W. L. HOBBIE.

ROPE MEASURE.

APPLICATION FILED MAY 8, 1915.

1,155,236.

Patented Sept. 28, 1915.

FIG. 2.

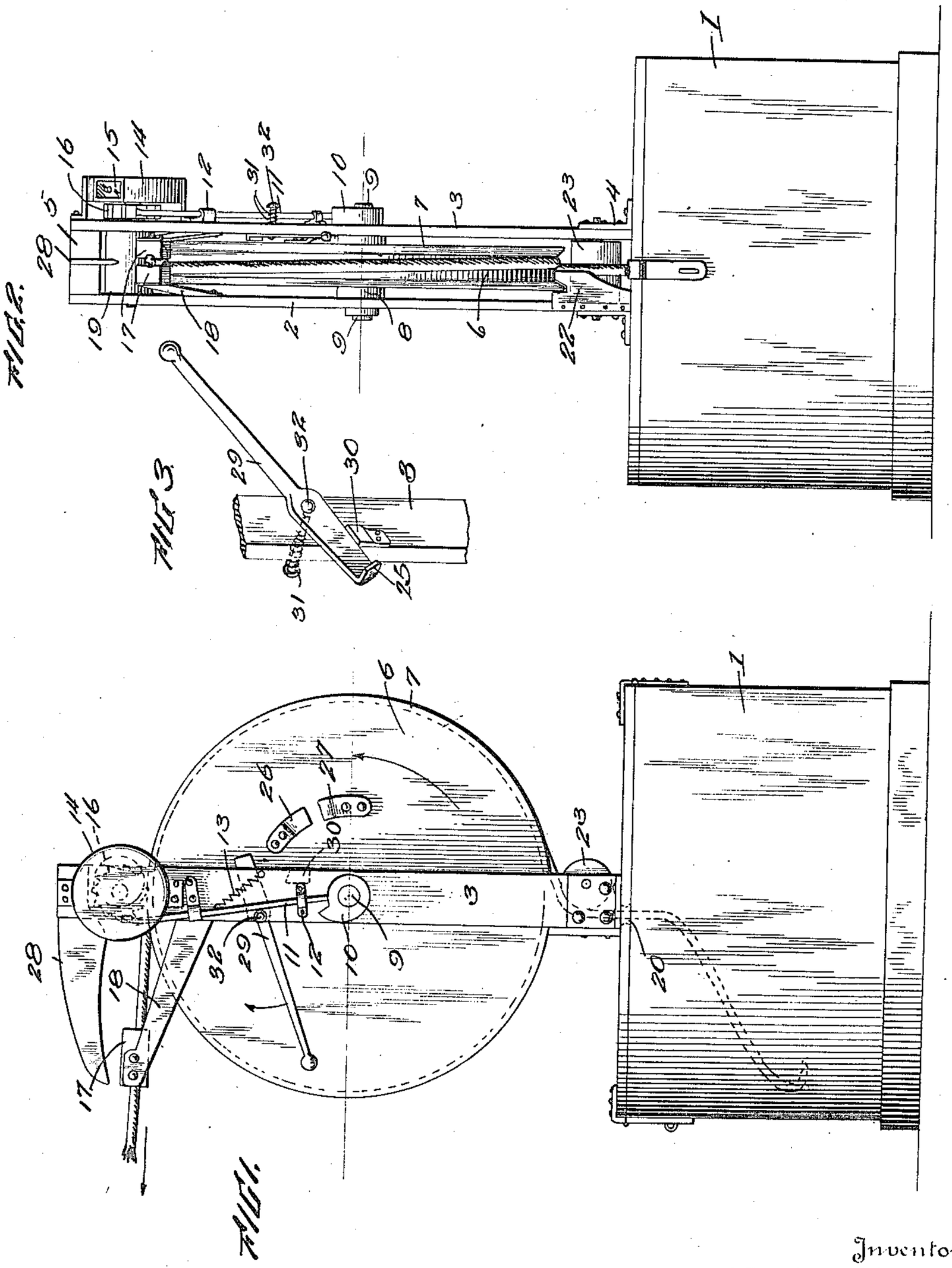
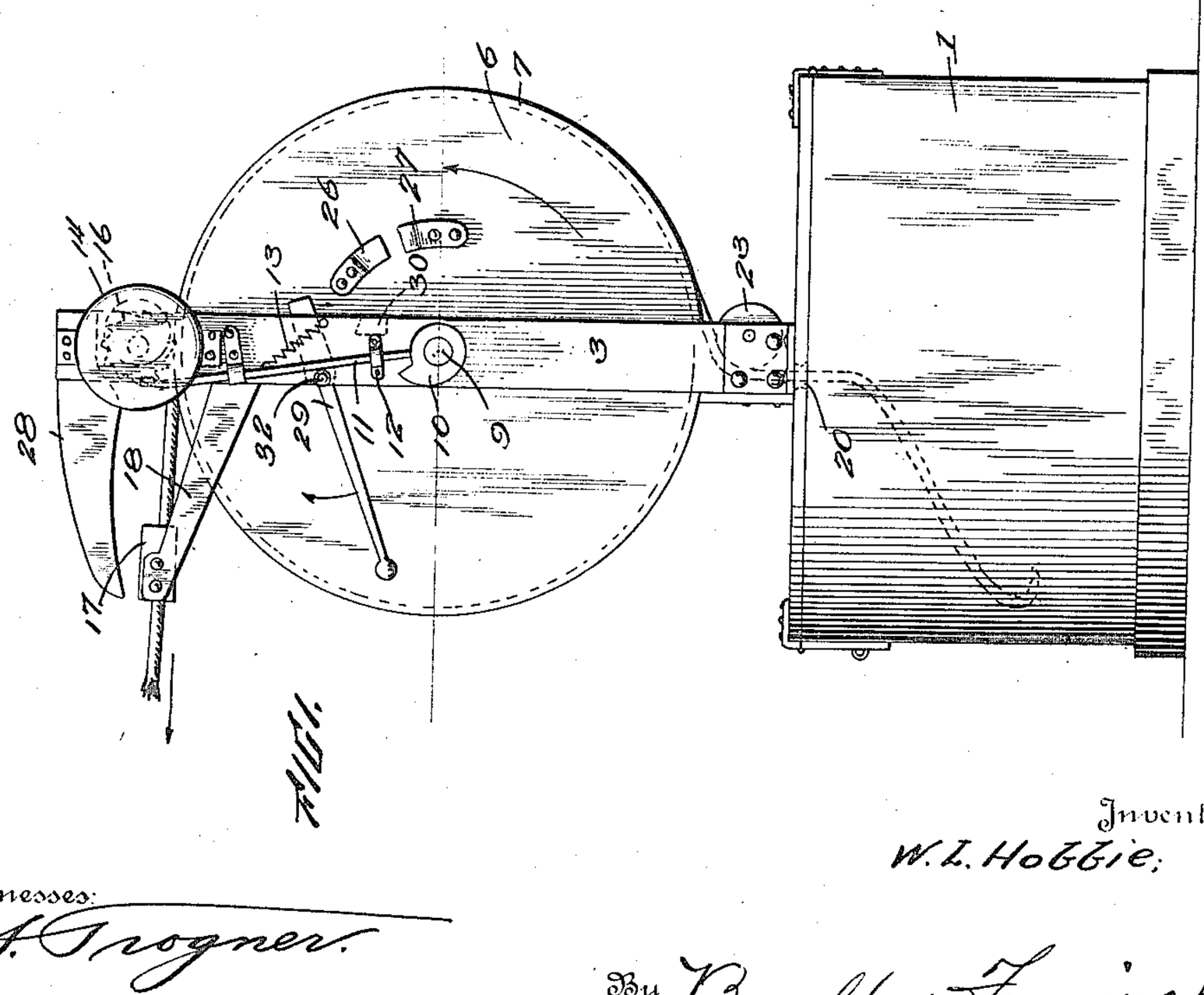


FIG. 3.

FIG. 1.



Witnesses:

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ROPE-MEASURE.

1,155,236. Specification of Letters Patent. Patented Sept. 28, 1915.

Application filed May 8, 1915. Serial No. 26,862.

To all whom it may concern:

Be it known that I, WILLIAM L. HOBBIE, a citizen of the United States, residing at Downs, in the county of Macon and State of Alabama, have invented certain new and useful Improvements in Rope-Measures, of which the following is a specification.

This invention relates to rope measuring machines, and more especially to those which have a predetermined stop; and the object of the same is to improve the general construction of such machine, particularly with respect to its stop. This and other objects are carried out in the manner hereinafter more fully described and claimed, and as shown in the drawings, wherein:

Figure 1 is a side elevation, Fig. 2 a front elevation, and Fig. 3 a detail of the stop mechanism.

In the drawings the numeral 1 designates a box for receiving the coil of rope, wire, or other material to be measured by this machine, and 2 and 3 are uprights secured to the top of the box by brackets 4 and connected at their upper ends by a block 5. Between these uprights is disposed a drum 6 having flanges 7 along its edges and hubs 8 which space it from the uprights, its shaft 9 being mounted in suitable bearings so that it may rotate freely. One end of the shaft carries a cam 10 outside the upright, the cam engaging the lower end of a rod 11 which slides in guides 12 on this upright and is normally retracted by means of spring 13. A cylindrical casing 14 is carried by the upper end of this upright and has an opening 15 in its front side through which the counting or registering mechanism (not shown) may be observed, and said counter has mounted fast on its shaft a ratchet 16 which is engaged and actuated by the reciprocating movements of the rod 11. The periphery of the drum measures thirty-six inches, the cam 10 has one projection, and the counter is of such type that a reciprocation of the rod 11 causes it to indicate one yard more through the opening 15.

The rope, wire, or other article being measured is coiled within the box 1, led upward through a hole 20 in its top, alongside a feeder 22 and over a roller 23 which are disposed between the uprights at the bottom of the drum as seen in Fig. 2, and thence around said drum for one and a half revolutions so as to prevent slipping. At the top of the drum the rope passes off the same beneath a roller 19 and between guides 17 which are carried by springs 18; and the block 5 may carry a blade 28 by means of which the rope can be cut off after it has been measured.

Carried by one end of the drum is a spring finger 26 having its forward end in the direction of rotation attached to the drum and its rearward end free, and in rear of this finger a stop 27 is secured to the drum with its flat front face standing opposite the free end of the finger. Pivoted inside one upright 3 is a lever 29 whose handle end projects as best seen in Fig. 1 and whose other or working end is inturned into a foot 25; and means are provided for preventing its working end from dropping out of the path of the finger 26 and stop 27. As indicated in Fig. 3, said means consists of a stop or block 30 secured inside the upright 3 and against which the working inner end of the lever rests normally, but obviously when the lever is turned this working end and its foot 25 are raised. In order to hold the lever in any position to which it may be set, tension means will be applied to its pivot. As herein shown said means comprises an expansive spring 31 coiled on the pivot bolt 32 between the upright 3 and the head of said bolt, as best seen in Fig. 3.

In the use of this device, a coil of rope, wire, etc., is placed within the box and its free end led out the hole 20, over roller 23, once and a half times around the drum, under the roller 19, and between the guides 17. With the parts standing in their normal position, let us assume that it is desired to sell ten yards of rope to a purchaser. The salesman grasps the free end of the rope with one hand and draws on it. Meanwhile, with his other hand he depresses the handle 29 so as to raise the foot 25 from between the finger and stop, and the spring 31 holds it raised. Continuing to draw on the rope, each time the drum makes one revolution the cam 10 raises the rod 11 and advances the counter within the casing 14, and when the figure exposed through the opening 15 shows that nine yards have been drawn off the salesman raises the handle 29 so that the inner end of the lever drops onto the block 30. The next time the spring finger and stop reach the foot 25, the former will pass under it but the stop 27 will strike it and the rotation of the drum will be checked. The rope is then cut off as by drawing it

across the blade 28, and the machine stands at rest until another sale is to be made. It will be obvious that the inturned tip or foot of the lever now stands between the rigid stop 27 and the free end of the spring finger 26, and the result is that the drum cannot be turned accidentally in either direction. Therefore a subsequent operator who desires to unreel another stretch of rope will have his attention called to this fact and will note the figure on the counter at the time he moves the lever; and it will be unlikely that persons unfamiliar with the machine will turn the drum in either direction undesirably.

What I claim is:

1. In a rope measure, the combination with a receptacle, a pair of uprights rising from the receptacle, rollers journaled between them near their upper and lower ends, a drum also journaled between them and disposed between said rollers, a cam on the drum shaft, and guides for the rope; of a counting device having a ratchet on its shaft, guides on one upright, a rod mounted therein and having one end engaged by said cam and the other end engaging said ratchet, a stop on one end of the drum, and a lever pivoted to one upright and having an inturned foot standing normally in the path of said stop.

2. In a rope measuring machine, the combination with a pair of uprights, a flanged drum journaled between them and of predetermined length around its circumference, a cam on the drum shaft, counting mechanism, and means for advancing the latter one number at each rotation of the cam; of a block secured inside one upright, a lever pivoted between its ends inside the same upright with a projecting handle at one end and its inner end resting normally on said block and having an inturned foot, a tension spring for holding the lever set, a spring finger secured at its forward end to the drum in the direction of rotation of the latter and having its rearward end outstanding from said drum and lying in the path of the normal position of said foot, and a fixed stop secured to the drum in rear of said rearward end of the finger, for the purpose set forth.

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

WILLIAM L. HOBBIE.

Witnesses:

J. M. SANKEY,

J. M. JOLLEY.