

No. 713,124.

Patented Nov. 11, 1902.

D. E. A. LUNDQUIST.

TWINE HOLDER.

(Application filed Dec. 28, 1901.)

(No Model.)

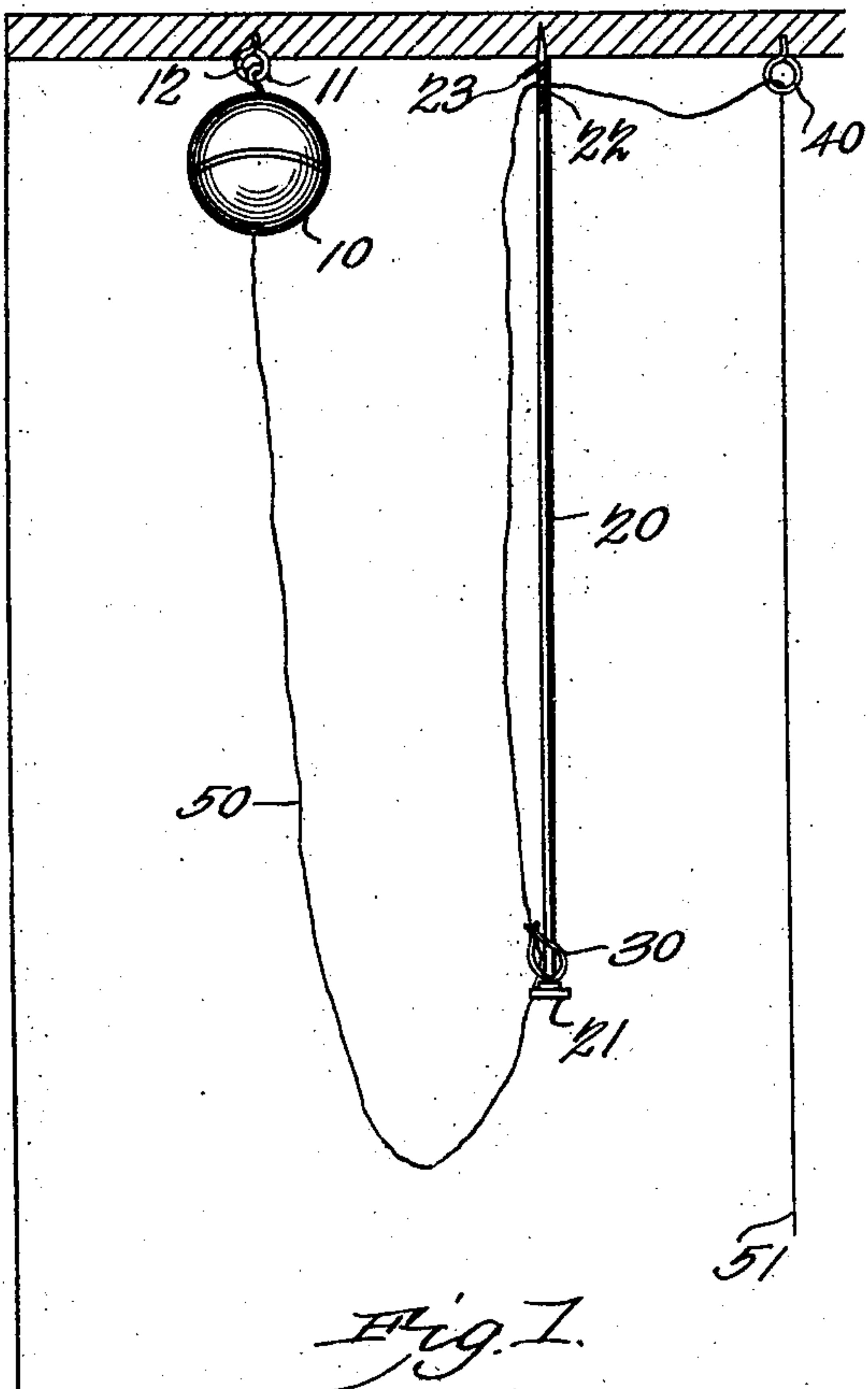


Fig. 1.

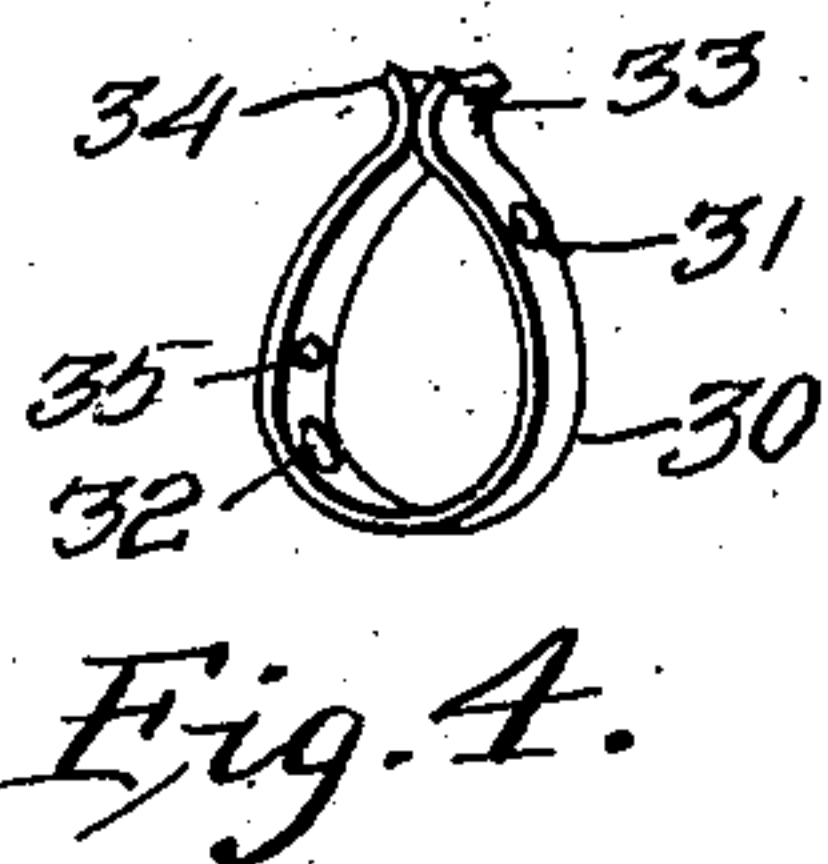


Fig. 4.

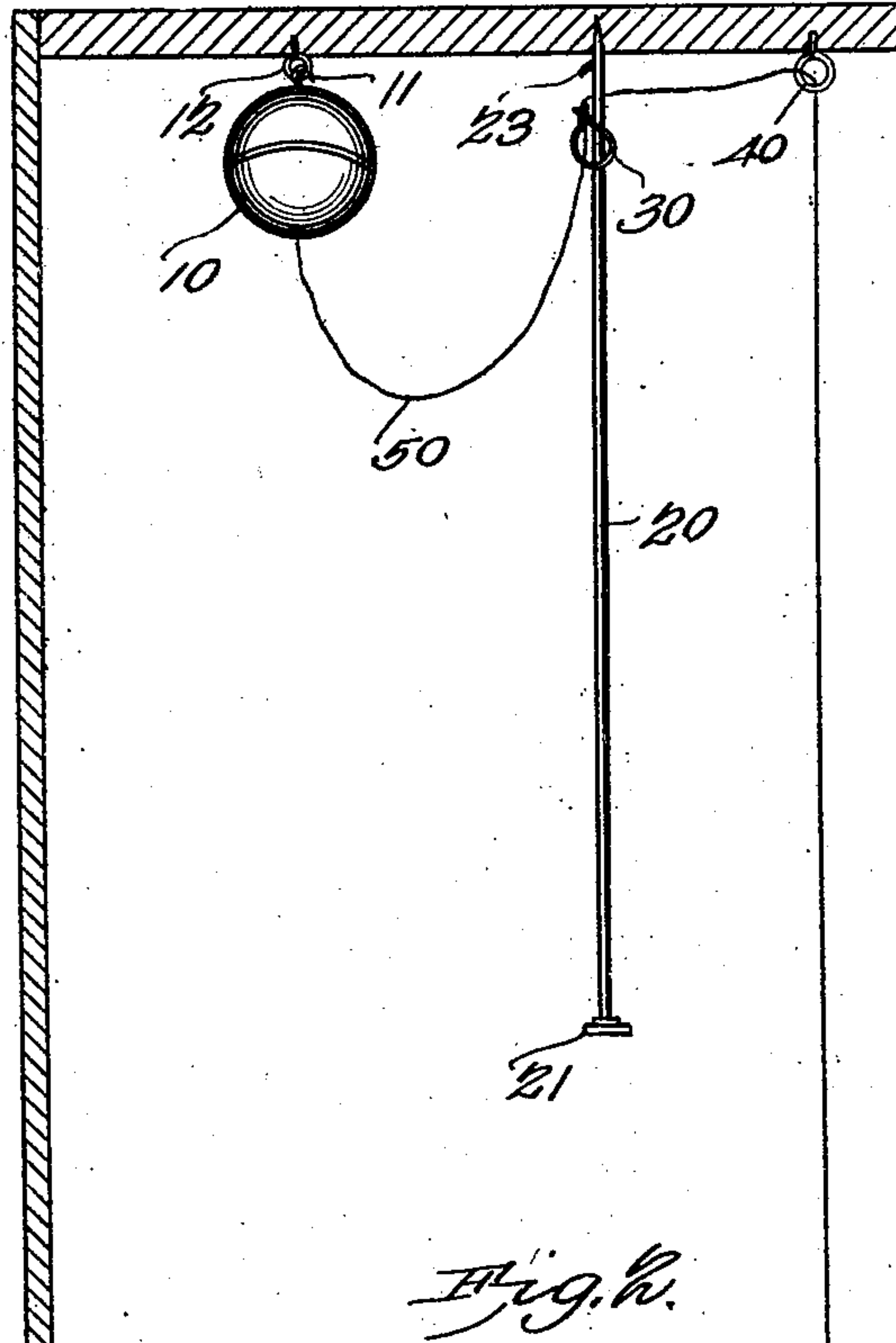


Fig. 2.

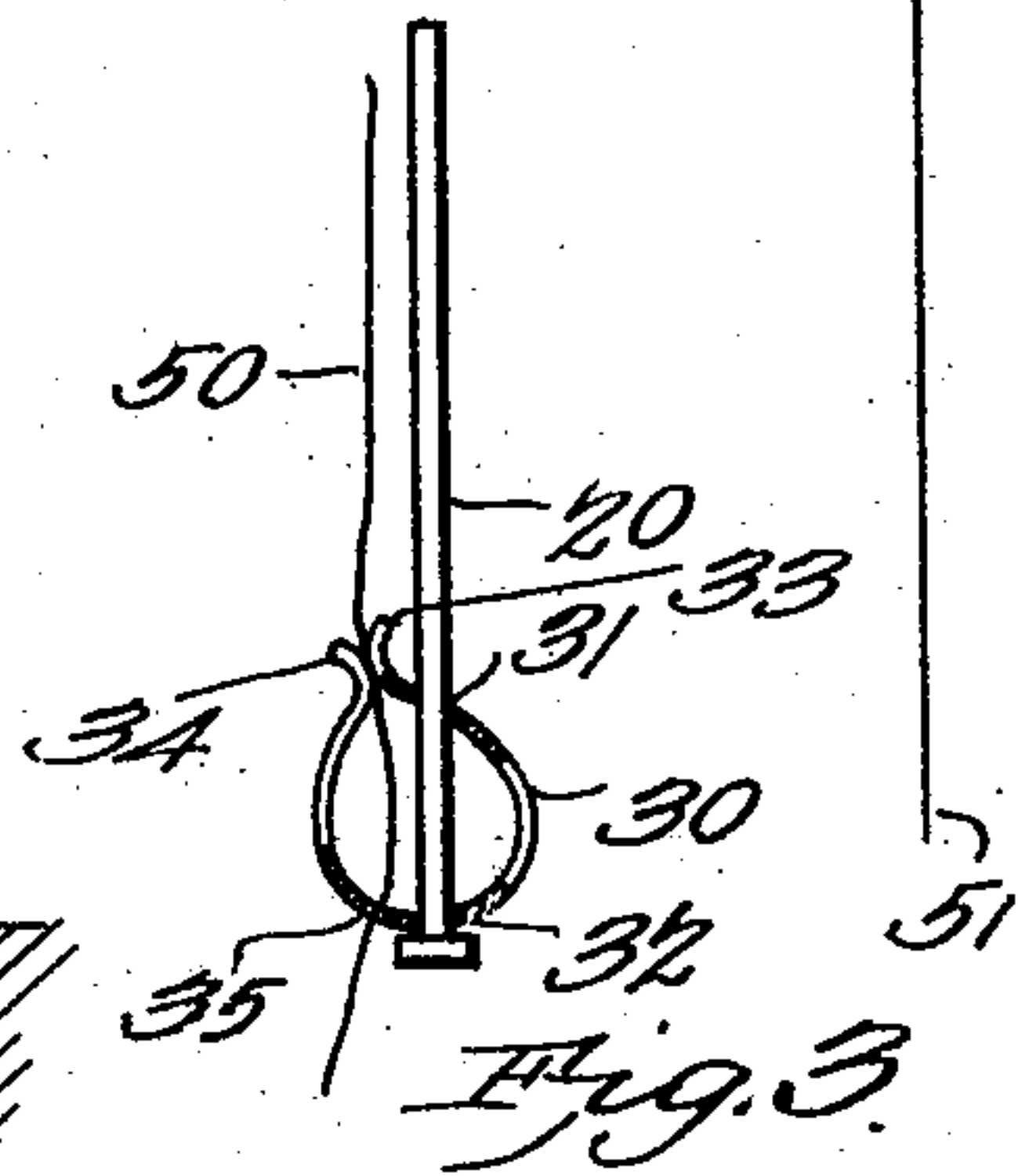


Fig. 3.

Witnesses

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UNITED STATES PATENT OFFICE.

DANIEL E. A. LUNDQUIST, OF IRENE, SOUTH DAKOTA.

TWINE-HOLDER.

SPECIFICATION forming part of Letters Patent No. 713,124, dated November 11, 1902.

Application filed December 28, 1901. Serial No. 87,611. (No model.)

To all whom it may concern:

Be it known that I, DANIEL E. A. LUNDQUIST, a citizen of the United States, residing at Irene, in the county of Turner and State of South Dakota, have invented a new and useful Twine-Holder, of which the following is a specification.

This invention relates to that class of twine-holders which are suspended from the ceiling or above the point where the twine is used.

The object of the invention is to provide a device for taking up or withdrawing the surplus twine after it has been broken off in tying a parcel and one which does not require the twine to lift any material weight when drawing down the end thereof for use.

Figure 1 of the accompanying drawings represents a side elevation of this improved twine-holder, the ceiling and side wall to which it is attached being shown in section, the twine being in the position which it assumes when not in use. Fig. 2 represents a side elevation of this improved twine-holder, showing the twine and its clamp in the position assumed when in use. Fig. 3 represents an enlarged detail of the lower end of the slide-rod with the spring-clamp disposed thereon. Fig. 4 is an enlarged detail perspective view of the clamp.

The same reference-numerals indicate corresponding parts in all the figures.

This invention may be used in connection with the ordinary ball-holder, which is shown in two forms in the accompanying drawings, as a ball 10, suspended from the ceiling. The holder connected with my invention is shown as the ball 10 suspended from the ceiling by a suitable hook 11 engaging an eye 12 in the ceiling. A vertical rod 20, preferably about twenty-eight inches in length, is attached at one end to the ceiling adjacent to the ball 10 and is provided at its opposite end with a stop 21. This rod 20 is provided near its upper end with an aperture 22, having an outwardly-extending lug 23 disposed thereover.

A take-up in the form of a spring-clamp 30 is arranged to slide freely on the rod 20 by means of the slots 31 and 32 therein, which fit loosely on said rod. This spring-clamp is preferably in the form of an open ring, having clamping-lips 33 and 34. These lips are pref-

erably provided with grooves on their inner faces, and it is also provided with an aperture 35, through which the twine is threaded.

A twine-guide device in the form of an eye 40 is preferably attached to the ceiling near the rod 20 and on the side opposite from that on which the ball is disposed.

In the operation of this device the ball of twine is placed in the ball 10, with its free end extending through the opening in the bottom thereof. This twine, as 50, is threaded through the aperture 35 in the clamping-ring 30 and passed between the clamping-lips 33 and 34, then upward through the opening 22 in the rod 20, then across through the guide-eye 40, and down to a point within easy reach of the clerk at the counter. The ring 30 being made of light resilient metal offers very little appreciable weight to be drawn up; but it is sufficiently heavy to overcome the weight of the surplus twine left after tying up a parcel.

When the twine is desired for use, the operator takes hold of the end 51, and with a slight pull the clamping-spring slides up on the rod 20 until it engages the outwardly-projecting lug 23. The twine is then pulled against the tension of the spring, through the lips thereof, until the required amount is drawn out. After using the quantity desired the cord is broken or cut off and the broken end released, and this end under the force of gravity exerted on the spring 30 is caused to be drawn up by the spring sliding to the bottom of the rod 20.

I claim as my invention—

1. A twine-take-up device comprising a suspended rod having an aperture at one end and a stop at the other, and a spring-clamp adapted to slide on said rod.

2. A twine-take-up device comprising an upright guide-rod, a resilient clamp slidably mounted on the guide-rod, and provided with clamping-jaws for engaging the twine, and a guide located near the upper end of the guide-rod and adapted to receive the twine, whereby when the free end of the latter is pulled, the clamp will be moved upward on the guide-rod, substantially as described.

3. A twine-take-up device comprising an upright guide-rod provided at its lower end with a stop, a resilient clamp slidably mount-

ed on the rod and provided with clamping-jaws arranged to engage a piece of twine, and a guide arranged near the upper portion of the rod, and adapted to receive the twine, substantially as described.

4. A twine-holder comprising a resilient clamp having clamping-jaws arranged to receive the twine, means for guiding the clamp in its upward and downward movement, and a guide arranged to receive the twine and adapted to cause the same to lift the clamp when the free end of the twine is pulled, substantially as described.

5. A twine-take-up device comprising a vertically-movable clamp having clamping-jaws, means for guiding the clamp, and a guide arranged to receive the twine and adapted to cause the clamp to move upward when the free end of the twine is pulled, substantially as described.

6. A twine-take-up device comprising a vertically-movable approximately circular clamp constructed of resilient metal and provided with terminal clamping-jaws, said clamp be-

ing provided at a point remote from the jaws with an opening, means for guiding the clamp in its vertical movement, and a guide located above the clamp and arranged to receive the twine and adapted to cause the clamp to be moved upward when the free end of the twine is pulled, substantially as described.

7. A twine-take-up device comprising a vertically-movable approximately circular clamp having grooved clamping-jaws and provided with a twine-receiving opening, and a supporting-rod having the clamp slidably mounted on it and provided with means for limiting the movement thereof and having an opening near its upper end located above the clamp, substantially as described.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in the presence of two witnesses.

DANIEL E. A. LUNDQUIST.

Witnesses:

E. D. SKILLMAN,
L. J. ERIKSEN.