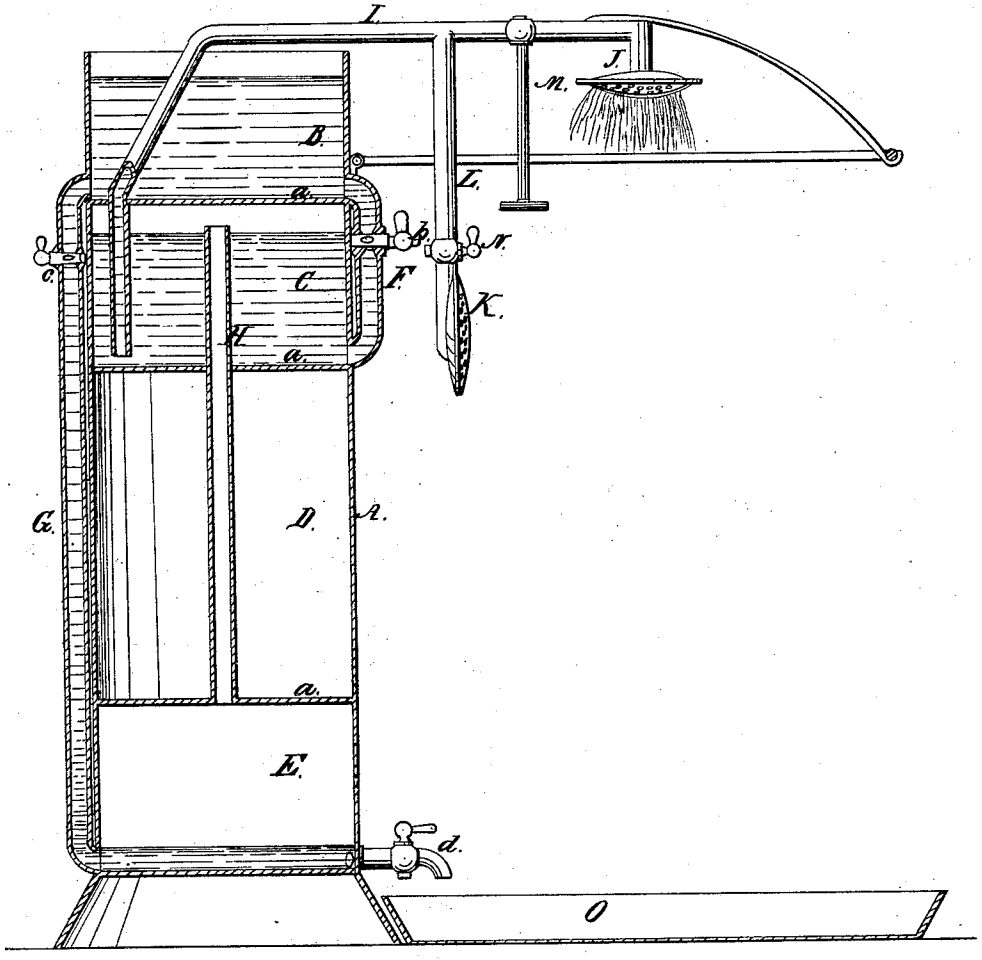
J. Mansfield,

Shower Bath.

No. 22,298, Patented Dec. 14, 1858



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UNITED STATES PATENT OFFICE.

JOSEPH MANSFIELD, OF JEFFERSON, WISCONSIN.

SHOWER-BATH.

Specification of Letters Patent No. 22,298, dated December 14, 1858.

To all whom it may concern:

Be it known that I, JOSEPH MANSFIELD, of Jefferson, in the county of Jefferson and State of Wisconsin, have invented a new and useful Improvement in Shower-Baths; and I do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the annexed drawing, making a part of this specification, said drawing being a vertical central section of my invention.

To enable those skilled in the art to fully understand and construct my invention I will proceed to describe it.

A, represents an upright sheet metal cylindrical chamber which is divided by horizontal partitions *a*, into four compartments or chambers B, C, D, E. The chambers B, C, E, are about of equal dimensions and the upper one B, is open at the top. The chambers B, C, are connected at their lower ends by a tube F, which is provided with a cock *b*, and the chambers B, E, are connected at their lower ends with a tube G, which is provided with a cock *c*. The chambers C, E, are connected by an air tube H, the lower end of which communicates with the upper part of E, and the upper part passes vertically up into chamber C, within a short distance of its top. The pipe H, passes vertically through the chamber D, but the latter chamber is not connected with any of the other chambers or with any of the tubes, said chamber serving merely as a support or standard. The chamber E, has a cock *d*, at its lower end.

I, is a pipe, one end of which passes into the chamber C, and nearly reaches its bottom—the opposite end projects out from the cylinder A, and has a horizontal rose J, attached to it. A vertical rose K, may also be used and attached to a pendent pipe L.

M, N, are cocks fitted respectively in the pipes I, L, to regulate or stop entirely the flow of water to the roses J, K.

The apparatus is used as follows:—The chamber B, is filled with water and the cock *b*, which was previously closed, is opened and the water in B, is allowed to escape through the tube F into the chamber C, the air in chamber C, passing down the pipe H, and escaping through the cock *d*, which is opened for the purpose. The cocks *b*, *d*, are then closed the chamber B, again filled, the cock *c*, in tube G, opened and the water in B, escapes through the tube G, down into the chamber E, forcing the air in E, upward through the pipe H, into C. The apparatus is now ready for use and a person standing under the rose J, and opening the cock M, will be subjected to a shower therefrom having a force due to the pressure of the air in C, which was displaced from E, and compressed into C, above the surface of the water therein by the water in B. The shower from the rose J, will have considerable force for the height of the fall of the water from B, will be sufficient to compress the air in C, to a considerable degree, the force of the shower greatly exceeding that of the ordinary portable baths which escape with a force due only to the static pressure of the water in a chamber corresponding to B, and with which the rose is directly connected.

By the within described invention the size of the bath is not necessarily increased, the height of the rose J, need not be greater than usual.

The device may be constructed equally as cheap as the ordinary ones in use, while by the arrangement shown, it is rendered far more efficient, as the increased force of the shower greatly enhances the utility of the device so far as health is concerned.

The rose K, is intended to give a shower for the back of the person. It may be used or not as desired. I would remark that the water in E, may be used for the shower if desired by drawing it through the cock *d*, and filling chamber C, as before, and the water that escapes from the rose J, may be used to expel the air from E, by catching it in a proper vessel O, and pouring it into B, it being observed that the latter water need not be brought in contact with the person a second time.

Having thus described my invention, I claim and desire to secure by Letters-Patent, as an improved article of manufacture—

A shower-bath having chambers B, C, tubes F, G, H, I, and stop cocks (*b*, *c*), substantially as herein shown and described.

JOSEPH MANSFIELD.

Witnesses:

ISAAC SAVAGE,

GEO. PORTER PAINE.