

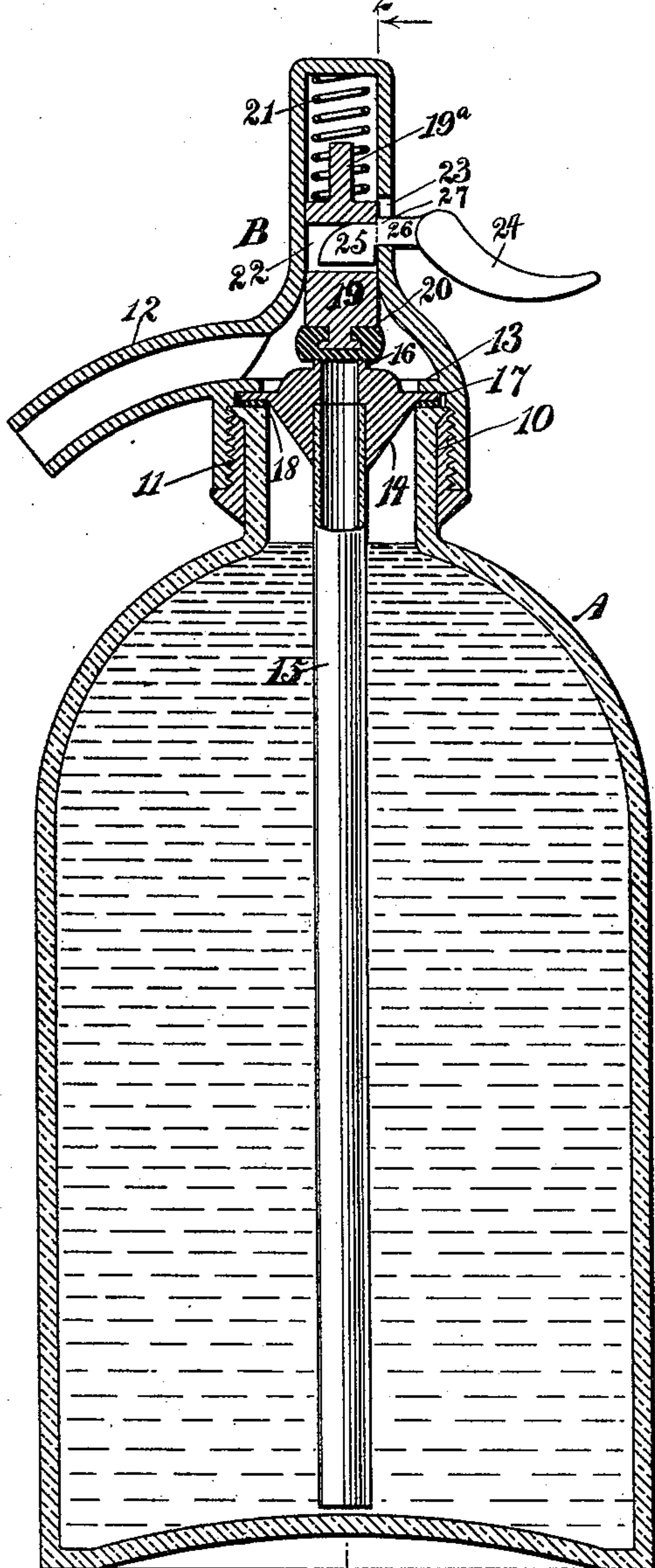
(No Model.)

E. STAHL.
SIPHON HEAD.

No. 585,165.

Patented June 22, 1897.

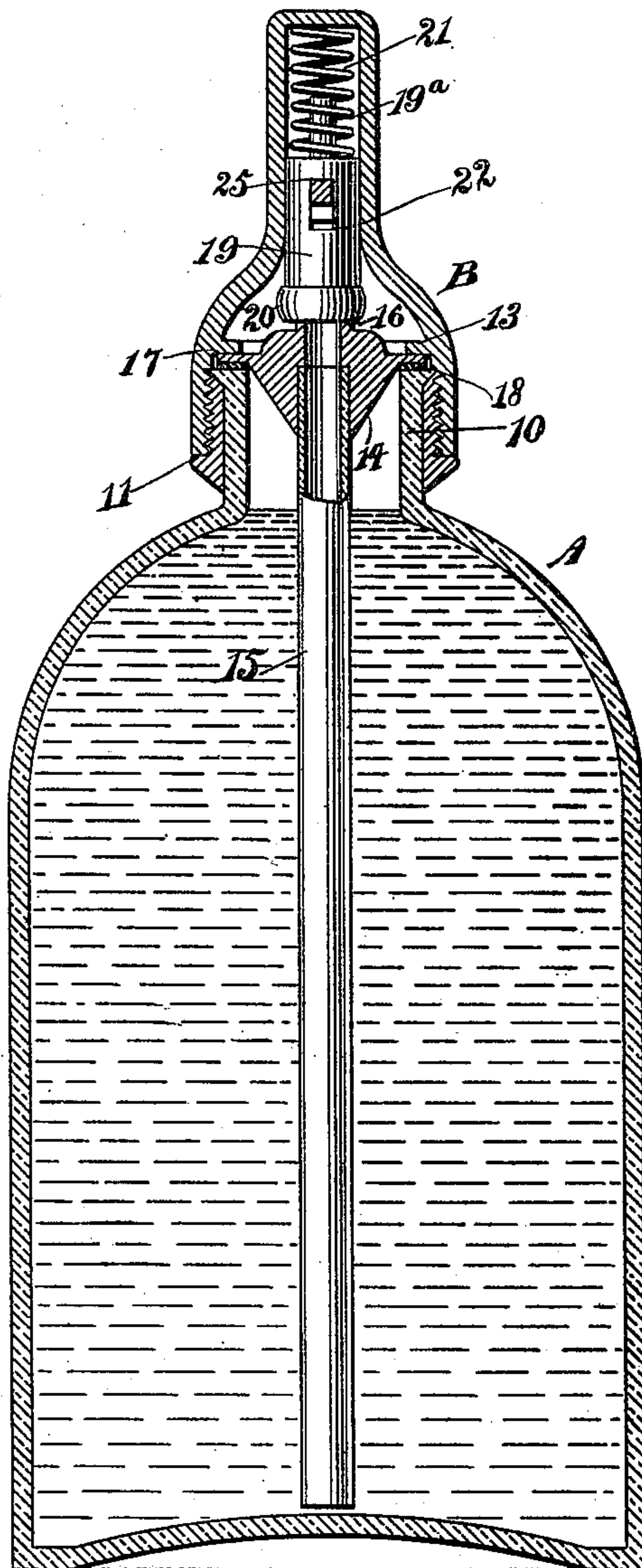
Fig. 1.



WITNESSES:

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Fig. 2.



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UNITED STATES PATENT OFFICE.

EMIL STAHL, OF HOBOKEN, NEW JERSEY, ASSIGNOR TO THE NEW YORK BOTTLERS SUPPLIES MANUFACTURING COMPANY, OF NEW YORK, N. Y.

SIPHON-HEAD.

SPECIFICATION forming part of Letters Patent No. 585,165, dated June 22, 1897.

Application filed April 10, 1896. Renewed April 17, 1897. Serial No. 632,665. (No model.)

To all whom it may concern:

Be it known that I, EMIL STAHL, of Hoboken, in the county of Hudson and State of New Jersey, have invented a new and Improved Siphon-Head, of which the following is a full, clear, and exact description.

My invention relates to an improvement in siphon-heads especially adapted for attachment to bottles containing mineral or other waters charged with gas; and the object of the invention is to so construct the siphon-head that in the event there should be an excess of gas in the bottle, which under ordinary circumstances would tend to explode the bottle, the said extra pressure of gas will cause the valve of the siphon-head to open sufficiently to admit of the discharge of such excess, thereby rendering the siphon-bottle perfectly safe against explosion.

Another object of the invention is to so construct the siphon-head that it will be simple, durable, and economic, containing but few parts, and wherein each and every part may be readily duplicated and all the parts expeditiously, conveniently, and thoroughly cleaned when occasion may demand.

The invention consists in the novel construction and combination of the several parts, as will be hereinafter fully set forth, and pointed out in the claims.

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

Figure 1 is a longitudinal vertical section through the improved siphon-head and the bottle to which it is applied; and Fig. 2 is a vertical section taken substantially on the line 2 2 of Fig. 1, the section in Fig. 2 being at right angles to that shown in Fig. 1 and the valve being in side elevation.

The bottle A may be of any desired shape, and its neck 10 is provided with the usual exteriorly-threaded sleeve 11. The head B is provided with the usual outlet-spout 12, and its interior is practically uninterrupted, except at that point which is to be above the mouth of the bottle when the head is in place thereon, and at this point an annular rib 13 is formed which extends over the upper edge of the bottle-mouth. A plug 14, preferably

made of metal, is ordinarily cast around the siphon-tube 15 and is a support for the said tube. The plug extends above the tube a predetermined distance, and at the upper end of its outlet a valve-seat 16 is formed. This supporting-plug for the siphon-tube is provided with an exterior horizontal flange 17, adapted to rest upon a washer 18, located upon the upper edge of the mouth of the bottle, and when the head is secured upon the neck of the bottle its interior flange 13 will bear downwardly upon the flange of the supporting-plug 14, holding it in place in a gas-tight manner. The valve-seat 16 of the plug is immediately back of the outlet-spout 12 of the siphon-head.

The valve which controls the outlet of the plug 14 consists of a body-section 19, which is held to slide in the upper reduced portion of the siphon-head, and the said body portion of the valve is provided with a stem 19^a at its upper end, around which a spring 21 is coiled, the said spring having bearing against the upper wall of the siphon-head and against the upper portion of the body of the valve, the said spring exerting constant downward pressure on the body of the valve and causing its face 20, which is made of rubber or other suitable material, to close the outlet of the supporting-plug 14 in an air-tight manner.

An opening 22 is made horizontally in the body 19 of the valve, and this opening in the valve is capable of registry with an opening 23, made in the siphon-head at that side opposite which the spout 12 is located. A lever 24 is employed to raise the valve, and the said lever 24 is provided with a head 25, adapted to be loosely fitted into the opening 22 of the body of the valve, being connected with the handle or exterior portion of the lever through the medium of a shank 26, the shank extending outward through the opening 23 in the siphon-head, and a shoulder 27 is formed at the intersection of the upper portion of the shank 26 and the head of the aforesaid lever, which shoulder, when the head of the lever is in position in the body of the valve, will engage with the exterior surface of the said valve-body at a point above its opening 22, as illustrated in Fig. 1. It will thus be ob-

served that the spring 21, in addition to normally seating the valve of the siphon-head, will also hold the lever 24 in operative position and that the said lever is practically
 5 fulcrumed in the head without the assistance of a pivot-pin, it simply being necessary to press downward the handle portion of the lever to raise the valve and permit of the exit of the charged liquid in the bottle A.

10 In assembling the parts the valve is pressed upward until its opening 22 registers with the opening 23 in the siphon-head. At that time the head portion of the lever 24 is introduced into the opening of the valve and when
 15 the valve is released the lever will be held securely in place. As there are practically no obstructions in the interior of the siphon-head, the entire head may be expeditiously and readily cleaned, and it is evident that
 20 any portion of the head may be duplicated in a convenient manner when necessary. It is also obvious that the bottle cannot explode, since if a surplus of gas accumulates the gas will simply lift the valve and find an escape
 25 through the spout 12, the valve closing automatically when the gas is at its normal pressure.

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

1. In a siphon-head, a spring-controlled valve located over and operating to normally close the outlet of the siphon-tube, the said valve having a body portion fitted to slide in
 35 the upper portion of the siphon-head and provided with a horizontal opening, and a re-

movable lever for raising said valve from its seat, the said lever extending through an opening in the siphon-head and having a head adapted to fit loosely in the opening in
 40 the valve-body, the lever being provided with a shoulder, at the intersection of the head with the shank adapted to engage the valve-body, as and for the purpose set forth.

2. In a siphon-head, a tubular supporting-
 45 plug adapted for connection with a siphon-tube, the upper end of the said plug forming a valve-seat, a valve adapted to normally rest on said seat closing the outlet of the said plug, the said valve having a body portion
 50 fitted to slide in the upper reduced portion of the siphon-head and provided with an opening extending horizontally through the body portion, a removable lever for raising said valve, the said lever having a head formed
 55 with a curved upper surface and adapted to fit loosely in the opening in the body of the valve, a shank connecting the head of the lever with the handle and extending outwardly through an opening in the siphon-
 60 head, and a shoulder formed at the intersection of the upper portion of the shank and the head of the lever and adapted to engage the exterior surface of the valve-body at a point above its opening, and a spring adapted
 65 to normally seat the valve and to hold the lever in operative position, as and for the purpose specified.

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Witnesses:

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