

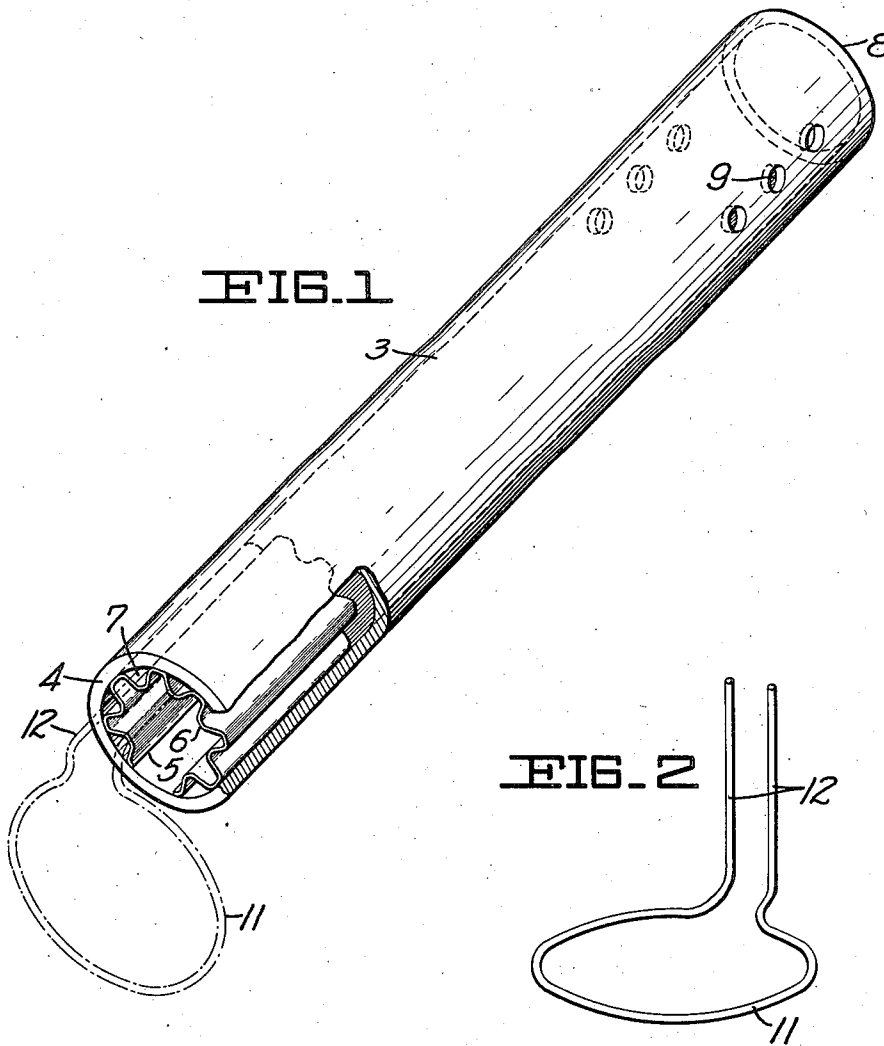
May 24, 1938.

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2,118,748

BUBBLE BLOWER

Filed June 15, 1937



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UNITED STATES PATENT OFFICE

2,118,748

BUBBLE BLOWER

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Application June 15, 1937, Serial No. 148,333

1 Claim. (Cl. 46—6)

This invention relates to devices used with a soap solution for blowing bubbles.

It is an object of the invention to provide a bubble blower in which the pressure of the breath of the user is controlled so as not to exceed that which would rupture the film of soap solution at the orifice of the blower before the bubble is formed.

Another object of the invention is to provide, in a device of the character described above, a reservoir which renders the blower capable of forming a series of bubbles without reloading, or which also renders the blower capable of discharging a shower of separate bubbles at the option of the user.

A further object of the invention is to provide an attachment for use with bubble blowers which permits the formation of materially larger bubbles than have been heretofore obtainable with blowers of an equivalent size.

Still another object of the invention is to provide an economical and practically indestructible bubble blower.

The invention possesses other objects and features of advantage, some of which, together with the foregoing, will be specifically set forth in the detailed description of the invention hereunto annexed.

It is to be understood that the invention is not to be limited to the particular species thereof shown and described as various other embodiments thereof may be employed within the scope of the appended claim.

Referring to the drawing:

Figure 1 is a perspective view, with a portion thereof broken away so as to more clearly disclose the interior construction, of a bubble blower constructed in accordance with the principles of this invention.

Figure 2 is a perspective view of the bubble supporter.

In detail, the bubble blower of my invention comprises a length of cardboard tubing 3 which is impregnated with paraffin, or other similar material insoluble in water, so as to render it waterproof. Into the end 4 of the tube, which is the end at which the bubbles are formed, is placed a piece of sheet metal 5 bent to substantially tubular form and provided with corrugations 6 which provide, in conjunction with the inner periphery of the tubing, a plurality of small passages 7 disposed axially parallel with the axis of the tubing. Adjacent the opposite end 8 of the tube, which is the end into which the user blows, is provided a plurality of bleeder apertures 9 which extend en-

tirely through the tubing side wall. The purpose of these apertures is to bleed off some of the pressure created by blowing into the tube so that the film of soap solution covering the end 4 will not be flexed so suddenly as to cause it to rupture before the bubble is formed.

When the end 4 of the tube is dipped into a solution of soap and water some of the solution will be drawn, by capillary attraction, upwardly into each of the passages 7 and when the tube is withdrawn from the solution a film of the latter will cover its end. The end 8 of the tube is then brought adjacent the lips and by blowing steadily into this end the bubble will be formed which, when it reaches a certain size will drop from the end of the blower still leaving a film of soap solution covering the end. As successive bubbles are blown the solution contained in each of the passages 7 will flow therefrom to form the films covering the blower end as each formed bubble is dropped or shaken from the blower. The provision of the reservoir composed of the several passages 7 permits the retention in the blower of considerable soap solution with the result that a long succession of bubbles may be formed. When the supply of solution in the reservoir has been dissipated to the point where the film across the end of the blower will not be formed when the last bubble of a series has been blown or if the film is ruptured by the creation of too great a pressure in the blower tube, the user may obtain a novel effect by creating a strong draught through the tube which will pass through each of the passages 7 causing any solution contained therein to be ejected and thereby causing a shower of small bubbles to be discharged.

The size of the bubble which may be formed with the blower of my invention is limited by the size of the tube at the discharge end 4 which presents only a certain area which the bubble may cling to. While the bubbles formed with the blower are sufficiently large for most intents and purposes I have found that by the provision of a simple attachment for the end of the blower the diameter reached by the bubbles before they will drop from the blower end is materially increased. This attachment is shown in Figure 2 and comprises a length of wire bent to form a loop 11 the opposite ends of the wire being then directed radially outward and bent upwardly to provide a pair of spaced parallel arms 12. The attachment is connected with the blower as shown by the dot and dash lines of Figure 1, the arms 12 being inserted in a pair of the passages 7 the loop 11 being then disposed in slightly

spaced relation with the end of the blower. When the bubble is blown it will be in contact with the loop 11 of the attachment which, being of a larger diameter than the end of the blower permits the bubble to attain a much greater size before it will drop of its own weight from the loop.

The attachment just described permits of the attainment of novel effects not attainable with ordinary bubble blowers. It will be noted in Figure 1 that the center of the loop 11 is offset slightly from the axis of the blower tube. This permits the user, after a bubble has been formed on the attachment and while the bubble is still connected therewith to insert a smaller tube, such as a soda straw, which has been previously dipped in the soap solution, into the bubble through the film within the loop 11 so that upon blowing into the smaller tube one or more smaller bubbles will be formed within the main larger bubble. To attempt to do this without the attachment would result in bursting of the bubble. It appears that

the reason that the bubble does not burst when the smaller tube is inserted through the loop 11 is that the film of soap solution within the loop is thicker than that forming the rest of the bubble.

I claim:

A bubble blower comprising, in combination, a tube having open ends, said tubing adjacent one end thereof being provided with a plurality of apertures extending through the walls thereof for venting the interior of the tube to the atmosphere, a piece of corrugated sheet material bent to annular form and inserted in the other end of said tube, said corrugations of the sheet material cooperating in conjunction with the inner periphery of the tube to provide a plurality of passages in and opening at the end of the tube, and a wire member bent to form a loop positioned at the end of said tube, said wire member having arms extending therefrom slidably engaged in said passages.

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