

No. 709,858.

Patented Sept. 30, 1902.

B. ARTHURS.

MEASURING AND EMPTYING DEVICE FOR BOTTLES.

(Application filed Dec. 27, 1901.)

(No Model.)

Fig. 1.

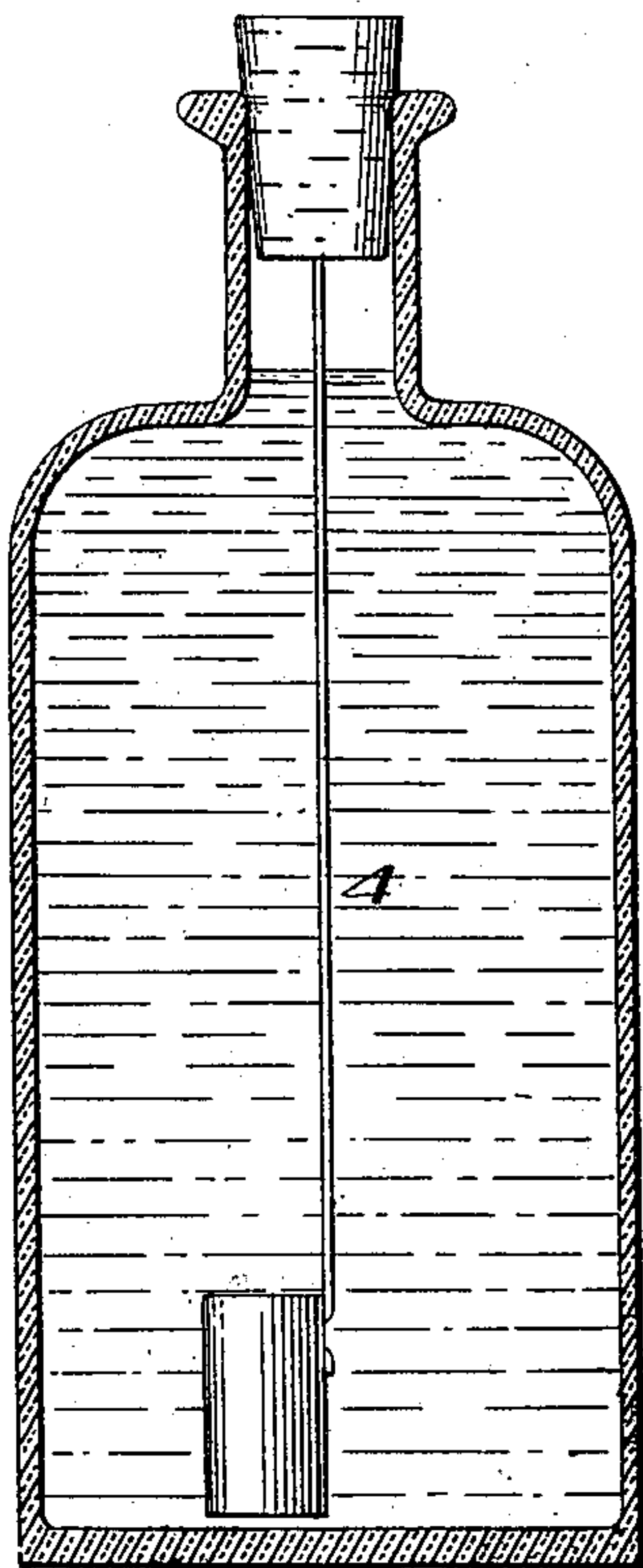


Fig. 3.

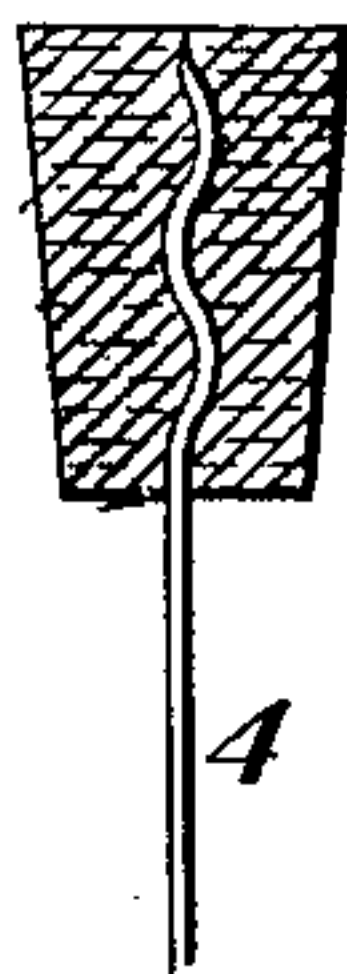


Fig. 2.



Fig. 8.

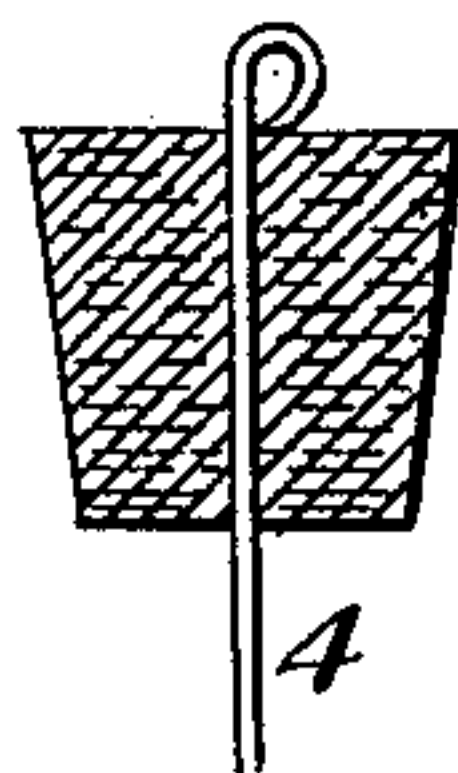


Fig. 5.

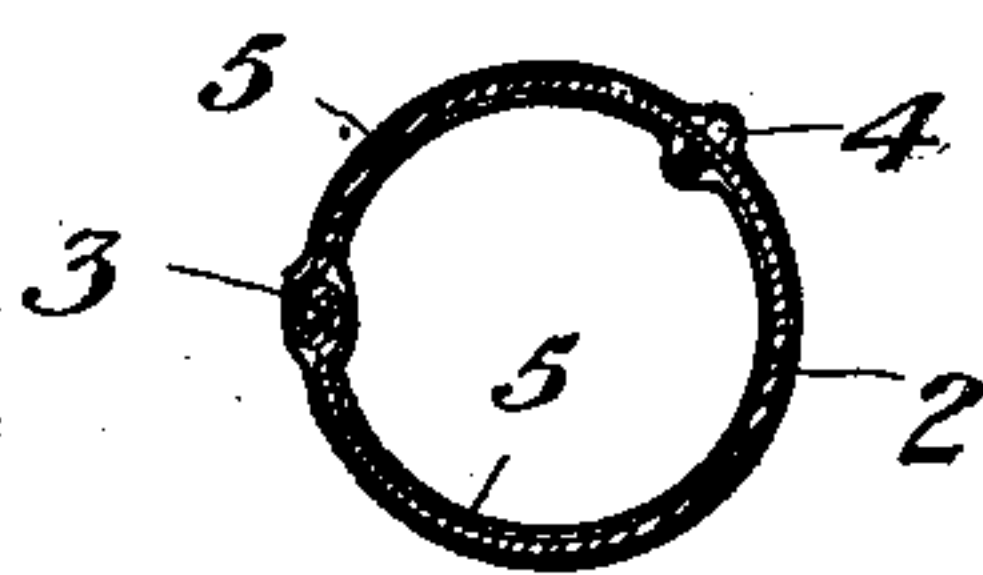


Fig. 6.

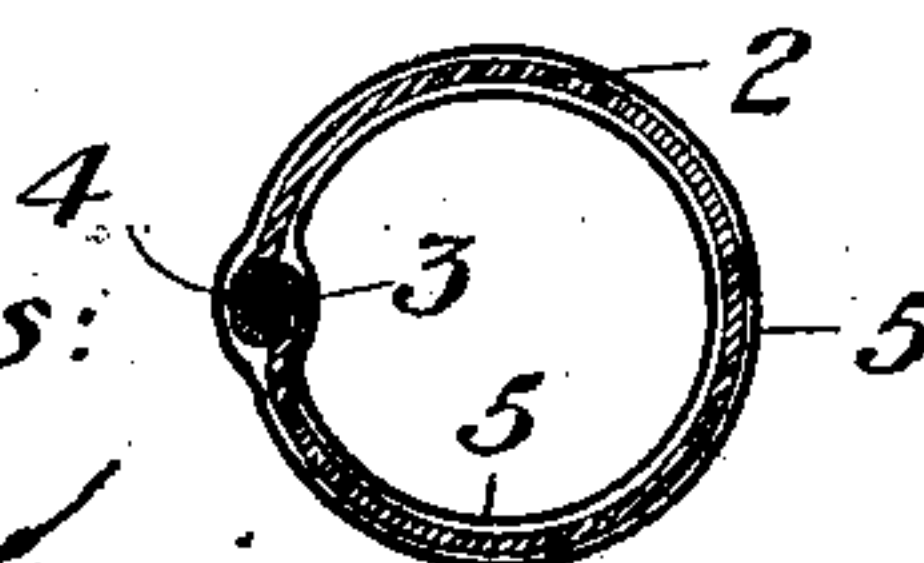


Fig. 7.

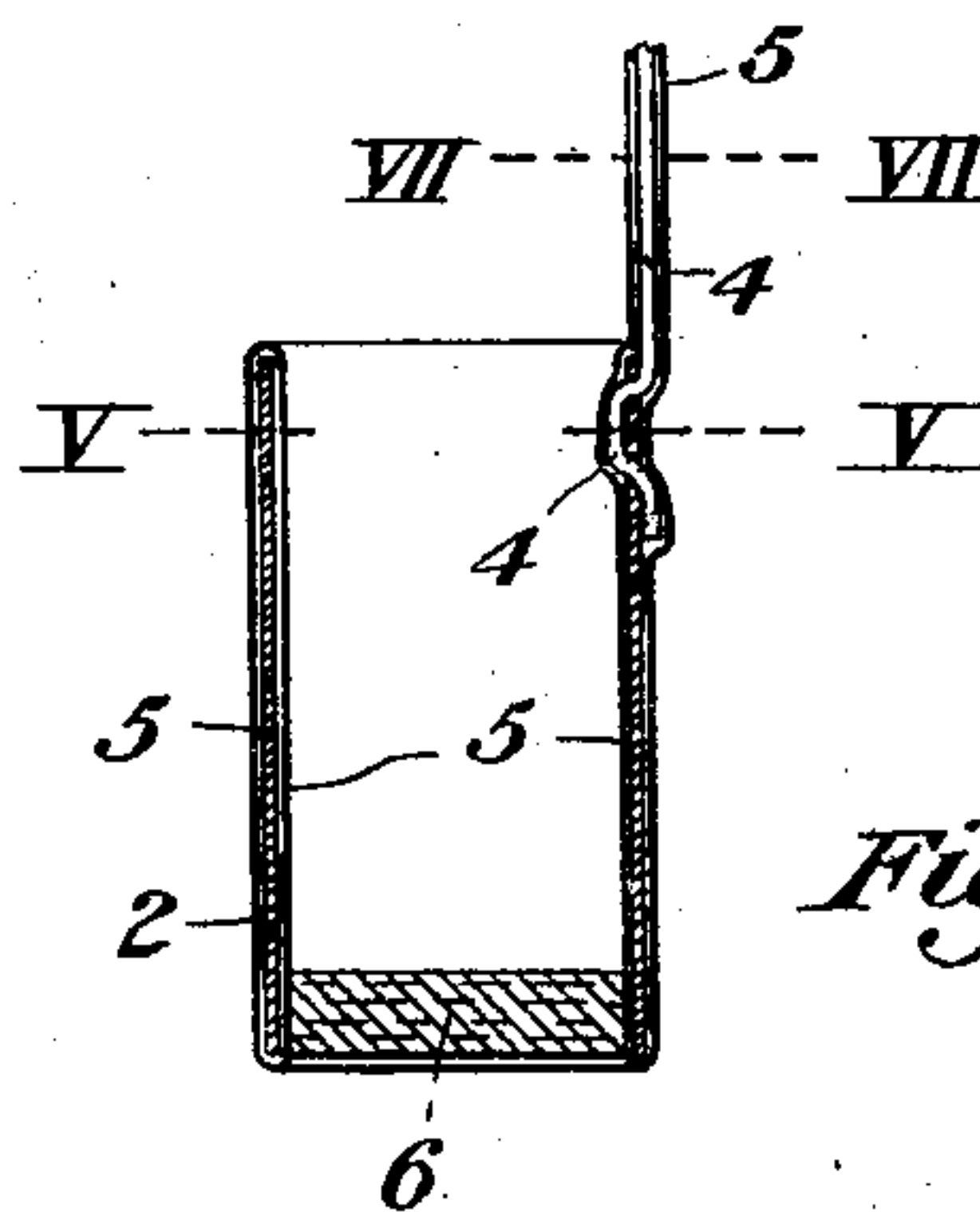


Fig. 4.

Witnesses:

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UNITED STATES PATENT OFFICE.

BIDDLE ARTHURS, OF PITTSBURG, PENNSYLVANIA.

MEASURING AND EMPTYING DEVICE FOR BOTTLES.

SPECIFICATION forming part of Letters Patent No. 709,858, dated September 30, 1902.

Application filed December 27, 1901. Serial No. 87,444. (No model.)

To all whom it may concern:

Be it known that I, BIDDLE ARTHURS, a citizen of the United States, residing at Pittsburg, in the county of Allegheny and State of Pennsylvania, have invented certain new and useful Improvements in Measuring and Emptying Devices for Bottles, &c., of which the following is a specification, reference being had therein to the accompanying drawings, forming part of this specification, in which—

Figure 1 is a vertical sectional view of a bottle provided with my improved device. Fig. 2 is a perspective view of the device detached, on an enlarged scale, part of the covering being broken away. Fig. 3 is a detail view showing the upper end of the stem bent in waving or spiral form to provide a better hold in the cork. Fig. 4 is a vertical sectional view of the cup. Fig. 5 is a cross-sectional view on the line V V of Fig. 4. Fig. 6 is a similar view showing the stem secured in the joint between the edges of the cup. Fig. 7 is a cross-sectional view through the stem on the line VII VII of Fig. 4, on an enlarged scale, illustrating the enameling. Fig. 8 is a detail view showing a modified construction, illustrating the stem passed through the cork and turned around, providing a holding-terminal.

My invention relates to devices for withdrawing the contents of bottles, jars, and similar vessels in measured quantities without loss from dripping and in a convenient manner.

The device consists of a cup, preferably cylindrical, which is made of a short shell of proper length and diameter to hold the desired amount of liquid, formed of thin sheet metal 2, the edges of which are joined in any suitable manner, as indicated at 3, while to the upper edge of such cylinder is attached a wire 4 by passing it one or more times through the shell or securing it in any other suitable or convenient manner. As thus made the wire constitutes a stem, which is of sufficient length to lower the cylinder to the bottom of the bottle in which it is to be used. For the purpose of preventing corrosion of the metal and preventing the consequent injurious effects when used with medicine, for instance, and also for the purpose of providing a finished surface inside and out the cyl-

inder and stem are then covered with a suitable coating substance 5, as enamel, which entirely envelops the metal at all parts, thus effectually preventing exposure of the metal to the contents of the bottle. The lower end of the cylinder after having been thus coated is closed by a stopper or plug 6, preferably of cork or of any other suitable material, inserted into the lower end, forming a fluid-tight bottom for the cylinder, and thus providing a cup. The bottom of the cup may, however, be formed of the metal shell or in any convenient or suitable manner. The upper end of the stem 4 is to be firmly inserted into the cork, as indicated in Figs. 1, 3, and 8, when the device is ready for use, when by withdrawing the cork the cup will be raised with it full of the contents of the bottle. For the purpose of more securely inserting the top of the stem into the cork the stem may be corrugated, flattened, or bent in waving form, as indicated in Fig. 3, or, if preferred, the stem may be inserted clear through the cork and bent over by pliers, as indicated in Fig. 8. An especial advantage of such construction is that the upwardly-extending loop thus formed provides a convenient projection by which the device may be grasped by the fingers to withdraw it, while the corks may also be made of a corresponding less length. This feature is of advantage in reducing the length of the cork and thereby compensating for any extra cost caused by possible increase of diameter.

It will be understood that the cup may be of different sizes or shapes, according to the ends in view.

I am aware that measuring and dropping devices have been patented somewhat similar in their general characteristics and mode of operation; but heretofore such articles have been made of glass, involving great difficulty and expense in manufacture and liability to breakage, whereas in my invention these difficulties have been overcome, and the device is practicable, efficient, cheap, and durable.

Having described my invention, what I claim is—

1. A measuring-cup for bottles, &c., consisting of a cylindrical metallic shell, a wire secured thereto and constituting a stem adapted to be inserted in a cork, a coating of en-

amel covering the stem and the inner and outer surfaces of the shell, and a bottom inserted in the lower end of the shell.

2. A measuring-cup for bottles, &c., consisting of a cylindrical metallic shell, a wire secured thereto and constituting a stem adapted to be inserted in a cork, a coating of enamel covering the stem and the inner and

outer surfaces of the shell, and a bottom of cork inserted in the lower end of the shell. 10

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

BIDDLE ARTHURS.

Witnesses:

J. F. MCKENNA,

C. M. CLARKE.