

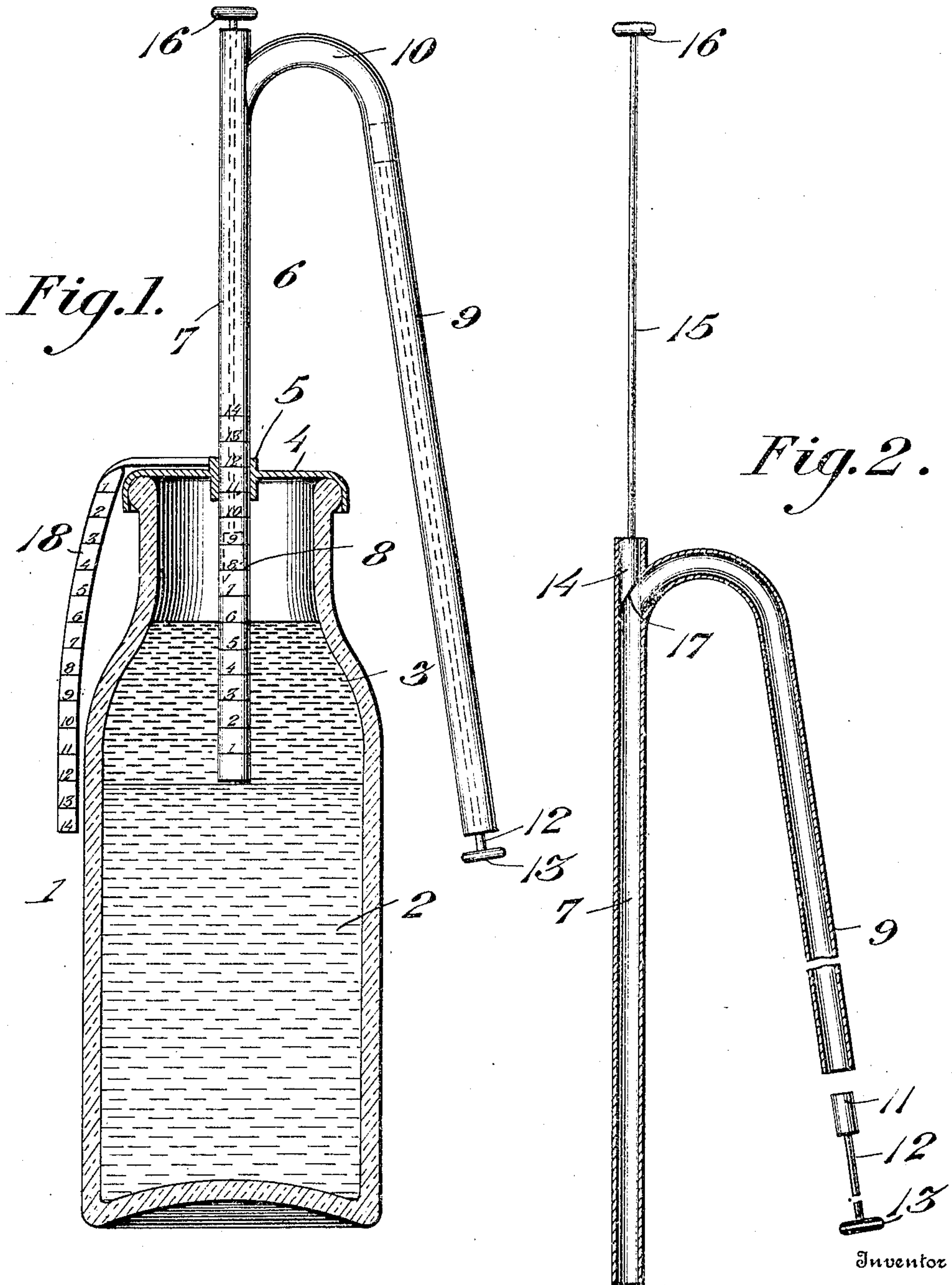
No. 872,232.

PATENTED NOV. 26, 1907.

C. HARBERT.

SIPHON SKIMMER.

APPLICATION FILED AUG. 8, 1906.



Witnesses

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CURTIS HARBERT, OF SMETHPORT, PENNSYLVANIA.

SIPHON-SKIMMER.

No. 872,232.

Specification of Letters Patent.

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To all whom it may concern:

Be it known that I, CURTIS HARBERT, a citizen of the United States of America, residing at Smethport, in the county of McKean and State of Pennsylvania, have invented new and useful Improvements in Siphon-Skimmers, of which the following is a specification.

My invention relates to a device for removing cream from milk receptacles in such a manner as to draw off the layer of cream without disturbing the underlying body of milk.

One object of the invention is to provide a simple and effective construction of siphon skimmer, whereby the operation of withdrawing the cream may be conveniently performed.

Another object is to provide a siphon having means for controlling the flow of the current of cream.

A still further object is to provide a gage for indicating the depth to which the siphon should be introduced into the bottle or container for the complete withdrawal of the layer of cream.

In the accompanying drawings,—Figure 1 is a sectional view of a milk bottle showing the application of the invention thereto. Fig. 2 is a sectional view of the siphon skimmer.

Referring to the drawings, 1 designates a milk receptacle, shown in the present instance in the form of a bottle of ordinary form and standard size to contain, say, a quart of milk; 2 designates a body of milk within the bottle; and 3, the superposed layer of cream which has risen from the milk.

In carrying my invention into practice I provide means for supporting the skimmer upon the neck of a bottle, the supporting means shown in the present instance comprising a cap 4 adapted to rest upon and engage the rim of the bottle neck. This cap is provided with a tubular guide sleeve 5 conforming in diameter to the short leg of the siphon 6. The said short leg 7 of the siphon comprises a tube open at each end and provided at its lower end with a scale 8 having graduations in inches with designating numerals extending upwardly in regular order from the lower end thereof. This gage may be of any suitable length and is provided to enable the leg 7 to be inserted a required depth in the bottle in an easy and convenient manner. The long leg 9 of the siphon

is connected in the usual manner to the upper end of the leg 7 by a goose neck or elbow 10, and within said leg 9 is arranged a plunger stopper 11 having a stem 12 terminating at its outer end in a knob or finger piece 13. A corresponding plunger 14 is arranged within the leg 7 and is similarly provided with a stem 15 carrying at its upper end a knob or finger piece 16. The lower end of the plunger 14 is curved, as shown at 17, so that when drawn up to its fullest extent it will conform to the arc of curvature of the upper wall of the part 10, to guide the discharging column of cream thereinto.

Suitably attached to the supporting cap 4 is a gage strip 18, preferably consisting of a section of metallic tape bearing an inch scale arranged in a reverse order to the scale upon the leg 7 of the siphon, namely, with the designating numerals thereon extending downwardly instead of upwardly.

In operation, the device is applied to the bottle in the manner shown in Fig. 1, the cap being first inserted into position and the gage 18 allowed to depend on one side of the bottle. By reference to this gage 18 the operator may determine from exterior visual observation the extent to which the leg 7 should be inserted in the bottle to bring the lower end thereof down to the bottom of the layer of cream 3. It will be observed in the present instance that the numeral 12 on the scale 18 registers with the line of demarcation between the body of milk and layer of cream, thus indicating that the leg 7 should be inserted to the depth of twelve inches. The leg 7 is passed through the guide sleeve 5 in the cap and forced downward until the scale line 12 thereon registers substantially with the upper surface of the cap, the siphon being supported by the frictional engagement between the leg 7 and wall of the sleeve 5. After the parts have been applied, the plunger 14 is drawn upwardly until it occupies the position shown in Fig. 2, thus forming a partial vacuum in the siphon, which causes the cream to flow upward in the leg 7 until communication is established with elbow 10, so that the column of cream will discharge through leg 9 as soon as the stopper 11 is withdrawn therefrom.

It will thus be seen that my invention provides a convenient and simple form of device by which the layer of cream arising from the milk in a bottle may be conven-

iently withdrawn without withdrawing any of the milk, and by which the short leg of the siphon skimmer may be accurately adjusted to draw off the cream.

5 Having thus described the invention, what is claimed as new, is:—

1. A siphon skimmer attachment for milk bottles comprising a supporting member for closing the mouth of the bottle, said mem-
10 ber being provided with a guide sleeve, a siphon having its intake leg slidably mounted in said sleeve and provided with a scale having designating numerals extending in increasing valuation upwardly from the low-
15 er end thereof for coaction with a portion of said supporting member, and an indicating strip carried by said supporting member and projecting downward at one side thereof to depend upon the exterior of the
20 bottle, said strip being provided with a cooperating scale having its designating numerals extending downwardly thereon.

2. A siphon skimmer attachment for milk bottles comprising a supporting member
25 adapted to engage the mouth of the bottle, a siphon having its intake leg slidably mounted in said supporting member and provided with a gage comprising a set of designating numerals extending upwardly thereon for
30 coaction with said supporting member, and a gage strip carried by the supporting member and projecting downward at one side thereof to depend upon the exterior of the bottle, said gage being provided with a co-
35 operating set of designating numerals extending downwardly thereon.

3. A siphon skimmer attachment for milk bottles comprising a flanged cap adapted to

engage the mouth of the bottle, said cap being provided with a guide sleeve, a siphon 40 having its intake leg slidably mounted in said sleeve and provided with scale graduations and designating numerals extending upwardly in increasing value from the lower end thereof for coaction with said cap, and 45 a flexible gage strip secured at one end to the cap and projecting downward at one side thereof to depend therefrom upon the exterior of the bottle, said strip being provided with a cooperating set of graduations 50 and designating numerals extending downwardly in increasing valuation.

4. A siphon skimmer attachment for milk bottles comprising a flanged cap having a central guide sleeve, a siphon having a short 55 leg open at both ends and slidably mounted in said sleeve, and a long leg connected at its upper end with said short leg below the upper end of the latter, the lower portion of the short leg of the siphon being provided 60 with a scale having numerals extending upwardly thereon for coaction with a portion of the cap, stoppers slidably mounted in the legs of the siphon, and a gage strip connected at its upper end with the cap and depending 65 at one side therefrom to project down upon the outside of the bottle, the numerals upon said strip being arranged in reverse order to the numerals of the scale on the siphon.

In testimony whereof, I affix my signature 70 in presence of two witnesses.

CURTIS HARBERT.

Witnesses:

HARRIS SOMERS,
FRANK ZUPP.