

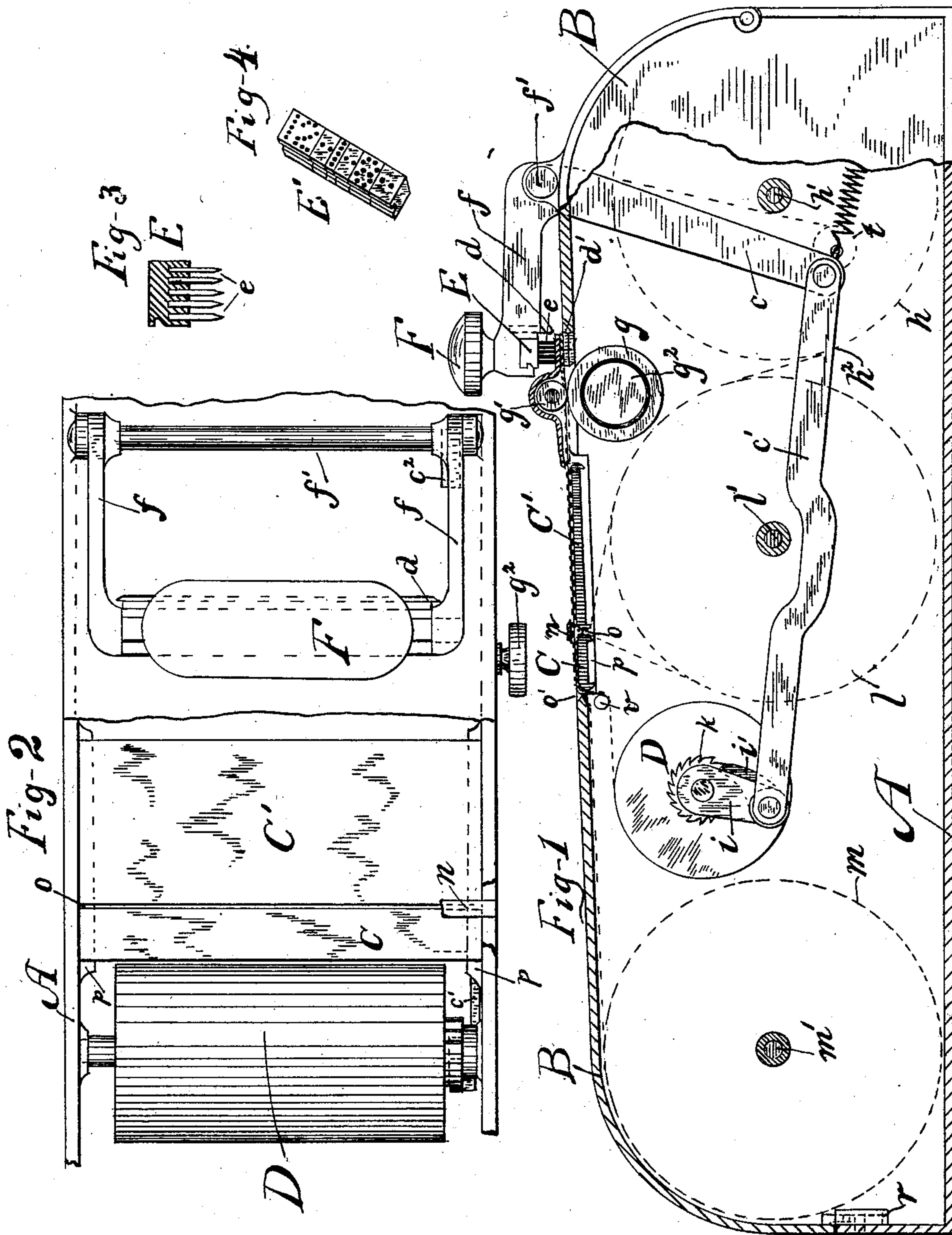
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Patented Aug. 2, 1898.

J. A. HOFF.
AUTOGRAPH CASH REGISTER.

(Application filed Feb. 14, 1898.)

(No Model.)



WITNESSES:

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AUTOGRAPH CASH-REGISTER.

SPECIFICATION forming part of Letters Patent No. 608,374, dated August 2, 1898.

Application filed February 14, 1898. Serial No. 670,291. (No model.)

To all whom it may concern:

Be it known that I, JOHN A. HOFF, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, have invented a new and useful Improvement in Autograph Cash-Registers, of which the following is a specification.

My invention relates to an improvement in the class of autograph cash-registers which serve by making an entry to produce one or more copies thereof, one for the customer to afford a voucher and one for the cashier or to be retained for other purpose, the third being retained as a record in the machine and always affording a check on the cashier.

The primary object of my improvement is to provide a simple and comparatively inexpensive construction of cash-register in the class referred to; and my object is also to provide means for use therewith and adaptable for use with any construction of duplicating or manifolding cash-register for ineffaceably marking by perforating or cutting two or more of the sheets with matter of identification, such as numbers, dates, and the like.

My invention consists in the general construction of autograph cash-register and of the marking attachment; and it also consists in details of the construction thereof and combinations of parts, all as hereinafter more particularly set forth.

Referring to the accompanying drawings, Figure 1 is a longitudinal vertical section of an autograph cash-register containing my improvement; Fig. 2, a broken plan view of the same; Fig. 3, a sectional view in elevation of a perforating character, and Fig. 4 a perspective view of a set of perforating characters.

A is the cash-register case, formed of any suitable material in the shape illustrated or in any other desired shape. The cover B is shown as hinged at one end and provided with a lock (indicated at *r*) at its opposite end to secure it against being opened without authority. In the cover is an opening, preferably of rectangular form, of the width of the case and flanked by ledges *p p*, extending inward from the case sides. On these ledges *p* are supported and confined in place by the cover when closed a narrower table C and a wider table C', separated by an intervening

slot *o*, which I prefer to cover by a shielding-strip *n*, raised slightly above the surfaces of the tables. Between one end of the cover-opening and the adjacent end of the table C is provided a slot *o'*.

On a roller *m'*, journaled in the case near one end, is carried a supply-roll of paper (indicated at *m*) for the customers' bills. To avoid having to use separate carbon-sheets with the machine, I prefer to use for the roll *p* the kind of paper which is coated on its under side with carbon or other suitable substance to render it a transfer-paper. Moreover, as I preferably provide this paper it is divided into sections, which should be of equal or approximately equal length, by printed headings provided at intervals on its outer surface. Another roller *l'* is journaled in the case near its center and carries the supply-roll of paper (indicated at *l*) for the register-roll or record-receiving roll D, also journaled in suitable position in the case and carrying rigidly on one of its ends a ratchet *k* and loosely on the shaft a crank-arm *i*, carrying a dog *i'* to engage the ratchet-teeth. Still another roller *h'* is journaled in the case near its end opposite that containing the roll *m* and carries the supply-roll of paper (indicated at *h*) for the cashier's vouchers.

The paper from the roll *l* is passed through the slot *o* across the table C and through the slot *o'* under a guide-roller *v* to the roll D, to be wound thereon, as hereinafter described, and by so winding it causing it to feed paper from the roll *l*. The paper from the roll *h*, leaving that roll at *h²* and indicated as bearing against the roll *l*, is passed through the slot *o* across the table C', and the paper from the roll *m* is passed through the slot *o'* across both tables C and C' under the shield *n* and over the strip on each, respectively, from the rolls *m* and *h*. Both sections of the paper which pass over the table C' extend beyond the latter between two suitably-supported feeding-rolls *g* and *g'*, cooperating by friction, and the lower one of which carries on its projecting end a thumb-nut *g²* or other convenient form of handle by which to operate it.

F is a spring-controlled hand-stamp supported by arms *f f* on a rock-shaft *f'*, journaled on the case and extending adjacent to the feed-roll *g'* to carry type E or other char-

acters, provided with perforating-points *e*, though instead of the latter cutting edges may be provided. Directly beneath the stamp *F*, in the cover *B*, is a plate *E'*, having one or
 5 more openings to receive the points on the characters *E*. The arms *f* carry a cutter-blade *d* to coöperate with a stationary knife-edge *d'*, projecting for the purpose into the path of the cutter-blade *D*. From one of the
 10 arms *f* there depends, through a slot *e*² in the cover, a rigid arm *e*, pivotally connected by a link-bar *e'* with the free end of the crank-arm *i*.

The operation is as follows: An entry is
 15 made by writing with a pencil on the uppermost section of headed paper on the table, the space for which may be utilized down to the shield *n*, which is provided to prevent liability of the pencil entering the slot *o*. At the op-
 20 posite side of the shield the footing or totals of the items entered on the other section thereof may be made. Thereupon the handle *g*² of the feed-rollers *g g'* is manipulated to feed past the stamp underneath the cutter
 25 *d* the two paper sections from the rolls *m* and *h* till the next heading on the upper section is brought under the stamp, when the stamp is actuated, as by pounding it with the hand, to cut off the customer's bill and cashier's
 30 voucher, and at the same time perforate or cut out of the advance end portion of both of these two paper strips the marking matter produced by the stamp. By repeating this operation with the stamp after each entry is
 35 made the resultant customer's bill and cashier's voucher are provided with the same mark, with the advantage of identification.

If desired, the arrangement may be such as to provide for the distinctive identification
 40 of each transaction, as by inserting new type for each or otherwise.

By operating the stamp the described connection of the rock-shaft *f'* with the arm *i* is moved to the dotted position indicated at *t*
 45 and actuates the dog *i'* to turn the ratchet *k* the extent of one tooth, thereby turning the roll *D* sufficiently to wind upon it the copy of the footing on the section of paper from the roll *l* covering the table *C* and provided
 50 thereon by entering the footing on the section of paper from the roll *m* covering said table. The matter wound upon the roll *D* is the footings of all entries made and serves as the employer's check upon the transactions.

55 As shown and described, my improved autograph cash-register affords a reliable and simple triplicating-machine, with the parts so disposed as to avoid the necessity of providing, to produce two copies of matter from
 60 the original entry, more than one interposed transfer medium or carbon surface, and this whether combined or not with the stamping device, which, as aforesaid, need not necessarily be provided with the cash-register any
 65 more than the latter need be provided to coöperate with the stamp. Moreover, the details of construction, as shown and described,

of the cash-register and stamping device may be variously modified or amplified without departure from my invention. Hence I do not
 70 limit my invention to such details. Thus, for example, the construction, character, and mode of operation of the character-puncturing device may be changed without such de-
 75 parture, and I wish to be understood as intending to include within my invention any form of puncturing device combined with an autograph cash-register in a manner adapting it to puncture two or more sheets at a
 80 time.

While I employ the terms "customers' bills" and "cashiers' vouchers" to designate particular purposes of the supplies of paper, it is not my intention thereby in any way to
 85 limit my invention to the particular uses of the paper-supplies suggested by these terms.

What I claim as new, and desire to secure by Letters Patent, is—

1. In an autograph cash-register, the combination with the case of rolls journaled there-
 90 in for carrying the supplies of cashier's-voucher, record and customer's-bill paper, a table in the cover having a wider section and a narrower section separated by an intermediate slot forming the common passage for
 95 the cashier's-voucher strip and record-strip through which they are extended from their supply respectively in opposite directions across the wider and narrower table-sections, a slot at the end of the narrower table-section forming the common passage for the cus-
 100 tomer's-bill strip extended from its supply-roll across both said table-sections and the return of the record-strip into the case, and means for feeding said strips across the table,
 105 substantially as and for the purpose set forth.

2. In an autograph cash-register, the combination with the case of a narrower and a wider table supported in an opening in the
 110 cover with a separating-slot between them and a slot between an edge of the narrower table and the adjacent edge of said opening, a roll journaled in the case carrying the supply of customer's-bill paper leading from
 115 within the case through one of said slots across both tables, a roll journaled in the case carrying the supply of record-paper leading from within the case through one slot across the narrower table below said customer's-bill pa-
 120 per and returning into the case through the other slot, and a roll journaled in the case carrying the supply of cashier's-voucher paper leading from within the case through said separating-slot across the wider table below
 125 said customer's-bill paper, substantially as and for the purpose set forth.

3. In combination with an autograph cash-register having paper-supplies extended one over the other along the cover, a character-puncturing device in the path of the papers,
 130 operating, by actuating it, to puncture said papers when brought beneath it, substantially as described.

4. In combination with an autograph cash-

register having paper-supplies extended one over the other along the cover, a character-puncturing device in the path of the papers and provided with one or more puncturing characters, substantially as and for the purpose set forth.

5. In combination with an autograph cash-register having paper-supplies extended one over the other along the cover, a character-puncturing stamping device in the path of the papers, provided with one or more puncturing characters and carrying a cutter, a knife-edge to cooperate with said cutter and a friction-feed for said paper-supplies, substantially as and for the purpose set forth.

6. In combination with an autograph cash-register containing the supply-roll *m* of cus-

tomers'-bill paper, the supply-roll *l* of record-paper, the record-receiving roll *D* and the supply-roll *h* of cashier's-voucher paper and provided with tables *C* and *C'* in an opening in its cover, a manual feed for the paper from rolls *m* and *h*, a character-puncturing device in the path of the paper extended over both said tables, and a connection between said device and the roll *D* for actuating it by operating said puncturing device, the whole being constructed and arranged to operate substantially as described.

JOHN A. HOFF.

In presence of—

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DAN W. LEE.