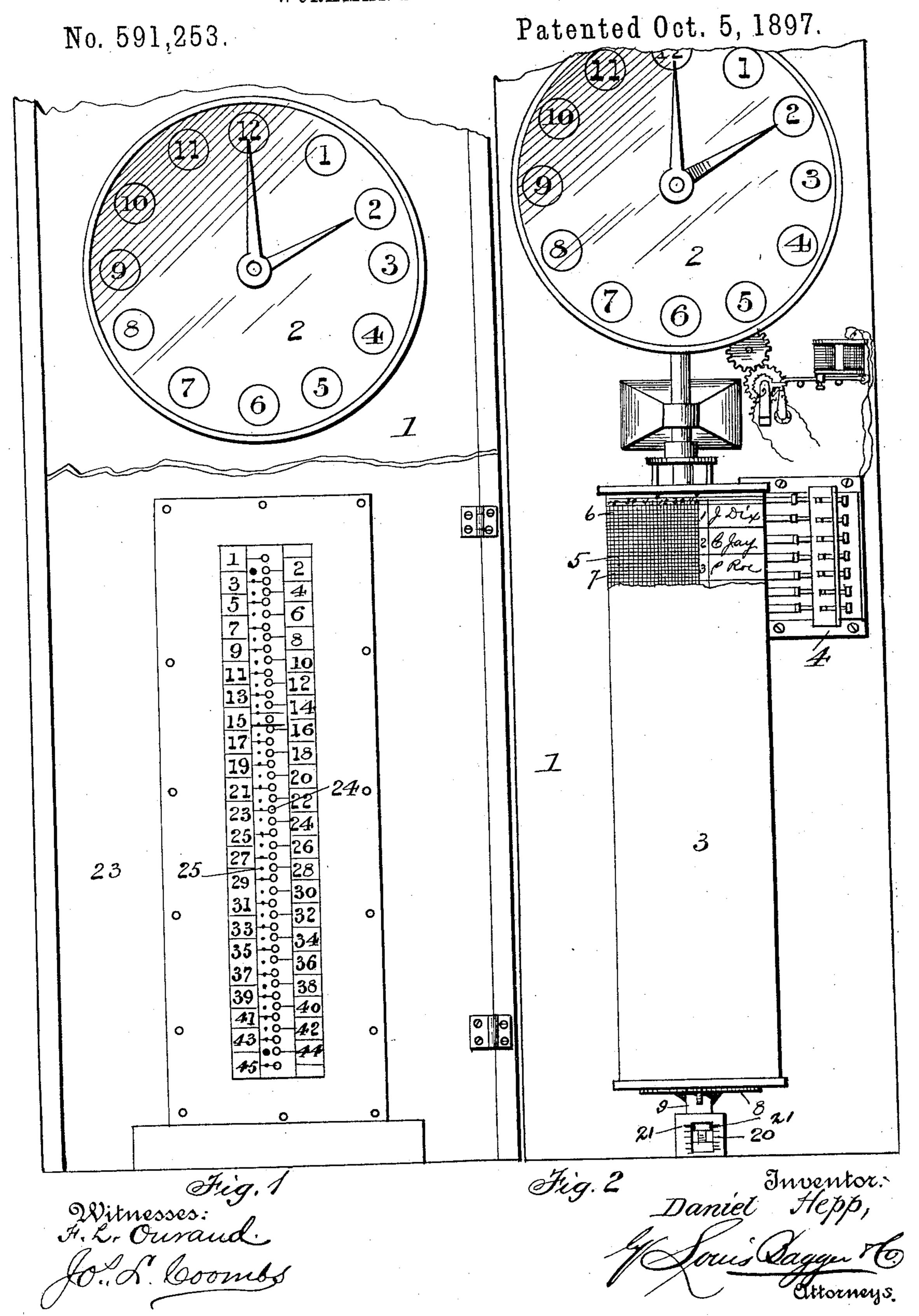
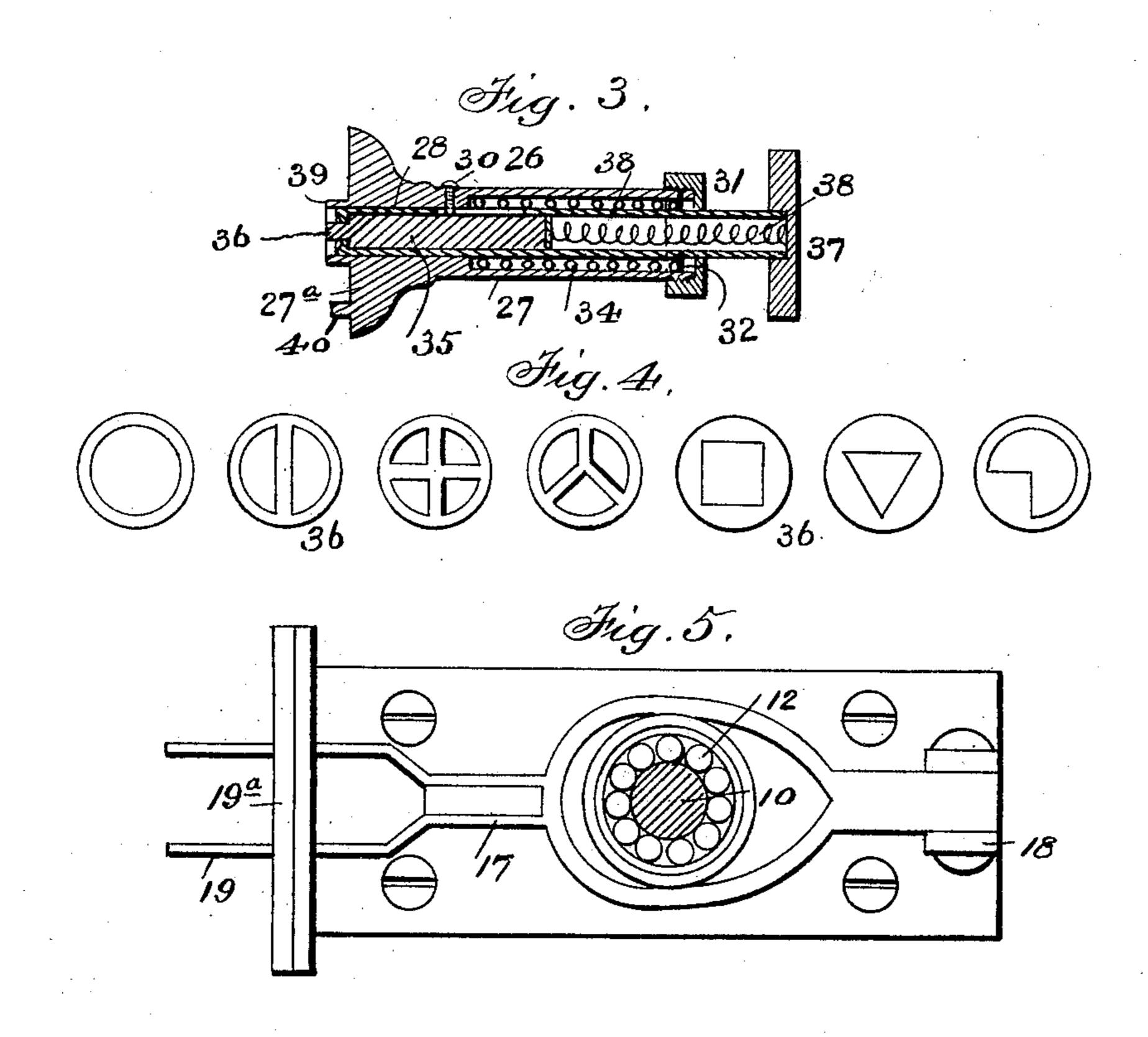
(No Model.) D. HEPP. WORKMAN'S TIME RECORDER.

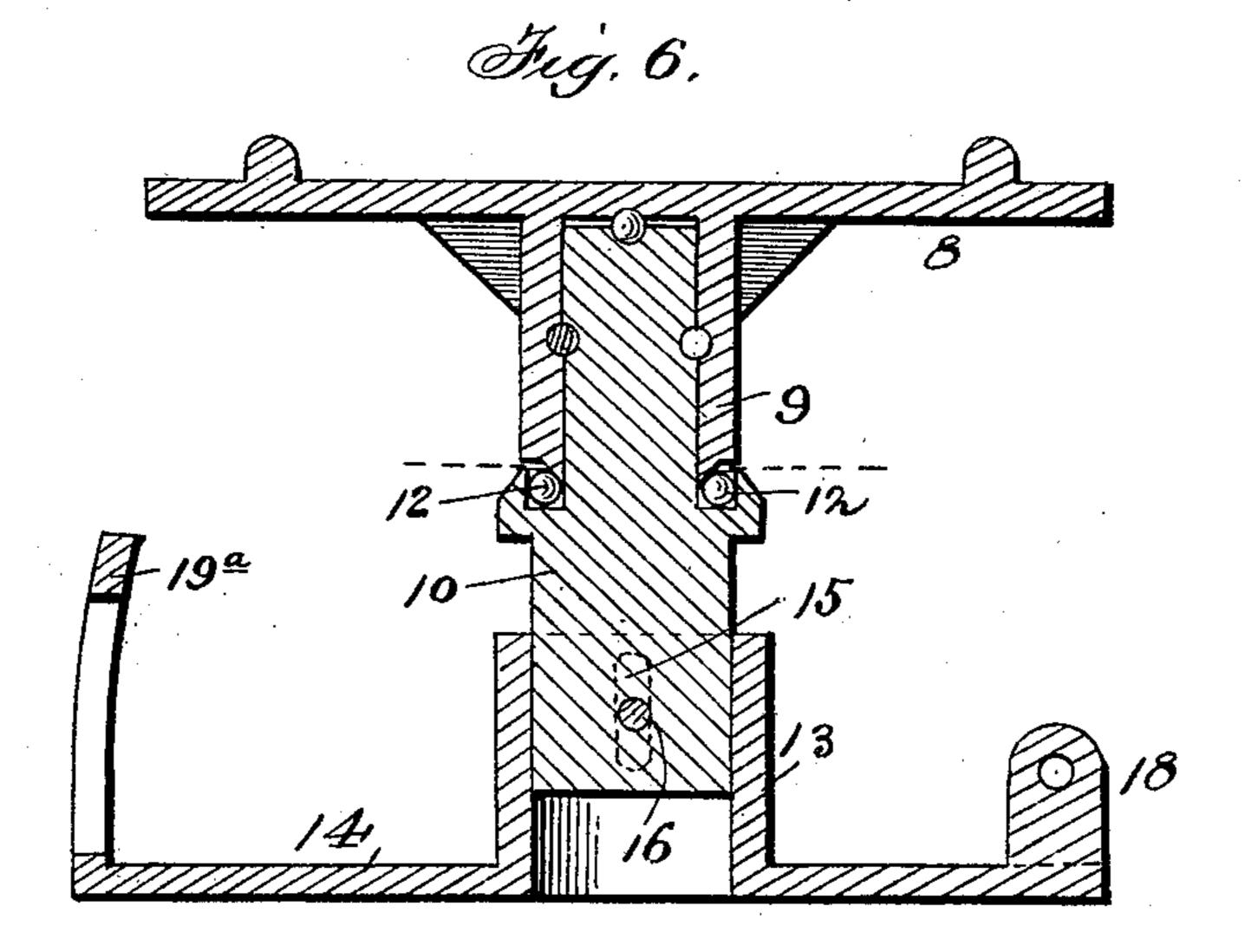


D. HEPP. WORKMAN'S TIME RECORDER.

No. 591,253.

Patented Oct. 5, 1897.





Witnesses: F. L. Ourand. Jour Corner Danzel Hepp,

Seru Saggar Con Ottorneys.

United States Patent Office.

DANIEL HEPP, OF CHICAGO, ILLINOIS.

WORKMAN'S TIME-RECORDER.

SPECIFICATION forming part of Letters Patent No. 591,253, dated October 5, 1897.

Application filed January 25, 1897. Serial No. 620,631. (No model.)

To all whom it may concern:

Be it known that I, Daniel Hepp, a citizen of the United States, and a resident of Chicago, in the county of Cook and State of Illinois, 5 have invented certain new and useful Improvements in Workmen's Time-Recorders; and I do hereby declare that the following is a full, clear, and exact description of the invention, which will enable others skilled in the art to which it appertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification.

My invention relates to workmen's timerecorders for recording the time of their arrival at work and the time of their departure, and is intended primarily for use in connection with a watchman's time-recorder, for which I have made application for patent of even date herewith, although it may be used

independently thereof, if desired.

The invention consists, essentially, of a casing containing a clock-movement, a rotatable and vertically-movable cylinder, a paper form on said cylinder, a door to the casing having a series of numbered openings therein arranged in one or more vertical rows, and two keys adapted to be inserted respectively in said openings by the workmen as they arrive and depart from work, which will make an impression on the paper form and thus record the time of their arrival and departure, as will hereinafter be fully described and claimed.

In the accompanying drawings, Figure 1 is a front view of a workman's time-recorder constructed in accordance with my invention, showing the same used in connection with a watchman's time-recorder. Fig. 2 is a similar view, the door of the casing being removed. Fig. 3 is a longitudinal sectional view of one of the keys. Fig. 4 is an end view showing various shapes of impressions or marking devices greatly enlarged. Figs. 5 and 6 represent, respectively, a longitudinal sectional view and a plan view of the means for elevating the cylinder.

In the said drawings the reference-numeral designates a cabinet or casing provided with some other distinguishing a clock-movement (not shown) and a rotatable and vertically-movable cylinder 3 for containing a paper form on which the time therefore suffice for both.

of workmen's arrival and departure are recorded.

The numeral 4 designates electromagnets 55 for recording the visits of a watchman to various stations.

These features are fully set forth in my aforesaid application and form no part of the present invention.

The cylinder is connected with the clockmovement and is timed to make one revolution every twelve hours.

The numeral 5 designates the paper form, provided with a number of vertical and hori-65 zontal lines 6 and 7. Secured to the lower end of the cylinder is a supporting-plate 8, provided with a sleeve 9, in which fits a studshaft 10.

The numeral 12 designates balls forming 70 bearings for said sleeve and shaft. The lower end of this shaft fits in a socket 13 of a plate 14, located in the cabinet or casing, and is formed with slots 15, in which a pin 16, secured to the stud-shaft, works. This pin is 75 secured to a lever 17, pivoted to a lug 18, and is provided with spring-arms 19, which pass through an opening in a curved plate 19^a. The sides of this opening are formed with opposite slots 20, with which engage blades 21 80 on said spring-arms.

The numeral 23 designates the door of the cabinet, provided with two vertical and parallel rows of holes 24 and 25, the large holes 24 being for the passage of a recording or 85 marking key, while the small holes are to receive a pin on the key to hold the key in proper position. These large holes are numbered as seen, and the workmen are given

corresponding numbers.

The numeral 26 designates the recording-key. There are two of these keys employed, being identical in every respect except that the impressions made thereby shall present a different appearance, so as to be readily distinguishable from each other. One of these keys is employed for recording the time of the arrival of the workmen and the other for recording the time of their departure, and they should be of different colors or have some other distinguishing characteristic, so as to avoid liability of one being mistaken for the other. A description of one key will therefore suffice for both

The numeral 27 designates a cylindrical block provided with a head 27° and formed with a central bore, in which is located a reciprocating tube 28, having a longitudinal slot to receive the end of pin 30, which will prevent it from rotating, yet allow it to reciprocate in the block.

The numeral 31 designates a screw-cap for the block. Secured to this tube is a collar 10 32, against which abuts one end of a coiled spring 34, encircling the tube. The block is

counterbored to receive this spring.

The numeral 35 designates a cylindrical marker made of felt fitting in said tube and the outer end provided with a projection 36, passing through an aperture in the end of the tube. This projection makes the impression on the paper form. At the opposite end of said tube is provided a plate 37, between which and the inner end of the felt marker is a coiled spring 38. The head 27 is provided with a central annular boss 39, which fits in the large holes of the door, and is also provided with a pin 40, which engages with the small holes therein to hold the key in position.

25 small holes therein to hold the key in position. The operation is as follows: The paper form being properly adjusted on the cylinder the clock-movement is set in operation and the arrival-key laid upon a ledge, (not shown,) 30 so as to be accessible to the workmen. As the workmen arrive each in turn takes the key and inserts it in the hole in the door which is numbered the same as the number he bears. When the key is thus inserted, the 35 plate 37 is pressed inward, forcing the tube and marker or recorder against the paper, which will make an impression thereon recording the time of arrival. After a reasonable or sufficient time the arrival-key is re-40 moved and the departure-key put in its place,

so that the workmen may record the time of their departure. At the beginning of each day's work the cylinder is elevated a step by means of the lever and connections at the lower end thereof, so that a new surface will 45 be presented for the recording-keys, so that a week's record will appear on the form, showing the time of the arrival and departure of each workman each day during the week.

The paper form may, in addition to the time 50 thereon, have a time-table provided thereon on which the names of the workmen and the time made during the week can be entered. (See upper part of the form in Fig. 2.)

The felt markers are to be saturated with 55 any suitable marking fluid and are replaced by new ones when the ink or fluid gives out or is dried up.

Having thus fully described my invention, what I claim is—

In a recording-key of the character described, the combination with the cylindrical block having a cylindrical bore, the head at one end provided with a pin and with a central annular boss, of the reciprocating tube 65 located in said bore, having a slot therein, the pin secured to said block and working in said slot, the coiled spring surrounding said tube, the screw-cap on the end of said block, the removable marker of absorbent material lo-70 cated in said tube, the plate at the end of the tube, and the coiled spring in said tube, substantially as described.

In testimony that I claim the foregoing as my own I have hereunto affixed my signature 75

in presence of two witnesses.

DANIEL HEPP.

Witnesses:

C. W. Schaar, Edward Hendrickson.