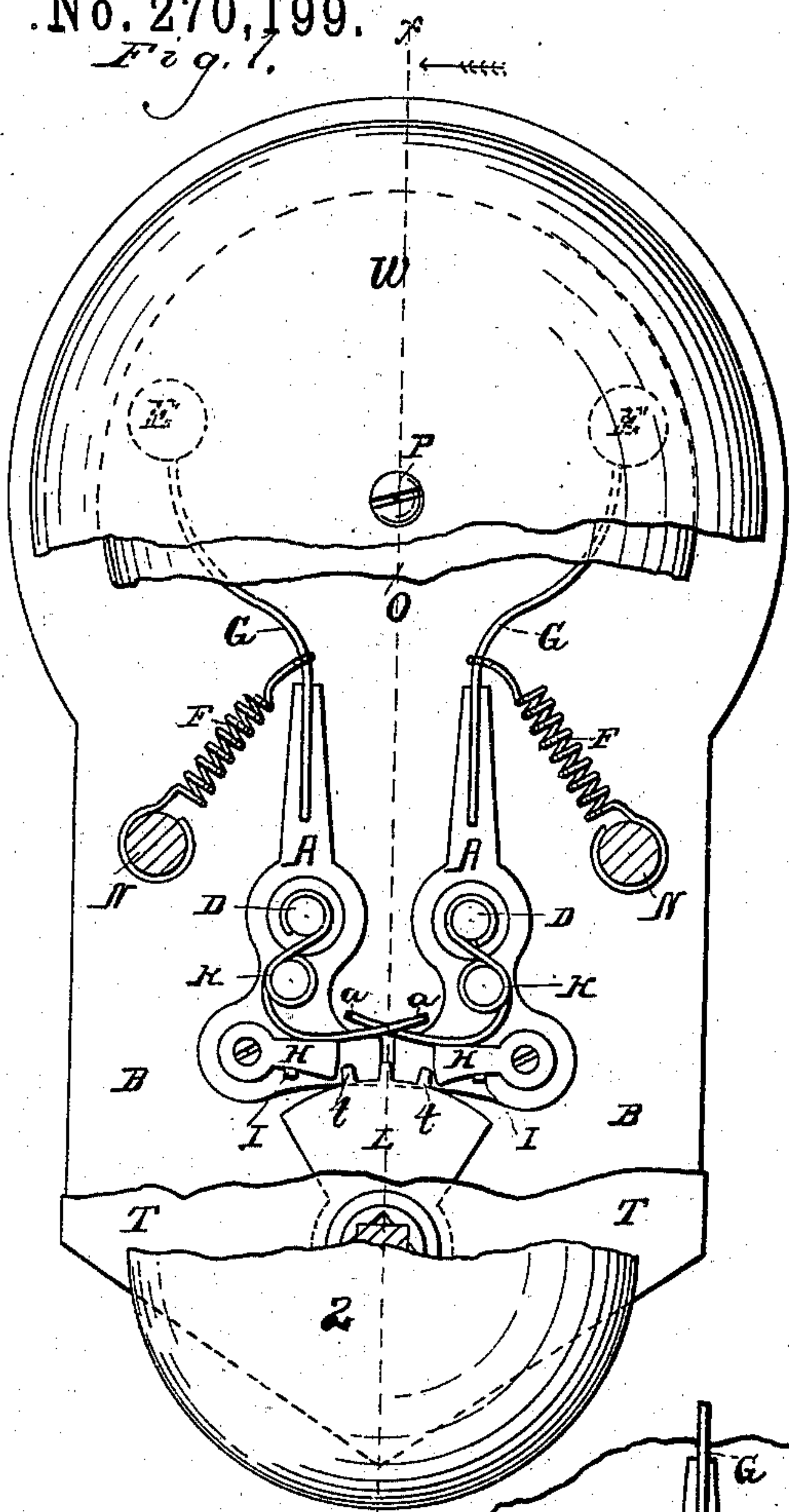


(No Model.)

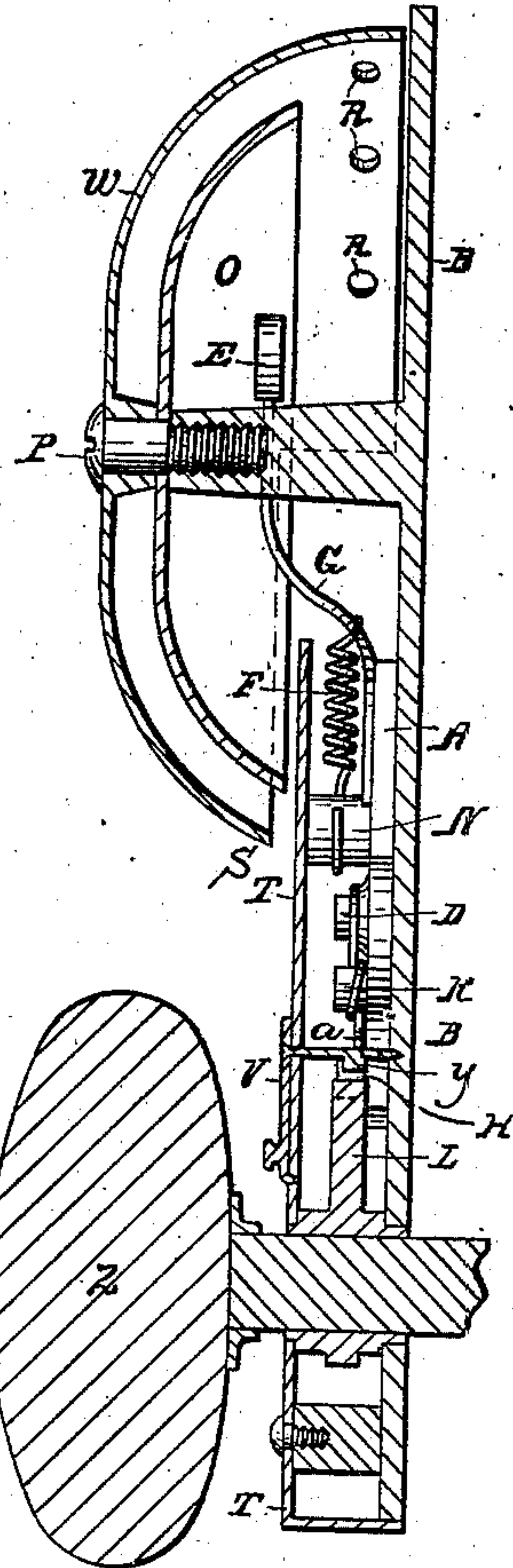
A. T. BOONE.  
DOOR KNOB ALARM.

No. 270,199.

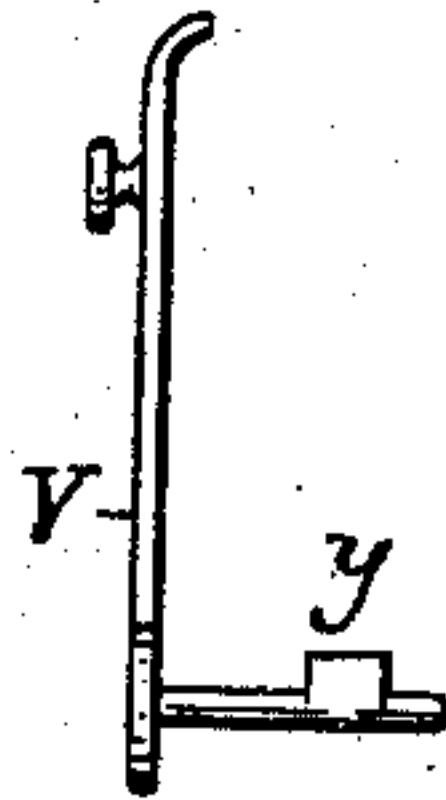
Patented Jan. 9, 1883.



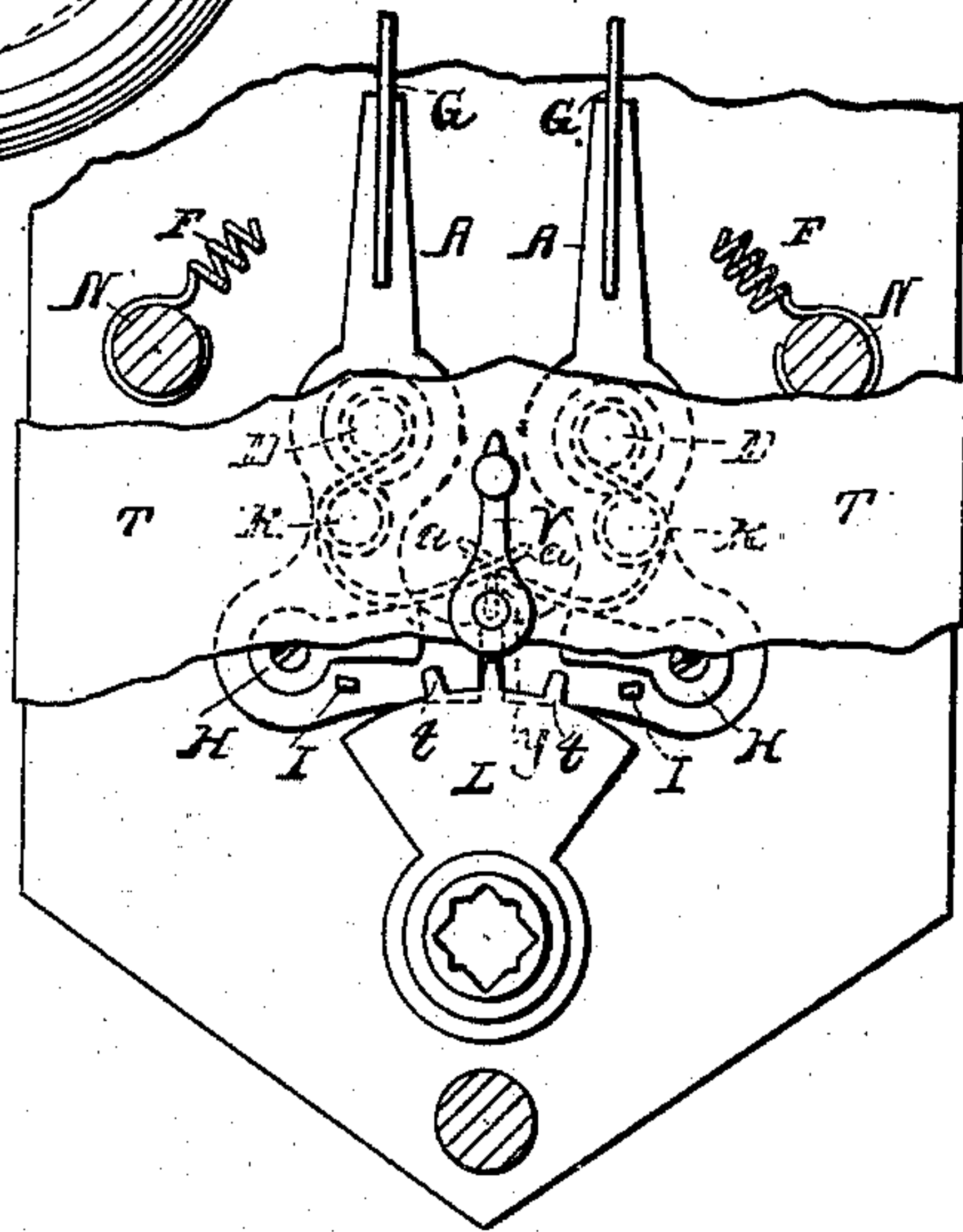
*Fig. 2.*



*Fig. 4.*



*Fig. 3.*



Witnesses,  
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J. B. Halpenny

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Attorney.



# UNITED STATES PATENT OFFICE.

ALONZO T. BOONE, OF CHICAGO, ILLINOIS, ASSIGNOR OF ONE-HALF TO  
RUFUS H. SANBORNE.

## DOOR-KNOB ALARM.

SPECIFICATION forming part of Letters Patent No. 270,199, dated January 9, 1883.

Application filed April 20, 1882. (No model.)

*To all whom it may concern:*

Be it known that I, ALONZO T. BOONE, a citizen of the United States, residing at the city of Chicago, in the State of Illinois, have made certain new and useful Improvements in Burglar-Alarms, of which the following is the specification.

The nature and object of this invention is to construct a burglar-alarm that will be effective in action and that burglars cannot destroy the action of, so as to prevent the alarm when the door is opened.

Figure 1 is an upright view with the casing removed, showing the working of the operative parts of the alarm. Fig. 2 is a side elevation through line *xx* of Fig. 1. Fig. 3 is a front view with a portion of the casing, showing the indicator on outside of casing and the operative parts indicated by dotted lines. Fig. 4 is a view of the indicator and crank-lever.

Similar letters of reference refer to similar parts in the different drawings.

A A are two levers loosely attached to the bed-piece B by means of the posts D D. To the upper ends of these levers are fastened the hammers E E by means of the wires G G.

F F are coiled springs, fastened at one end to the posts N N and at the other ends to the wires G G.

H H are pawls loosely attached to the lower ends of the levers A A, and stand facing each other.

I I are pins on the under side of each pawl, and fastened to the levers A A, to prevent the pawls falling down.

K K are springs, one end of each fastened to the posts D D; thence turning with a coil they pass along the upper surfaces of the pawls H H, and the other ends, *aa*, cross each other at J, Fig. 1. At the point where they pass along the upper surface of pawls H H they are fastened to each pawl, and the ends *aa*, beyond the point where they are fastened to the pawls, serve the purpose of levers to lift the pawls; hence I call these ends "lever ends" *aa*.

L is a toothed segment, having three or more teeth, *tt*, rigid or stationary, as against

yielding teeth. This segment works upon the ordinary spindle of the door-lock, and the hole through which the spindle works is polygonal, so as to allow a square or diamond-shaped shank to pass through it.

O is the bell, on the inside of which the hammers E E strike. Surrounding the bell and at the top of the alarm, extending to the bed-plate B, is the hood W. This hood and the bell are fastened to the same post by means of the screw P. In the hood are the holes R R for the escape of sound. The lower part of the hood extends downward only to the edge of the bell, as shown at S, Fig. 2.

T is a case covering the operative parts of the alarm and extending up under the bell O, as shown in Fig. 2. In Fig. 1 it is cut away so as to expose the operative parts.

V, Figs. 3 and 4, is an indicator placed upon the outside of case T. It is attached to the crank-lever Y, which passes through the case and beneath the crossing end levers, *aa*, at J, between the levers A A, Figs. 1 and 3.

The operation of my burglar-alarm is as follows: The knob Z is turned, which turns the toothed segment L. The teeth *tt* press against the ends of the pawls H H, which are prevented from moving down by the pins I I. This causes the lower arms of the levers A A to be pushed back, which lifts the hammers E E. The instant the teeth *tt* have passed by the ends of the pawls H the coiled springs F F cause the hammers to strike the bell O and give the alarm. When it is desired to turn the knob or open the door without giving the alarm, the indicator V is turned in a vertical position, with the point extending directly upward, thus causing the crank-lever Y to lift the lever ends *aa* at J, which lifts the pawls beyond the reach of the teeth *tt*, when the knob Z can be turned and no alarm given.

The hood W, surrounding the bell, prevents a burglar from introducing any instrument above the alarm to deaden the sound of the bell, and the plate B prevents the boring of any hole under the bell for the same purpose.

The hood W and plate B are made of metal.

This alarm can be attached to any ordinary door-lock, and the spring in the door-lock

will return the toothed segment to its vertical position, as shown in Figs. 1 and 3. The knob Z is turned either way to open the door, and at the same time the alarm is given.

- 5 I am aware that devices have been used to allow the spindle of the alarm to be turned without giving the alarm; but the means herein shown to accomplish this purpose are believed to be new.

I claim—

The combination of the indicator V, crank-lever Y, pawls H H, and lever ends *a a*, fixedly attached to said pawls, as and for the purpose shown.

10

ALONZO T. BOONE.

Witnesses:

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