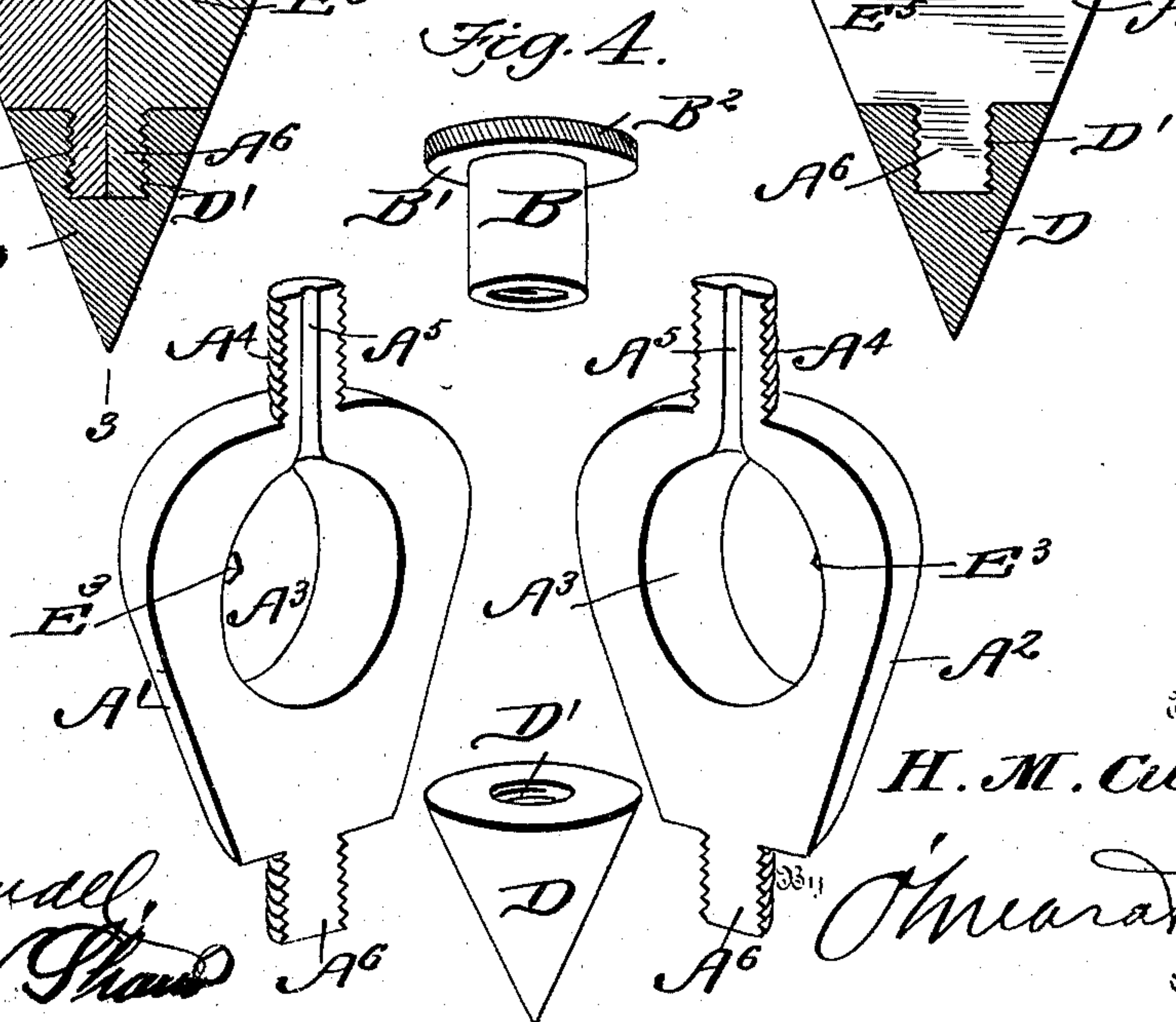
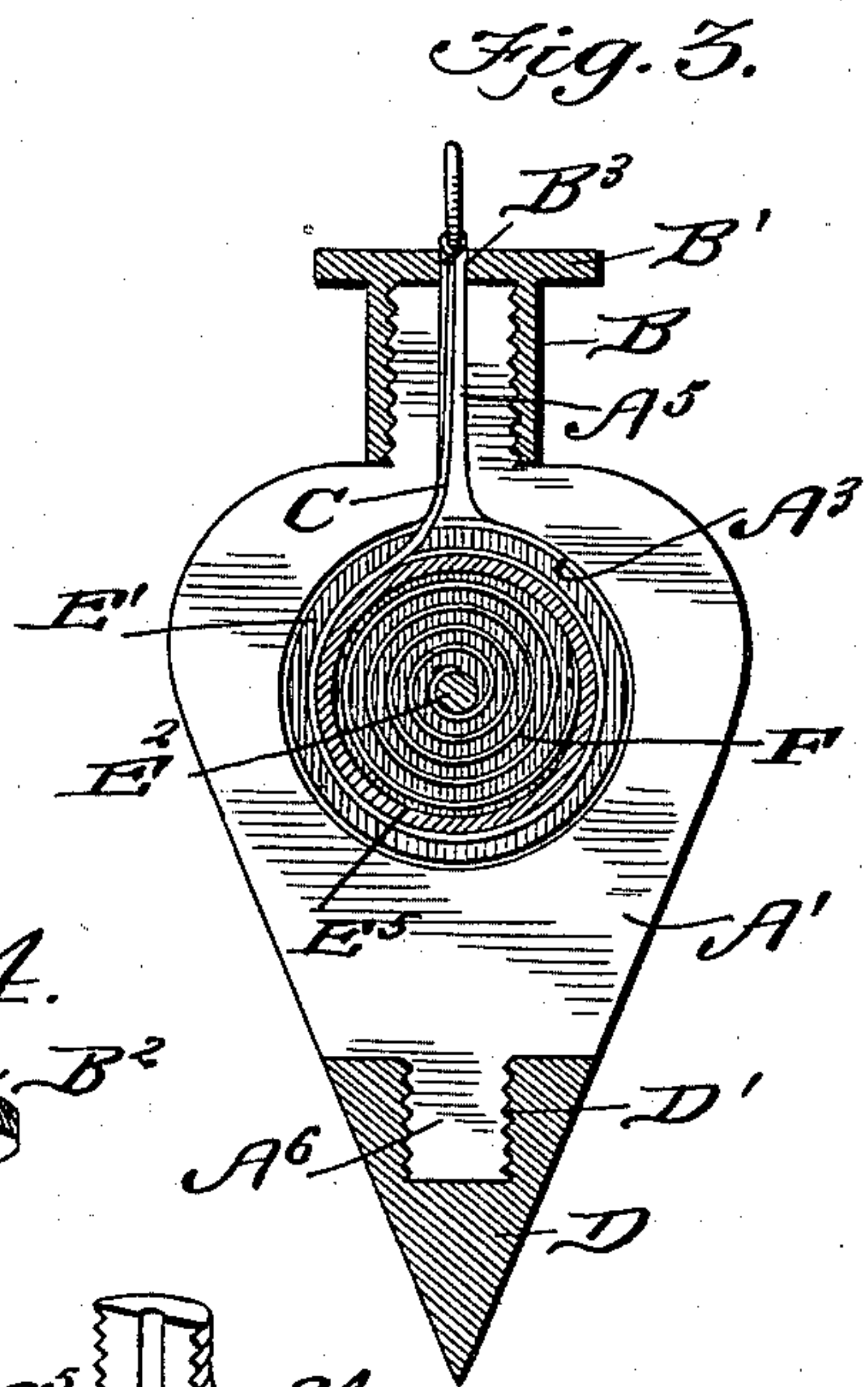
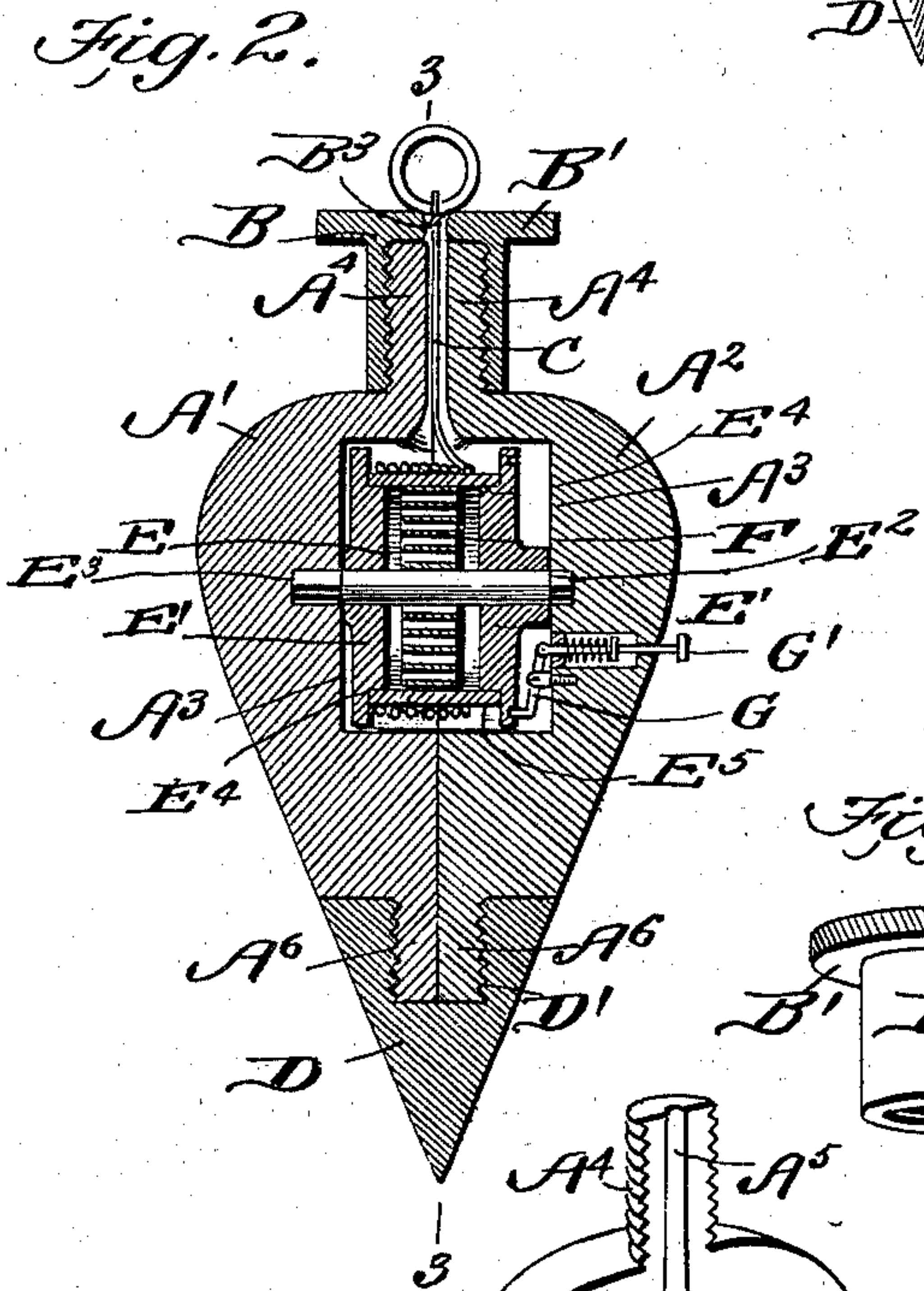
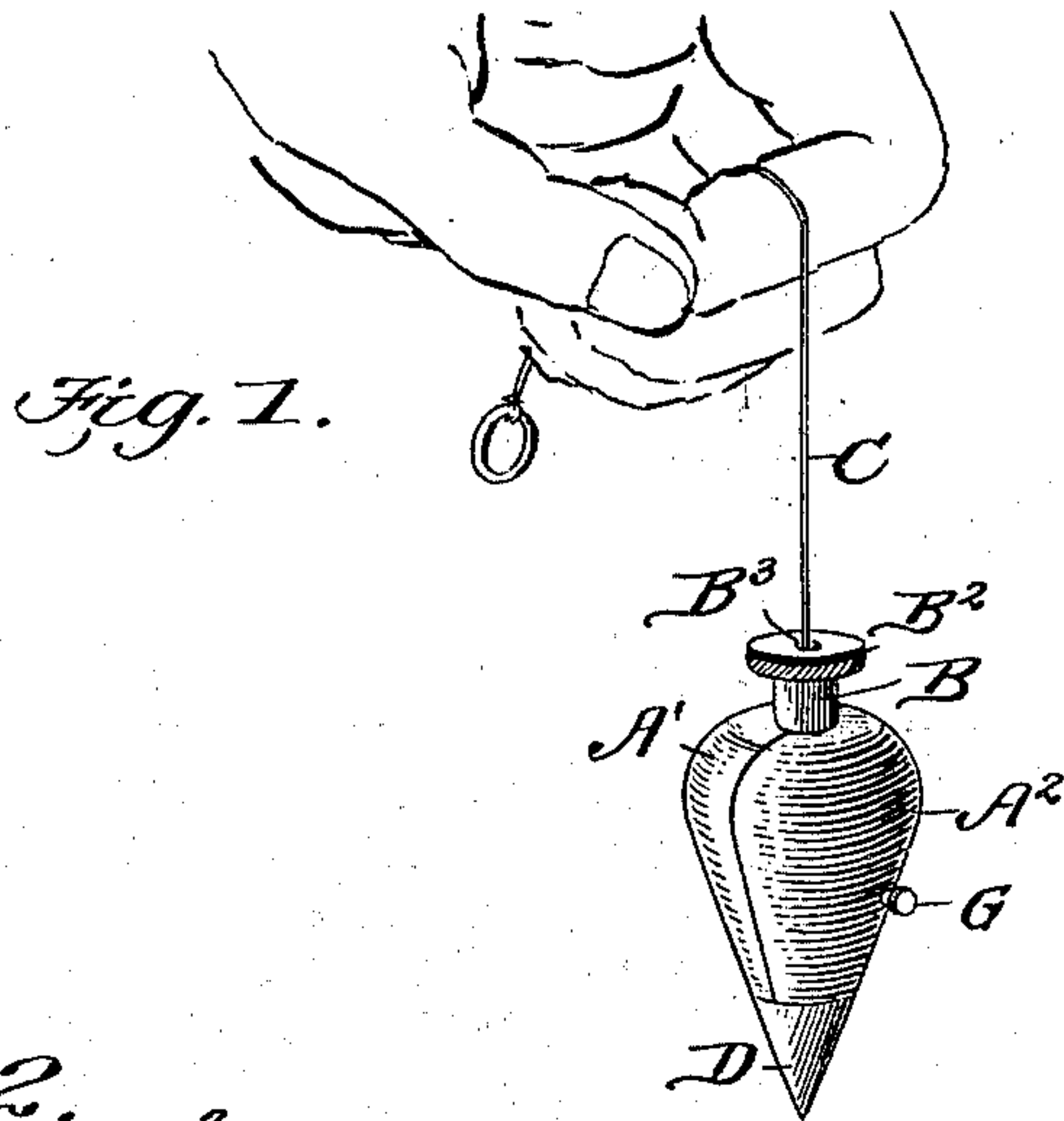


H. M. CURRY.
PLUMB BOB.

(Application filed Dec. 21, 1901.)

(No Model.)



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HILL M. CURRY, OF CALIFORNIA, PENNSYLVANIA.

PLUMB-BOB.

SPECIFICATION forming part of Letters Patent No. 702,288, dated June 10, 1902.

Application filed December 21, 1901. Serial No. 86,843. (No model.)

To all whom it may concern:

Be it known that I, HILL M. CURRY, a citizen of the United States, residing at California, in the county of Washington and State of Pennsylvania, have invented a new and useful Plumb-Bob, of which the following is a specification.

This invention relates generally to plumb-bobs and more particularly to one having a spring-actuated cord-winding mechanism arranged therein whereby the said cord is unwound or reeled within the body of the plumb-bob when not employed for suspending the said plumb-bob.

The object of the invention is to provide a plumb-bob embodying these characteristics which shall be simple in construction and efficient in operation; and the invention consists in the novel features of construction and combination hereinafter fully described, and pointed out in the claims.

In the drawings forming part of this specification, Figure 1 is a view illustrating a plumb-bob constructed in accordance with my invention. Fig. 2 is a sectional view of the same. Fig. 3 is a sectional view taken on the line 3 3 of Fig. 2. Fig. 4 is a view illustrating the component parts of the plumb-bob body.

In carrying out my invention I make a plumb-bob body of two sections A^1 and A^2 , the opposing faces of said sections being flat or smooth and each formed with a circular recess A^3 . Each section is also formed with an upwardly-projecting neck portion A^4 , which is threaded externally, the inner faces being grooved, as shown at A^5 , each of said grooves terminating at its lower end in the recess A^3 . When the body-sections are placed together, the neck portions form a complete cylindrical externally-threaded neck upon which the internally-threaded cap or thimble B is screwed, said cap or thimble having an annular flange B^1 , the edge of which is milled, as shown at B^2 , to facilitate the screwing and unscrewing. This cap or thimble also has a central opening B^3 , through which the cord C passes into the interior of the body of the plumb-bob, where it is connected to a spring-drum mounted within the recess A^3 . The body portion is also preferably constructed with depending portions A^6 , the opposing

faces of which are flat, their outer faces threaded, so that when the said sections are brought together the point or tip D can be screwed thereon, said point or tip being preferably constructed in the form of an inverted cone and having a threaded socket D^1 produced in the upper end, which is adapted to receive and secure the threaded projecting ends A^6 . The cap B and the tip or point D securely connect the sections of the body together. The drum E, which is arranged within the body, consists of the circular disks, the side pieces E^1 , which turn loosely upon an axle E^2 , which is held fast within the sockets E^3 , produced in the inner walls of the recess A^3 . The inner faces of the disks E^1 are rabbeted or shouldered, as shown at E^4 , and between which is held the drum or band E^5 , around which is wound the cord C, the inner end of said cord being connected to the exterior of the said drum or band in any suitable manner. A convolute spring F is arranged within the drum, the inner end thereof being rigidly connected to the axle E^2 , while the outer end is secured to the inner face of the band or drum, thereby constantly exerting a tension upon the said drum and causing the cord to be rewound thereon, it being understood that as the cord is unwound or drawn outwardly the drum is rotated against the tension of the spring, thereby winding up said spring, so that the moment the cord is released it will be automatically wound up upon the drum within the plumb-bob. A lever G is pivotally held within the recess A^3 of the section A^2 and is connected at one end to a spring-actuated push-pin G^1 , that passes through the section A^2 , as clearly shown, the opposite end of the lever terminating in an inwardly-bent point that is adapted to engage one of a series of perforations formed in the side E^1 of the drum E.

When it is desired to withdraw the cord from the plumb-bob, the pin is pushed inwardly a slight distance, disengaging the lever from the drum, and the cord can then be readily unwound. As soon as the pin is released its spring causes the lever to again bear against the side of the spring-actuated drum, thereby holding the said drum in a stationary position, and the plumb-bob can then be used the same as an ordinary plumb-bob now in

use. When the suspending-cord is no longer needed, the pin is operated to release the winding-drum, and the tension of the spring immediately operates the said drum, winding

5 the cord thereon within the plumb-bob.

The simplicity of the parts and their peculiar construction enables one to quickly and easily assemble the various parts into a complete and operative plumb-bob, and by

10 arranging the brake-lever as described the drum will be positively held at all times.

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

15 1. A plumb-bob consisting of a body comprising two longitudinal sections and provided with means at its upper and lower ends for connecting the said sections together, and a spring-actuated cord-winding drum con-

20 tained within the said body-sections, substantially as set forth.

2. A plumb-bob comprising a body portion formed of two longitudinal sections, the opposing faces of which are recessed, a spring-

25 actuated drum located within the said recess, a perforated cap-piece connecting the upper ends of the body-sections, and a cord connected to the spring-actuated drum passing between the sections and through the perforation of the cap-piece, as described.

3. A plumb-bob comprising a body portion composed of two sections, the opposing faces of which are recessed, a spring-actuated drum located in the said recess, said body portions having threaded projections at their

35 upper and lower ends, perforated cap or thimble screwed upon the threaded projection at the upper end, the tip or point screwed upon the threaded projection at the lower end, and a cord connected to the spring-actuated

40 drum and passing through the perforation of cap or thimble, substantially as described.

4. A plumb-bob comprising a body portion composed of two sections, the opposing faces of which are recessed, a spring-actuated

45 drum located in the said recess, perforated cap or thimble connecting the upper ends of the body-sections, the point or tip for connecting the lower ends of the said sections, a cord connected to the spring-actuated drum

50 and passing upwardly through the perforated cap or thimble and a spring-actuated brake-lever arranged in one of the sections and adapted to bear against the side of the spring-actuated drum, substantially as set forth.

55

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