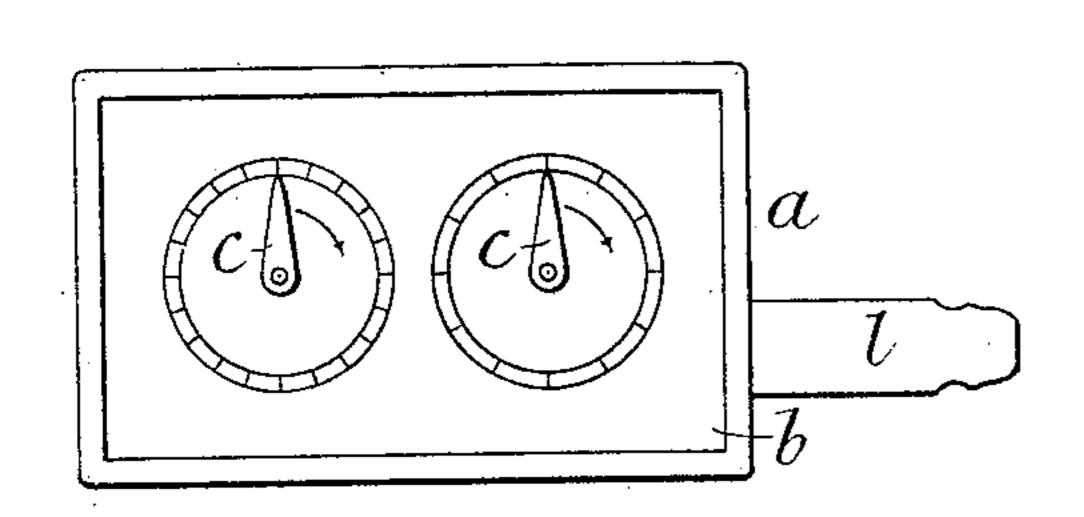
T. PINK.

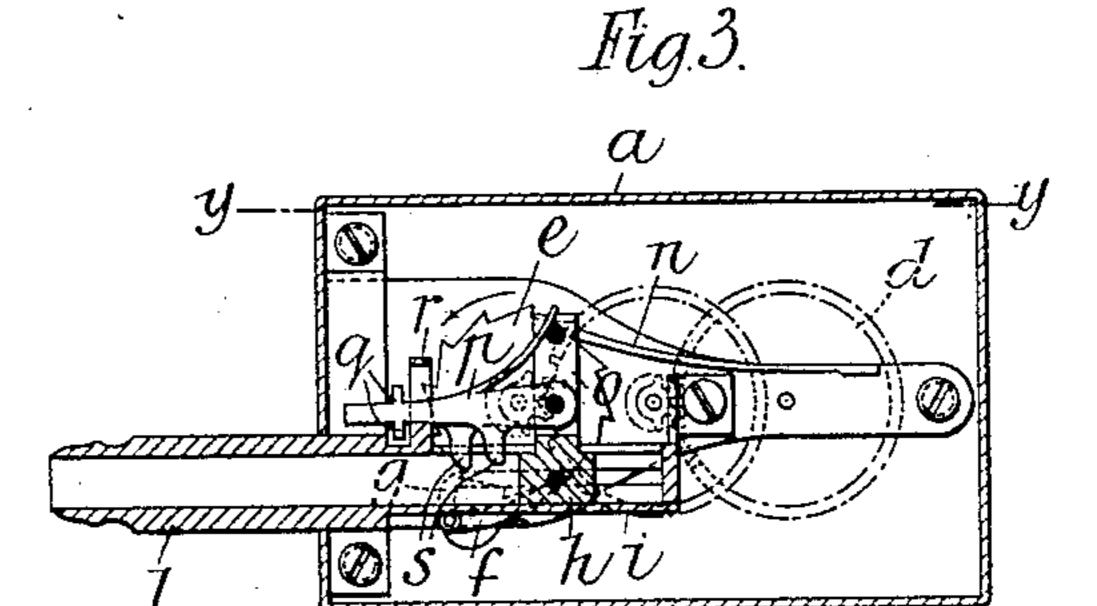
REGISTERING APPARATUS, CHIEFLY FOR AMOUNTS DUE FOR PIECE WORK.

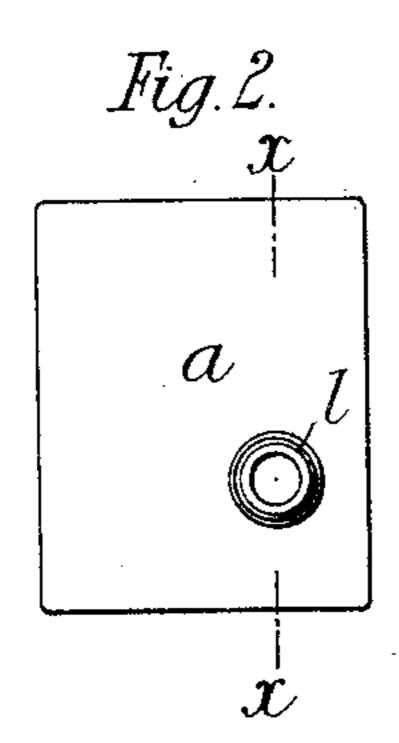
No. 462,365.

Patented Nov. 3, 1891.

Fig.1.







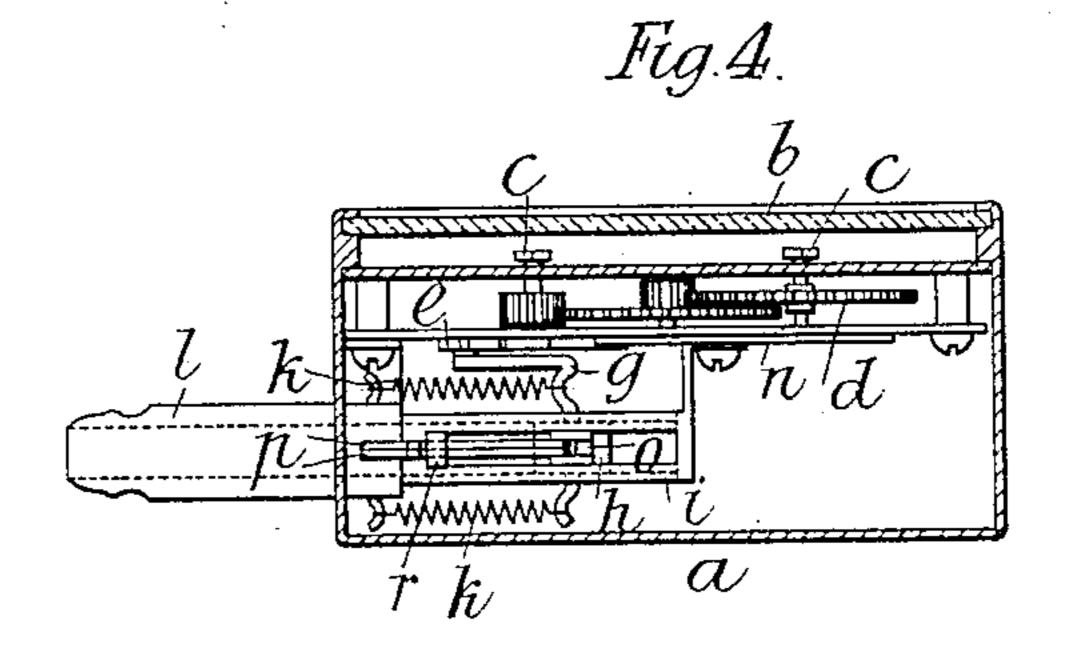


Fig. 5.

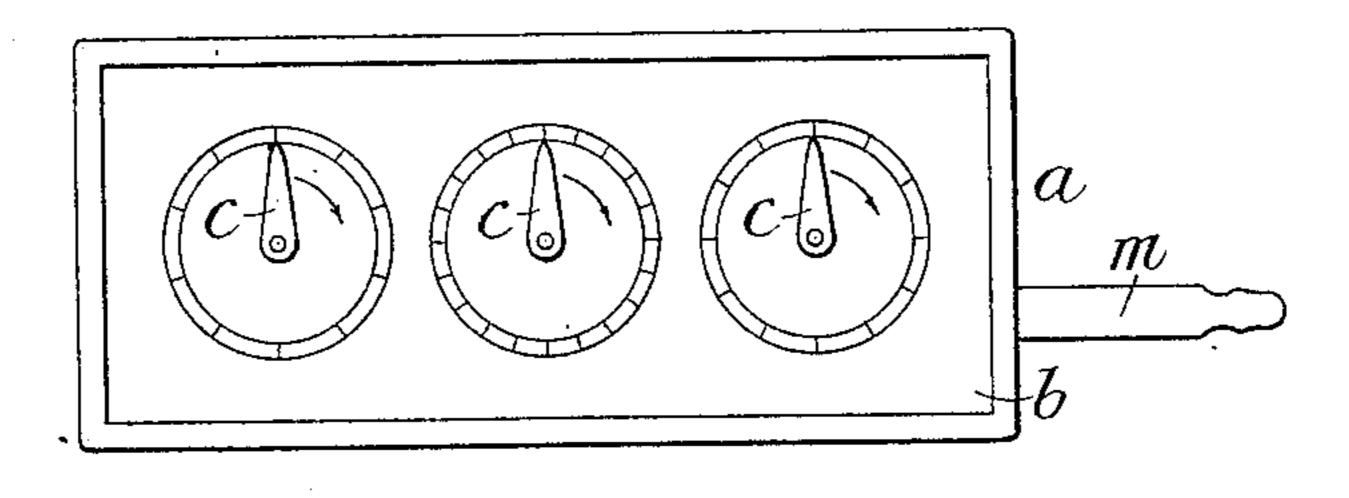
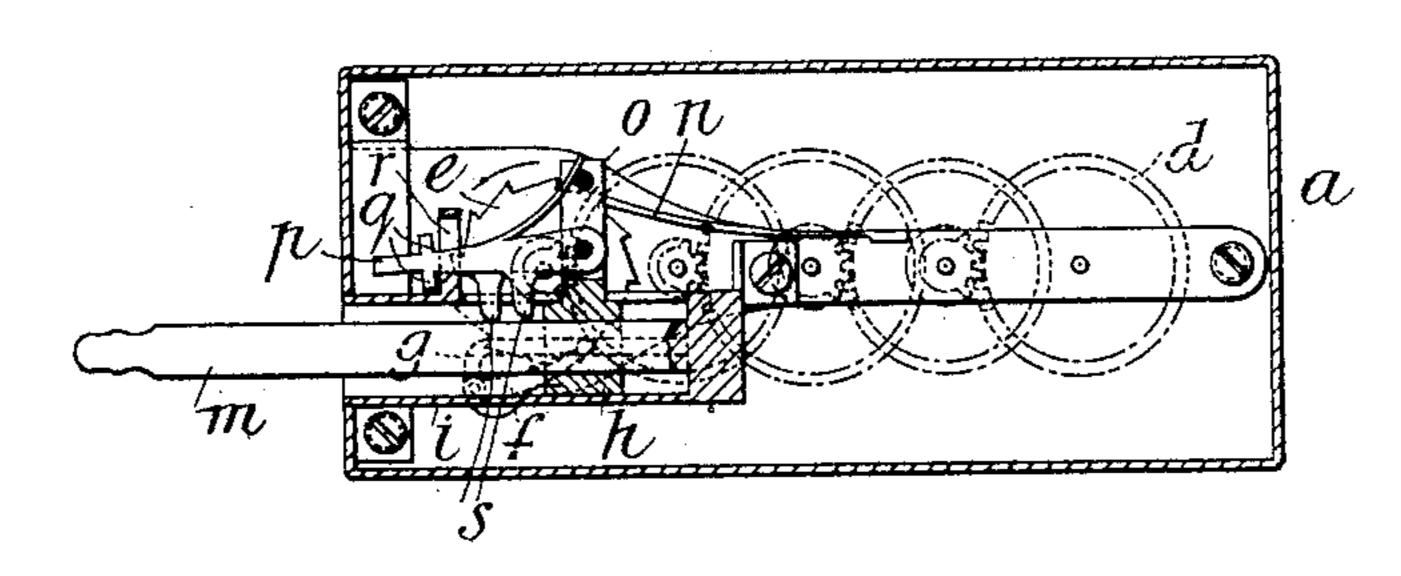


Fig. 6.



Witnesses. on Mohnson, InKall Inventor. Thomas Link. by G.B. Brock atty.

United States Patent Office.

THOMAS PINK, OF LONDON, ENGLAND.

REGISTERING APPARATUS, CHIEFLY FOR AMOUNTS DUE FOR PIECE-WORK.

SPECIFICATION forming part of Letters Patent No. 462,365, dated November 3, 1891.

Application filed August 6, 1890. Serial No. 361,186. (No model.)

To all whom it may concern:

Be it known that I, Thomas Pink, a subject of the Queen of Great Britain, residing at Bermondsey, London, England, have invented new and useful Improvements in Registering Apparatus, Chiefly Designed for Registering Amounts Due for Piece-Work, of which the following is a specification.

My invention relates to apparatus for registering the amounts due for piece-work and for similar purposes; and it comprises a device, hereinafter termed "a workman's register," which is capable of having registered upon it the amounts due to a workman for work done, and a second device, termed a "foreman's register," adapted to have registered upon it the sum of the amounts registered upon several workmen's registers.

According to my invention the workman's register comprises a case the face of which is provided with dials for indicating pounds, shillings, and pence, or other values, the fingers working over the said dials being geared together in a well-known manner, so that they can be operated by depressing or pushing a key or the like against a ratchet or other device for operating the train of wheels.

The foreman's register is constructed in substantially the same manner as the work-30 man's register, except that the dials are adapted to register a larger amount, in order to register the sum of the amounts indicated upon several workmen's registers. This foreman's register is advantageously constructed 35 with a key or pusher, the outer end of which is designed for operating the workmen's registers. With this construction it will be understood that when a workman's register is pushed onto the projecting key of the fore-40 man's register the same movement will operate both the said workman's and the foreman's register, the number of pushes corresponding to the amount to be registered. By applying the workmen's registers one after 45 the other the amount indicated on each workman's register will be added to the amount indicated by the foreman's register.

To enable my invention to be fully understood, I will describe the same with reference to the accompanying drawings, in which—

Figure 1 is a front view of a workman's reg-1 the said workman's and foreman's register

ister constructed according to my invention, and Fig. 2 is an end view of the same. Fig. 3 is a section on the line x x of Fig. 2, showing the mechanism in side elevation; and Fig. 55 4 is a section on the line y y, Fig. 3, showing the mechanism in plan. Fig. 5 is a view similar to Fig. 1 of the foreman's registering mechanism, and Fig. 6 is a view similar to Fig. 3 of the mechanism of the foreman's reg-60 ister.

The workman's and the foreman's register are constructed in substantially the same manner—that is to say, each of them is provided with an outer case a, one side b of which is 65advantageously formed of glass and has arranged behind it a face having a series of dials graduated according to the amount to be registered—for instance, for pounds, shillings, and pence, or for dollars and cents—a 70 finger or pointer c working in conjunction with each dial, which fingers or pointers c c are operated by a train of gearing d in a wellknown manner, or they may be operated by any other suitable means. The arbor of the 75 first-motion wheel of the train of gearing has secured to it a ratchet-wheel e, and in engagement with this ratchet-wheel is a pawl f, carried by an arm g, projecting from a block h, adapted to slide in a tubular guide i, the arm 80 g projecting through a slot in the side of the guide. It will be obvious that when the block h is pushed backward in the tubular guide i motion will be imparted to the ratchet-wheel e and thence to the train of gearing, the 85 amount indicated upon the dials corresponding to the number of movements imparted to the said block. Springs k k serve to return the block to its normal position.

The tubular guide i of the workman's register 90 is provided with a tubular extension l, adapted to enter the guide i of the foreman's register to move the block h therein, and secured to the end of the guide i is a rod m, adapted to pass through the tubular extension l of the work-95 man's register into the tubular guide i in order to operate the block h of the said work-man's register. With this construction it will be obvious that when the rod m of the foreman's register is introduced into the guide 100 i of the workman's and foreman's register and the said workman's and foreman's register

pressed toward each other the two blocks h will be simultaneously moved and so cause a corresponding rotation to be recorded upon the respective dials.

on is a spring-detent pawl, with which each apparatus is provided to prevent the movement of the ratchet-wheel in a backward direction.

rection. In order to prevent the workman's register to from being operated by the introduction of a plain rod into the tubular guide and to prevent the foreman's register from being operated by simply pressing a tube into its guide, I provide for normally locking each block in its 15 guide. For this purpose I advantageously provide each block h with an upward extension o, to which are pivoted two tumblers p p, each of which has at or near one end pins or projections q q, and in connection with the tubular 20 guide \hat{i} is arranged a locking-plate r, having an aperture therethrough sufficiently large to allow the pins or projections q q to pass when the tumblers p p are raised to a certain position, but which when the said tumblers are in their 25 normal position forms an abutment against which the pins qq can bear to prevent the movement of the block h relatively to the tubular guide. Each tumbler is also provided with an arm s, projecting into the tube i, and 30 the ends of the tubular extension l and the rod m are so shaped that when they are introduced into the respective guides they will first of all lift the tumblers to the required position to allow their pins q q to pass through 35 the openings in the locking-plates r r and

In using the apparatus hereinbefore described the workman's register is retained by the workman, while the foreman's register is kept by a foreman. When a workman has completed a certain amount of work, the foreman, having passed it, takes the workman's register and indicates on such register in the manner hereinbefore described the amount due to the workman for such work, the amount being at the same time indicated upon the foreman's register. This operation

is repeated with each workman, the total of

then push the blocks h backward.

the amounts allowed by the foreman being indicated upon the foreman's register.

In some cases it may be advisable to arrange a key or pusher in connection with each dial of the workman's register and of the foreman's register, so that, say, shillings may be indicated without it being necessary to 55 add each penny of the amounts separately.

Having now particularly described and ascertained the nature of the said invention and in what manner the same is to be performed, I declare that what I claim is—

1. Registering apparatus comprising two essential parts, each of which is provided with a registering mechanism, a locking mechanism, and a key or unlocking mechanism, the lock and key of one apparatus adapted to act- 65 uate the lock and key of the other apparatus and operate the respective registering mechanisms simultaneously.

2. Registering apparatus comprising two essential parts, each of which parts is provided 70 with registering mechanism and a key or pusher, said registering mechanism adapted to be operated by the key or pusher on the other part, the said keys or pushers being adapted to fit one within the other, so that 75 both sets of registering mechanism can be operated simultaneously, substantially as described.

3. In registering apparatus comprising two parts adapted to be connected and operated 80 simultaneously, the combination in each part of a train of gearing, a block sliding in a tubular guide and carrying a pawl engaging with a ratchet-wheel secured to the arbor of one of the wheels of the train of gearing, and 85 a key or pusher adapted to operate the block of the other part, substantially as described.

In testimony whereof I have hereto signed my name this 23d day of July, 1890.

THOMAS PINK.

Witnesses:

JOHN E. BOUSFIELD,

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A. L. Albutt.