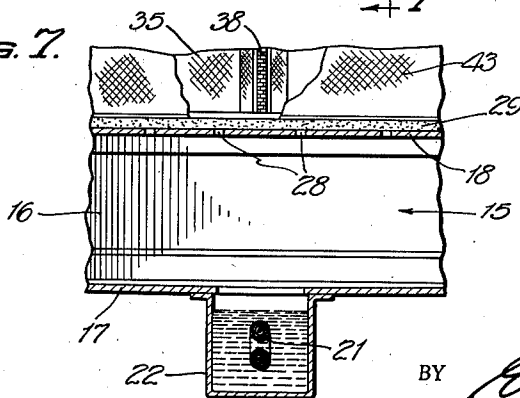


FIG. 7.



WITNESS:
E. H. H. H. H. H.
1941.

ALICE J. CARL.
INVENTOR.

BY

Ely & Pattison
ATTORNEYS.

164 Patented May 27, 1941

2,243,550

UNITED STATES PATENT OFFICE

2,243,550

STEAM BATH CABINET

Alice J. Carl, Philadelphia, Pa.

Application April 11, 1940, Serial No. 329,038

4 Claims. (Cl. 4—164)

This invention relates to improvements in steam bath cabinets for use in homes, beauty parlors, health clubs, and other places where steam vapor baths may be administered.

One of the important features of the invention resides in a steam bath cabinet in which the steam generator, body enclosure, and seat for a user are novelly arranged to provide a relatively light but strong portable unit so that the cabinet may be easily moved from place to place.

Another feature of the invention is to provide a steam cabinet in which the bottom of the cabinet constitutes a steam accumulator and distributing chamber whereby to cause steam to rise upward about the body of a person seated in the cabinet.

Another feature of the invention is the provision of a steam bath cabinet in which liquid condensation is confined therein to prevent the same from leaking out onto the floor, and which liquid of condensation automatically gravitates to the source of liquid supply.

A further feature of the invention is the provision of a steam bath cabinet which includes a flexible cover having a neck opening in the top thereof, and a frame for supporting the cover in spaced relation to the body of user below the neck, there being an adjustable stool supported by the frame to facilitate the comfortable accommodation of different size persons within the cabinet relative to the neck opening in the flexible cover.

Other features of the invention are to provide a steam bath cabinet which is simple of construction, inexpensive of manufacture, and easy to clean to meet public health sanitary requirements.

Other features of the invention will appear as the following specification is read in conjunction with the accompanying drawings, in which:

Figure 1 is a perspective view of the steam bath cabinet looking at the front thereof.

Figure 2 is a perspective view of the steam bath cabinet looking at the rear thereof.

Figure 3 is a horizontal sectional view on the line 3—3 of Figure 1.

Figure 4 is an enlarged detail vertical sectional view on the line 4—4 of Figure 3.

Figure 5 is an enlarged vertical transverse sectional view on the line 5—5 of Figure 1.

Figure 6 is an enlarged detail vertical sectional view on the line 6—6 of Figure 5.

Figure 7 is an enlarged detail vertical sectional view on the line 7—7 of Figure 5.

Referring to the drawings by reference char-

acters, the numeral 10 designates my improved steam bath cabinet in its entirety, and which includes a metal frame structure 11 which includes four uprights 12 made of metal tubing, the upper portions of the uprights being bent inwardly and the top ends are connected by a circular top rail 13, the front portion of the circular top rail being broken away or left open to permit of the easy ingress and egress of a person in entering and leaving the cabinet. The lower ends of the uprights 12 are provided with spherical feet 14, although casters may be used in lieu of the spherical feet to facilitate the easy sliding of the frame structure over a floor.

Supported in an elevated position by the uprights 12 of the frame structure is a hollow platform 15 which includes an annular side wall 16, a bottom wall 17 and a top wall 18, the top wall being disposed below the top edge of the side wall 16 as clearly illustrated in Figure 6. The uprights 12 pass through the top and bottom walls of the metal hollow platform 15, and the platform is secured to the uprights by bolts or like fastening elements 19 as illustrated in Figure 4 of the drawings. The hollow platform 15 is supported adjacent the lower ends of the uprights 12 to permit a steam generating device 20 to be attached to the bottom wall 17. The steam generating device 20 includes an electric heating coil 21 disposed within a tank or boiler 22, which tank is secured to the wall 17, there being a steam outlet 23 in the bottom wall 17 to permit steam from the tank 22 to enter the hollow platform 15.

Water for the generation of steam is fed to the tank 20 by a pipe 50 leading from a trough 24, which trough is of segmental shape in plan, and is disposed at the rear of the platform 15. The reservoir or trough 24 is fed with water from a water tank 25 which is provided with an automatic control valve 26. The tank 25 having the removable regulating valve 26 is similar to the conventional kerosene tank used on wick-burner oil stoves, which tank may be filled with water by lifting it from the trough by the handle 27 and unscrewing the control valve 26, and when the tank is filled, it is inverted and dropped into the trough 24 for feeding water to the tank 22 as is needed. The pipe 50 has a drain cock 51 in the low section thereof for draining the trough when desired.

The top wall 18 inclines toward the center for draining purposes, and is provided with spaced steam outlet openings 28, and which openings extend over that area of the top wall 18 ex-

cept adjacent the front portion of the top wall, which portion is covered by a heat resisting mat 29 which may be made of asbestos or other non-heat-absorbing material. The bottom wall 17 of the hollow platform is inclined toward the steam inlet opening 23 so that moisture condensation may flow from the hollow platform into the steam generating tank 22.

The uprights 12 are braced above the platform 15 by a spider 30 which has a central internally screw threaded hub 31 through which the screw 32 of a stool 33 threads. The stool 33 provides a seat for the person taking a bath, and is adjustable for a reason to be hereinafter explained.

The frame structure 11 supports a flexible waterproof enclosure 34 which may be made of rubberized fabric or the like. The enclosure 34 includes a flexible side wall 35, and a flexible top wall 36, the latter having a neck opening 37 therein. The top wall 36 rests upon the top rail 13, whereas the side wall 35 is draped over the uprights 12 and extends down to and into lapping engagement with the annular side wall 16 of the hollow platform 15. The front of the enclosure 34 is slit from the wall of the neck opening 37 to the lower edge of the side wall 35 to permit ingress to and egress from the enclosure. The edges of the slit are closed by a slide fastener device 38 in which the actuating slide member 39 is operable from both sides of the enclosure, whereby either a person seated within the enclosure may actuate the slide fastener to closed position or the same may be actuated by an attendant from the exterior. In order to prevent the escape of steam from the enclosure, the lower lapping portion of the side wall 35 thereof is provided with female snap fastener elements 40 which are engaged with male snap fastener elements 41 which are secured to and extend from the side wall 16 of the platform 15 as best shown in Figure 6.

The snap fastener elements do not extend entirely about the enclosure, due to the location of the tank 25 and they also terminate short of the front of the platform as shown best in Figure 1, to facilitate the folding back of the enclosure when the slide fastener 38 is open, however, the front portion of the enclosure at the bottom thereof is reinforced by arcuate stays 42.

Secured to the side wall 35 of the enclosure is a flap 43, which extends inwardly and rests upon the top wall 18. The flap 43 is cut away as at 44 to enable it to fit about the uprights 12, and the flap is split at the front end so as not to interfere with the opening of the enclosure. The flap 43 acts to seal the joint between the side wall 35 and the top of the hollow platform 15, whereby any moisture condensation which might drain down the side wall 35 will be led onto the top wall 18 from where it may flow through the opening 28 into the hollow platform 15 and thence drain into the steam generating tank 22.

The steam generating device 20 is electrically operated, and its operation may be controlled by a time switch 44, which switch may be set before the person enters the cabinet, to cause the steam generator to operate a predetermined time without the attention of an operator.

In practice, assume that the enclosure 34 is open, and that a person wishes to take a steam bath. The time switch 44 is set, and the heat from the electric steam generator 20 causes the water in the boiler 22 to be transformed into steam, whereupon the steam enters the hollow

platform 15 where it accumulates. The person enters the enclosure, sits upon the seat 33, placing his or her feet on the mat 29, and positioning the neck in the neck opening 37, whereupon the slide fastener device 38 may be closed. The steam which accumulates in the hollow platform 15 rises upwardly through the openings 28 and the enclosure 34 is filled with steam. The steam vapors continue to rise until such time as the switch 44 shuts off the operation of the steam generator 20, at which time the person seated within the cabinet may actuate the slide member 39 of the slide fastener device to open the enclosure 34, whereupon the person is free to step from the platform 13. By means of the adjustable stool 33, the level of the seat may be adjusted so that the necks of different height persons may be comfortably fitted through the neck opening 37.

In order to maintain the cabinet in a sanitary condition, it is possible to disconnect the lower portion of the enclosure 34 from the platform 15 by disengaging the snap fastener elements 40 and 41, whereupon the enclosure may be lifted from the supporting frame structure 11 and thoroughly cleaned. When the enclosure 34 is removed, easy access may be had to the frame structure, seat, and platform to enable these various parts to be thoroughly cleaned and kept in a sanitary condition.

While I have shown and described what I consider to be the most practical embodiment of my invention, I wish it to be understood that such changes and alterations as come within the scope of the appended claims may be resorted to, if desired.

Having thus described the invention, what I claim as new and desire to secure by Letters Patent of the United States is:

1. A portable steam bath unit comprising in combination, a hollow circular platform having an annular side wall, and spaced apart top and bottom walls, the top edge of the side wall rising above the plane of the top wall, the interior of the hollow platform constituting a steam collecting chamber, steam inlet means provided in said hollow platform, the top wall of the platform having steam outlet openings therein, a floor frame structure comprising spaced vertical leg rails fitting against and secured to the annular side wall of said platform, the upper portions of the leg rails being disposed in inwardly converging relation, a horizontally disposed yoke like neck rail connected to the top ends of the leg rails, a seat supporting frame connected to the leg rails above the platform, a seat supported by the seat supporting frame, a flexible cape-like moisture-proof cover supported by the neck rail and draped about the leg rails with its lower portion lapping the annular side wall of the platform, and means for releasably securing the lapping portion of the cover to the annular side wall of said platform.

2. A portable steam bath unit comprising in combination, a hollow drum-like casing having a steam inlet in the bottom thereof and steam outlet openings in the top wall thereof, the interior of the casing constituting a steam chamber, a frame structure including a plurality of uprights, each of which comprises a foot section, a leg section, and an inwardly extending angular top section, a horizontal neck yoke rail connected to the top ends of the uprights, means securing the drum like casing to the leg portions of said uprights, a horizontal seat frame consisting of

64

2,243,550

3

a threaded hub, rails connected to and extending radially from said hub and respectively connected to the leg portions of said uprights, a seat having a screw threaded stem threadedly connected to the threaded hub, and a moistureproof cover having a top portion provided with a neck opening, and a depending skirt portion, the top portion resting upon the neck rail and the skirt portion being draped over the uprights and depending in lapped relation with respect to the sides of said casing.

3. A portable steam bath unit comprising in combination, a frame structure having feet for rest upon a floor, a hollow circular drum-like casing secured to and within said frame structure in elevated position above the feet thereof, the bottom wall of said casing having a steam inlet opening and the top wall thereof having steam outlet openings, a steam generator water tank supported by the bottom wall of the casing beneath the steam inlet opening, an arcuate shape trough secured to the side of said casing, a pipe connection between said trough and said steam generator water tank, an arcuate water supply tank contained within said trough having a water outlet in the bottom wall thereof, valve

means for controlling the flow of water from the water supply tank to the steam generator water tank and for maintaining a predetermined water level in the last named tank, an electric heating element extending into said steam generator water tank, and a flexible tent-like cover draped over and supported by said frame structure with its lower portion lapping the side of the casing.

4. In a portable steam bath cabinet, a floor frame comprising a plurality of circularly arranged uprights, each upright comprising a foot portion and a leg portion, a horizontal neck yoke rail connecting the top ends of the leg portions, a circular perforated floor supported by the leg portions of said uprights, a horizontal seat frame comprising a central threaded hub, rails secured to said hub and extending radially therefrom and respectively connected to the leg portions of said frame, a seat having a depending threaded stem threaded in said threaded hub, and a flexible tent-like cover supported by and draped over the frame structure and depending below said perforated floor, said cover having a neck opening in the top thereof in registration with the neck-yoke rail.

ALICE J. CARL.