

(No Model.)

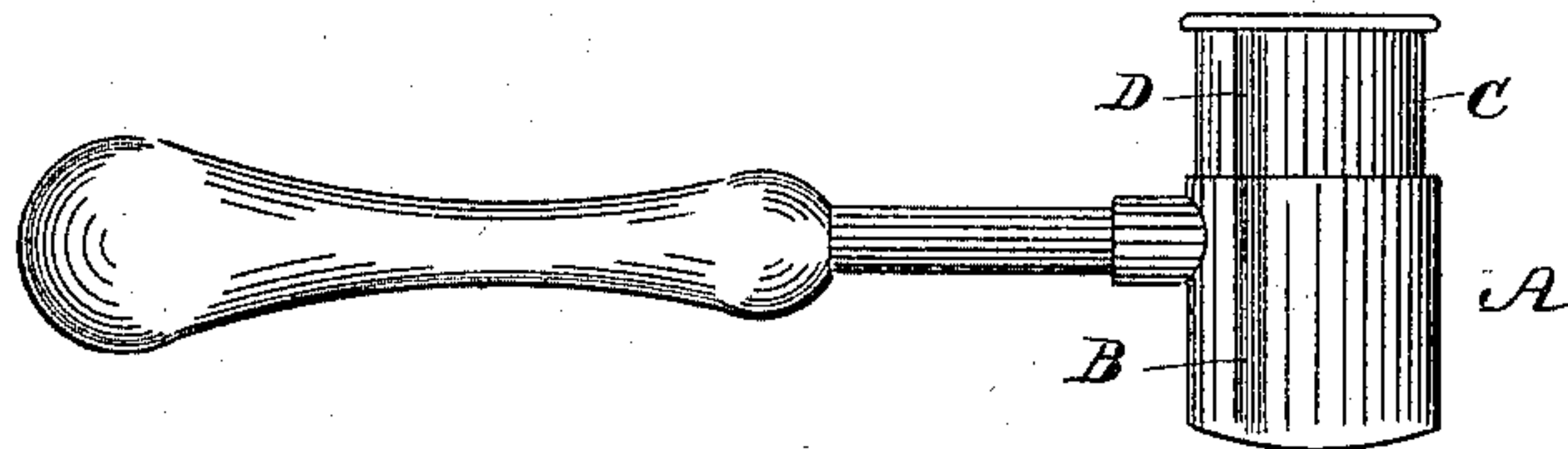
A. D. MOULTON.

POWDER MEASURE.

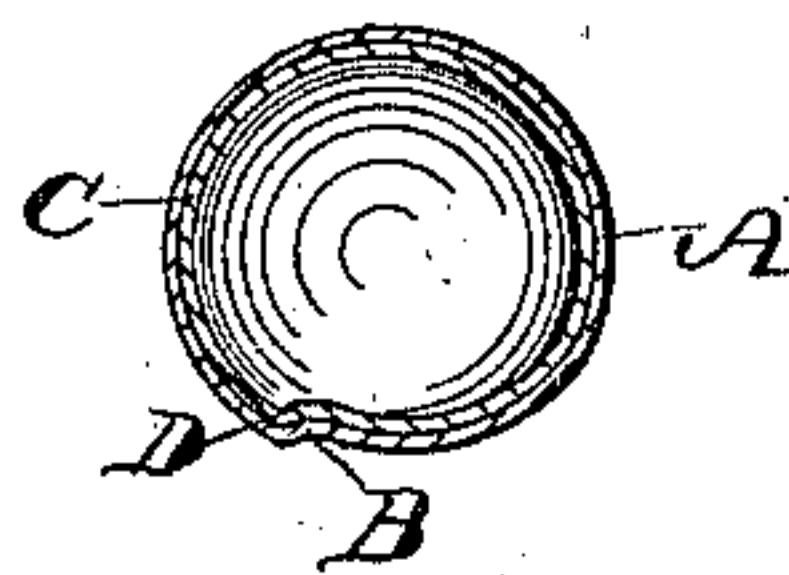
No. 301,257.

Patented July 1, 1884.

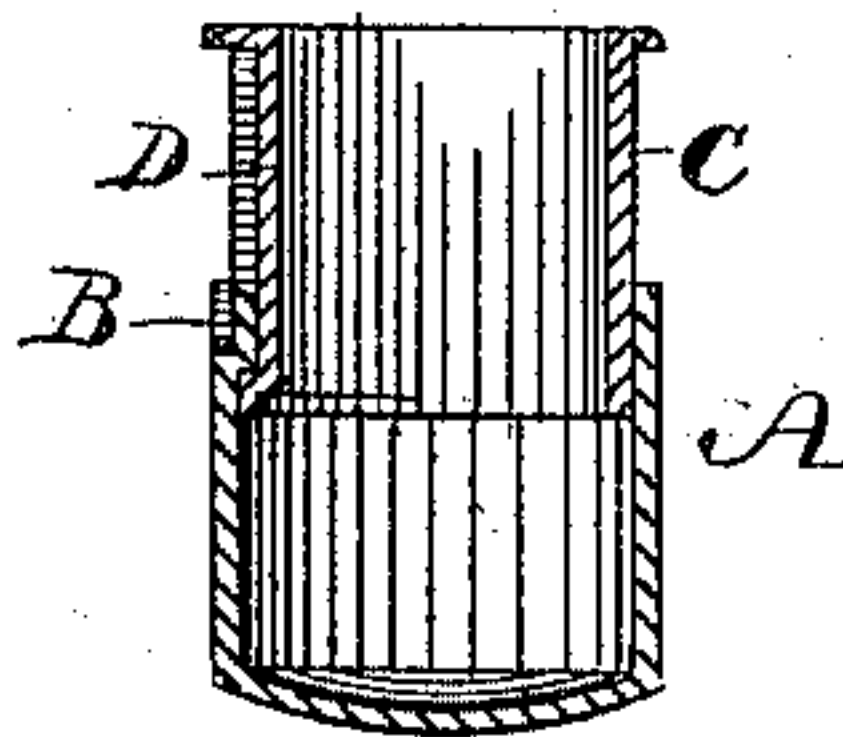
*Fig. 1.*



*Fig. 2.*



*Fig. 3.*



Witnesses  
*S. Williamson*  
*W. J. Hurland*

Inventor  
*Alvin D. Moulton*  
By *Smith and Subbary*  
*Atty's*

# UNITED STATES PATENT OFFICE.

ALVIN D. MOULTON, OF BRIDGEPORT, CONNECTICUT.

## POWDER-MEASURE.

SPECIFICATION forming part of Letters Patent No. 301,257, dated July 1, 1884.

Application filed February 11, 1884. (No model.)

*To all whom it may concern:*

Be it known that I, ALVIN D. MOULTON, a citizen of the United States, residing at Bridgeport, in the county of Fairfield and State of Connecticut, have invented certain new and useful Improvements in Powder - Measures; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to certain novel and useful improvements in devices for measuring, but more especially to that description of measure commonly used for accurately determining charges of powder or shot, and has for its object to provide a measure which shall be simple and economical in its construction, which may be readily adjusted to contain any desired charge, and which shall do away with the means heretofore used in such measures for changing their capacity and the means for holding the measure at any desired point; and with these ends in view my invention consists in the details of construction and combination of elements hereinafter fully and in detail explained, and then specifically designated by the claims.

In order that those skilled in the art to which my invention appertains may more fully understand its construction and operation and how to make and use the same, I will proceed to describe my improvement in detail, referring by letter to the accompanying drawings, forming a part of this specification, in which—

Figure 1 is a side elevation of my improvement with the inner cup pulled out; Fig. 2, a cross-section of the two cups assembled in their proper relative position; Fig. 3, a longitudinal section of the cups, illustrating a modified form of cam by means of which the inner cup may be prevented from being pulled entirely out of the outside cup.

Similar letters denote like parts in the several figures of the drawings.

A is a cup, constructed in any desired manner, which I preferably form by drawing from sheet metal, and provided upon one side with a shallow indentation, B, which forms upon the inside of the cup a cam-surface, for the purpose presently explained.

C is a shell, open at both ends, adapted in size to fit closely within the cup A, and provided with an indentation, D, adapted to fit the cam-surface upon the inside of the cup A.

H is a handle, attached by any means to the cup A.

The operation of my improvement is as follows: The shell C is fitted within the cup A, so that the cam-surface upon the inside of said cup engages with the indentation upon the shell C. The shell C is adapted to slide easily within the cup A, and may be pulled upward from said cup to any part of its length, thus increasing the capacity of the measure in proportion to the height of the shell above the cup. The object of the cam-surfaces, formed by the indentations described, in the cup and shell is to bind said cup and shell firmly at any desired point. This is effected by merely applying rotary motion to the inner shell when its cam-surface rides up on the cam-surface on the inside of the cup, thereby binding the two parts of the measure firmly together and adapting it to contain any charge desired. When desired, it is only necessary to rotate the inner shell so that the cam-surfaces engage once more one with the other, and the shell may then be freely moved to any point desired.

In my improvement the construction of the portions of the measure with engaging cam-surfaces presents many obvious advantages. By their use I am enabled to do away with the crude methods of fastening the inner and outer shells heretofore in use in powder-measures, and with the false bottom, which has before been an essential feature of adjustable measures and an item of expense in their manufacture. By the use of my device the measure may be quickly, accurately, and firmly secured to contain any desired charge.

It is not necessary, in the construction of my improved measure, that the indentations forming the cam-surfaces should extend the whole length of the perpendicular of the cup and sleeve, as an indentation ceasing near the top of the cup acts as a stop to prevent the shell from being pulled entirely out.

In my improvement I do not wish to be confined to the exact style or construction shown in the drawings, for, should it be so desired, the cam-surfaces may be made spiral, and not parallel to the axis of the cup, as shown.



Neither do I wish to be confined to the use of the sliding shell merely, nor to the attachment of the handle to the cup itself, for, when desired, the shell may be arranged around the  
5 outside of the cup, as a sleeve, and the handle attached to it.

By the use of several concentric sleeves and a cup I am enabled to produce a measure which when closed will contain a large amount  
10 of powder or shot.

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

1. In a powder-measure, the combination of  
15 an interior shell and an exterior cup, each cam-shaped in section, whereby when rotated one upon the other they are clamped in position.

2. In a powder and shot measure, the two

shells arranged one within the other, and having  
20 depressions extending longitudinally thereof, whereby one of the shells may be partially withdrawn and secured in this position by forcing said depressions out of alignment  
25 with each other, substantially as set forth.

3. A powder and shot measure consisting of two parts—one telescoping within the other—and having longitudinal V-shaped depressions, whereby said parts may be secured at  
30 any vertical adjustment by forcing the projection of one depression against the upper incline of the other, substantially as set forth.

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

ALVIN D. MOULTON.

Witnesses:

W. T. HAVILAND,  
S. S. WILLIAMSON.