

No. 682,223.

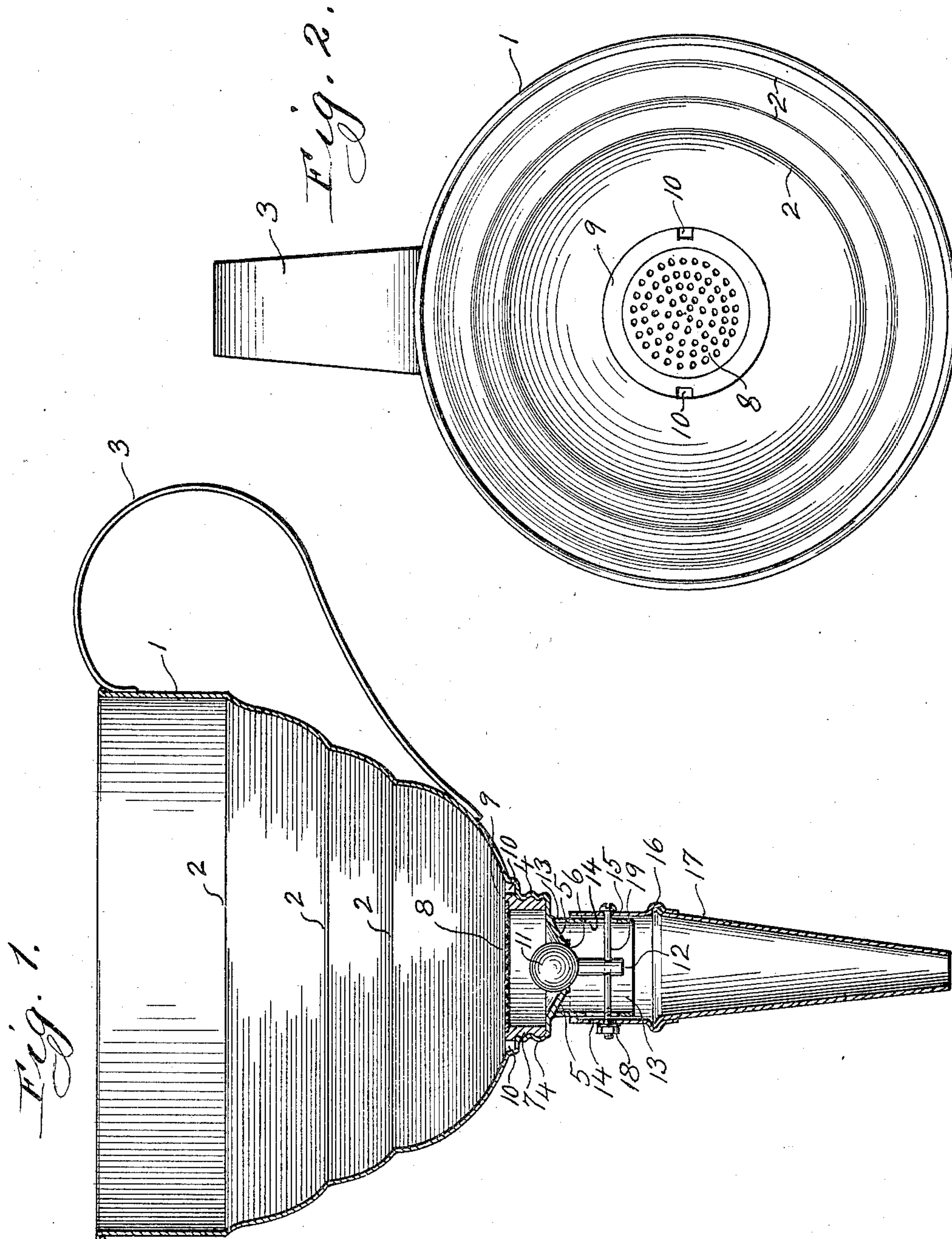
Patented Sept. 10, 1901.

G. NEUDECKER.

MEASURING FUNNEL AND STRAINER.

(Application filed Dec. 28, 1900.)

(No Model.)



Witnesses:
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UNITED STATES PATENT OFFICE.

GOTTLIEB NEUDECKER, OF CHICAGO, ILLINOIS.

MEASURING-FUNNEL AND STRAINER.

SPECIFICATION forming part of Letters Patent No. 682,223, dated September 10, 1901.

Application filed December 28, 1900. Serial No. 41,355. (No model.)

To all whom it may concern:

Be it known that I, GOTTLIEB NEUDECKER, a citizen of the United States of America, and a resident a Chicago, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Measuring-Funnels and Strainers, of which the following is a specification.

My invention relates to the class of funnels which are particularly designed for filling bottles, jugs, &c., and for straining and measuring the quantity of liquid passing through the funnel.

The main objects of my invention are to provide a simple device of this character consisting of separable parts which may be readily detached for the purpose of cleaning the same and to provide a structure which is positive in its action and can be readily made by the metal-spinner. I accomplish these objects by the device shown in the accompanying drawings, in which—

Figure 1 is a vertical section of a funnel constructed according to my invention, and Fig. 2 is a top plan of same.

The body or liquid-receptacle of the funnel has a series of horizontal measuring-ridges 2 formed in its side walls. Said body is provided with a handle 3. At the lower part of the body is a threaded section 4. Below said threaded section the walls of the body continue inwardly and downwardly to form the valve-seat 5, surrounding the discharge-port 6. The sleeve 7 is threaded into the section 4 and has a strainer or perforated disk 8 secured upon its upper end. The flange 9 of the sleeve 7 is provided with recesses 10, adapted to receive a key for turning the sleeve 7 in the threaded section 4. The valve or ball 11 rests normally upon the valve-seat 5 and has a rigid stem 12 projecting downwardly through the discharge-port 6. The tubular extension 13 is rigidly secured to the body 1 around said valve-seat and extends downwardly for a considerable distance below the discharge-port 6. The tubular extension 13 has the opposite vertically-disposed slots 14 in its side walls. The sleeve 15 surrounds the extension 13 and is vertically slidable thereon. Said sleeve 15 has the outer annular shoulder 16 and has the spout 17, forming an extension of said sleeve. The nut

18 is rigidly secured to the sleeve 15. Said sleeve and the stem 12 are perforated to receive the threaded pin 19.

The operation of my device is as follows: When the device is supported by the handle 3, the lower parts will hang in the position shown in Fig. 1. The valve is now closed, and the receptacle 1 may be filled with liquid. To fill a bottle from the funnel, the operator will now insert the spout 17 in the mouth of the bottle, with the shoulder 16 resting upon the top of the bottle-neck. The operator will now release the handle 3, and thus permit the weight of the body 1 to force the extension 13 downwardly in the sleeve 15. This will lower the valve-seat 5 from the valve 11 and permit the liquid to flow through the discharge-port 6. The slots 14 will permit the body 1 to be moved downwardly relatively to the pin 19. To stop the flow of liquid at any time, the operator will raise the receptacle 1 by means of its handle. The weight of the spout 17, sleeve 15, and valve 11 will then draw the valve down upon its seat. To separate the parts for cleaning, the operator will turn the pin 19 so as to remove same from its threaded seat in the nut 18. The pin will then be withdrawn from the stem 12 and will be entirely removed from the sleeve 15. The sleeve 15 can then be removed from the lower end of the extension 13. The threaded sleeve 7 will then be removed from the threaded section 4 by turning the same with a key acting in the recesses 10. The valve 11 may now be removed through the upper part of the receptacle 1.

It will be understood that some of the details of the structure shown may be altered without departing from the spirit of my invention. I therefore do not confine myself to such details, except as hereinafter limited in the claims.

I am aware of patents to Hoagland, dated February 23, 1875, to Kayser, dated February 18, 1893, and to Poston, dated April 7, 1896, and do not claim the construction shown in either of said patents.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. A measuring-funnel and strainer comprising a liquid-receptacle having a discharge-port at the bottom, having a tubular threaded

section above said discharge-port, and having its side walls provided with a series of horizontal measuring-ridges at different heights above said threaded section; a threaded sleeve
 5 removably seated in said threaded section and having a strainer secured to and covering its upper end; a valve seated below said strainer and having a stem extending downwardly through said discharge-port; a discharge-
 10 spout detachably secured to said stem, said spout having an outer annular shoulder above its free end, and being vertically movable relatively to said receptacle; and a downward extension or guide secured to said receptacle
 15 for directing the relative vertical movement of said spout and receptacle.

2. A funnel comprising a liquid-receptacle having a discharge-port at the bottom; a tubular extension rigidly secured to said recep-
 20 tacle and extending below said discharge-port, and having a pair of opposite vertically-disposed slots in its side walls; a sleeve telescoping with said tubular extension, vertically slidable thereon, and having an outer annu-
 25 lar shoulder above its free end; a valve seated in said receptacle and having a central stem extending downwardly through said discharge-port; and a pin detachably securing
 30 said sleeve to said stem, passing through said slots and vertically slidable therein.

3. A funnel comprising a liquid-receptacle having a discharge-port at the bottom; a valve seated above said discharge-port and having
 35 a stem extending downwardly through said discharge-port and with an aperture passing horizontally through said stem; a tubular extension rigidly secured to said receptacle and

extending below said discharge-port, and having a pair of opposite vertically-disposed slots in its side walls; a sleeve telescoping with
 40 said tubular extension, vertically slidable thereon, and having an outer annular shoulder above its free end, and an aperture in each side opposite said slots and above said
 45 shoulder; and a pin passing through said slots and through the apertures in said sleeve and stem and vertically slidable in said slots.

4. A funnel comprising a liquid-receptacle having a discharge-port at the bottom; a valve seated above said discharge-port and having
 50 a stem extending downwardly through said discharge-port and with an aperture passing horizontally through said stem; a tubular extension rigidly secured to said receptacle and
 55 extending below said discharge-port, and having a pair of opposite vertically-disposed slots in its side walls; a sleeve telescoping with said tubular extension, vertically slidable thereon, and having an outer annular shoul-
 60 der above its free end, and an aperture in each side opposite said slots and above said shoulder; said sleeve having a threaded seat at one of its apertures; and a pin passing
 65 through said slots and through the apertures in said sleeve and stem, being threaded into said threaded seat and vertically slidable in said slots.

Signed at Chicago this 26th day of December, 1900.

GOTTLIEB NEUDECKER.

Witnesses:

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