No. 833,029. PATENTED OCT. 9, 1906.

I. S. DEMENT.

INKING AND RECORDING MECHANISM.

APPLICATION FILED JAN. 9, 1904.

Fig: 1

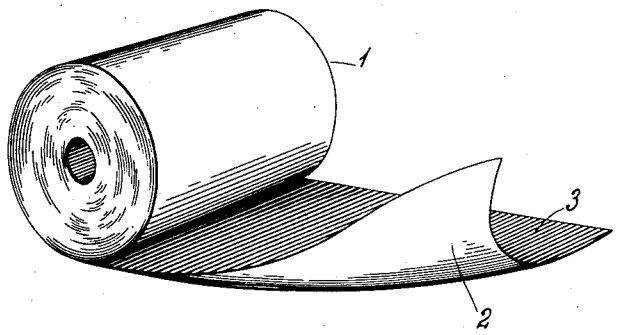


Fig: 2

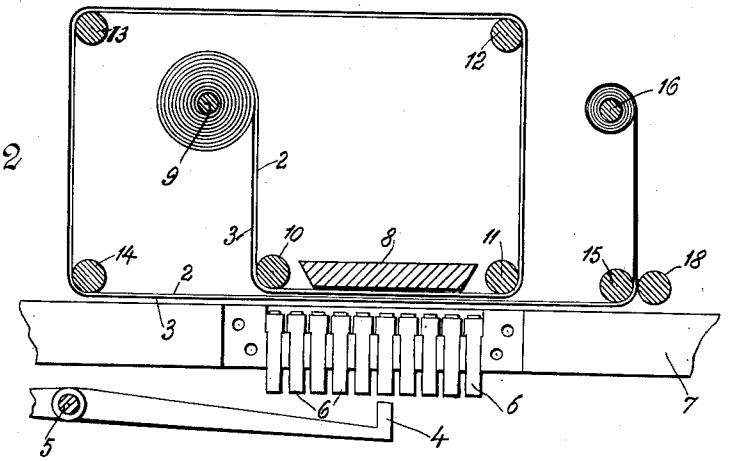
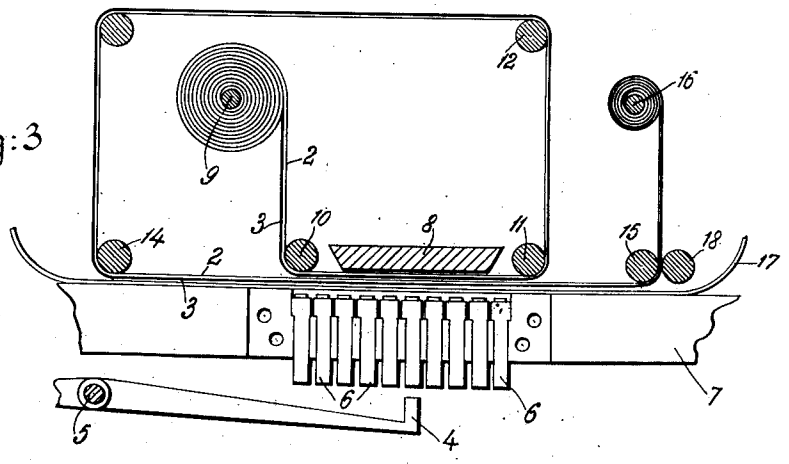


Fig: 3



Witnesses
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By his Attorneys
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UNITED STATES PATENT OFFICE.

ISAAC S. DEMENT, OF EAST ORANGE, NEW JERSEY, ASSIGNOR TO AMERICAN MECHANICAL CASHIER COMPANY, OF NEW YORK, N. Y., A CORPORATION OF NEW JERSEY.

INKING AND RECORDING MECHANISM.

No. 833,029. Specification of Letters Patent. Patented Oct. 9, 1906.

Application filed January 9, 1904. Serial No. 188,390.

To all whom it may concern:

Be it known that I, ISAAC S. DEMENT, a citizen of the United States, and a resident of East Orange, county of Essex, State of New Jersey, have invented new and useful Improvements in Inking and Recording Mechanism, of which the following is a specification.

My invention relates to inking and recording mechanism. It is useful in any printing mechanism.

It has for its object to dispense with a separate inking-ribbon or inking-surface and yet have an inking-surface in direct contact with the recording-surface at the time the printing is done

It consists of the novel devices and combinations herein shown and described.

My improvement may be used with any suitable printing device.

In the drawings accompanying this specification and forming part hereof I have represented the printing device only diagrammatically without giving full details of the same, as they form no part of the present invention, but are shown as simply illustrative of one form of printing device with which my improvement can be employed.

Referring to the drawings, Figure 1 represents the recording-strip used in my improvement. Fig. 2 represents the manner in which such recording-strip is folded upon itself. Fig. 3 represents the preferred form of my improvement with a second recording-surface provided.

1 represents the preferred form of combined recording and inking strip used by me in my improvement. It is provided on one side 2 with any suitable recording-surface —such, for instance, as paper—and on the other, 3, it is provided with any suitable inking-surface.

As shown, the printing device consists of a hammer 4, pivoted at 5 and actuated in any suitable manner, and of type 6, which in the form shown are loosely mounted in a sliding bar 7. This sliding bar may be moved by any suitable means to bring any type upon the printing-line above the hammer 4.

8 is a platen-surface between which and the type passes the recording-strip.

I fold the combined strip upon itself, so as to bring the inking-surface of one fold opposite the recording-surface of an adjacent fold on the printing-line. In the form of my improvement shown I accomplish this, so as to cause the opposing-surface of the first and third folds along the printing-line to consist of an inking-surface and a recording-surface. Referring to the form shown in the drawings, the combined recording and inking strip is wound upon a roller 9. From thence it passes around idle rollers 10, 11,12, 13, 14, and 15 and is wound up on roller 16. The means for moving the strip are not shown, as they form no part of the present invention. As the combined strip passes the printing-line the first time or the "first fold," as I term it herein, the recording-surface 2 is uppermost and the inking-surface 3 is beneath. The second fold, which lies between rollers 12 and 13, is merely for the purpose of bringing the strip into the right position to pass the printing-line with the recording-surface and inking-surface arranged similarly to that of the first fold—that is to say, with the recording-surface uppermost and the inking-surface beneath. The third fold lies between the rollers 14 and 15. As will be seen, at the printing-line the first and third folds have their inking-surface on the under side of the combined strip.

By the above arrangement the recording-surface of the lower or third fold is brought into direct contact with the inking-surface of the first fold, and when the hammer is operated a clear and distinct impression will be made upon the recording-surface of the strip.

By the above means a single recording-strip can be employed and a separate ribbon or separate inking devices dispensed with without in any way impairing the clearness of the printing impressions. Thus the means for printing in any machine can be very much simplified, all of the driving mechanism, for example, used commonly for moving an inking-ribbon being done away with.

By means of the above arrangement a second recording-strip 17 may be employed, as shown in Fig. 3. By leaving a space between the type and the combined strip the strip 17 can be inserted in place and its recording-surface be brought directly into contact with an inking-surface. Such additional recording-strip may be of any desired kind—as, for example, an ordinary strip of

paper inserted by hand through a suitable opening in the case—or it may be a second permanent recording-strip suitably mounted and fed in the machine.

18 is intended to illustrate a friction-roller, the details of which are not given, as they form no part of the invention.

Any suitable means may be employed for folding the combined recording and inking strip upon itself, and other modifications may be made than those shown or described herein without departing from my invention, the essentials of which are set forth in the claims appended hereto.

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

1. The combination of a combined recording and inking strip, a printing device, means for passing the strip past the printing-line of the printing device twice, so that the opposing surfaces of the two portions of the strip upon the printing-line shall consist of an inking-surface and a recording-surface respectively.

2. The combination of a combined recording and inking strip, a printing device, means for passing the strip past the printing-line of the printing device from one direction, means for passing the strip outside of the printing-line of the printing device back to the printing-line, and passing it again in the same direction as before past the printing-line, so that the opposing surfaces of the two portions of the strip upon the printing-line shall consist of an inking and a recording surface respectively.

3. The combination of a combined recording and inking strip, a printing device, means for passing the strip past the printing-line of the printing device twice, so that the inking-surfaces of both portions of the strip upon the printing-line shall face the same way.

4. The combination of a combined recording and inking strip, a printing device, means for passing the strip past the printing-line of the printing device from one direction, means for passing the strip outside of the printing-line of the printing device back to the printing-line, and passing it again in the same direction as before past the printing-line, so that the inking-surfaces of both portions of the strip on the printing-line shall be both on the type side of the printing device.

5. The combination of a combined recording and inking strip, a printing device, means for passing the strip past the printing-line of the printing device from one direction, means for passing the strip outside of the printing-line of the printing device back to the printing-line, and passing it again in the same direction as before past the printing-line, so that the inking-surfaces of both portions of the strip on the printing-line shall be both on the type side of the printing device, and a second recording-strip adapted to lie against the exposed inking-surface of the combined strip on the printing-line.

6. The combination of a combined recording and inking strip, a printing device, means for passing the strip past the printing-line of the printing device twice, so that the inking-surfaces of both portions of the strip upon the printing-line shall face the same way, and a second recording-strip adapted to lie against the inking-surface of one of the said portions of the strip.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

ISAAC S. DEMENT.

Witnesses:
J. O. GEMPLES,
EDWIN SEGER.