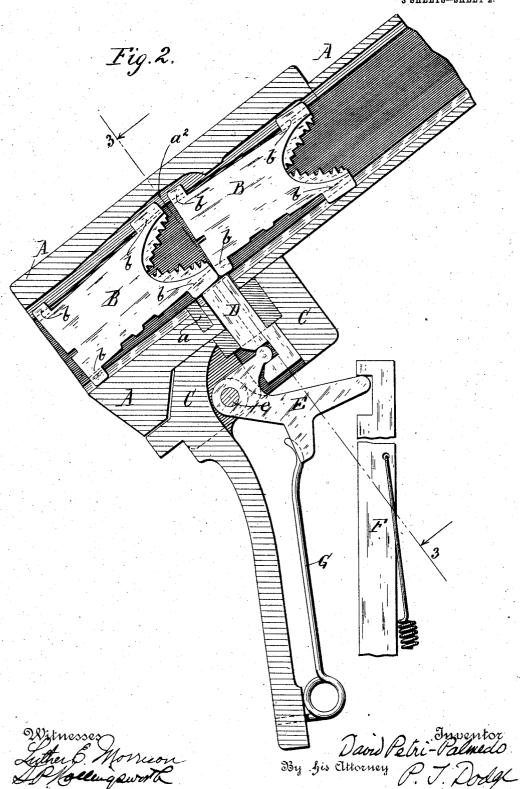
### D. PETRI-PALMEDO. LINOTYPE MACHINE.

APPLICATION FILED AUG. 25, 1906. 8 SHEETS-SHEET 1. David Polis-Palmedo By fix attorney P.J. Dodge

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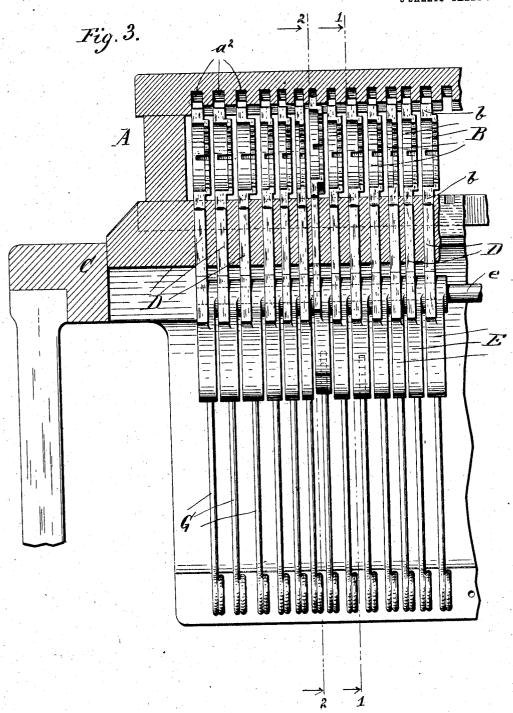
3 SHEETS-SHEET 2.



THE NORRIS PETERS CO., WASHINGTON, B. C.

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By fis altorney P.J. Dodge

#### UNITED STATES PATENT OFFICE.

DAVID PETRI-PALMEDO, OF HOBOKEN, NEW JERSEY, ASSIGNOR TO MERGENTHALER LINOTYPE COMPANY, A CORPORATION OF NEW YORK.

#### LINOTYPE-MACHINE.

No. 834,846.

Specification of Letters Patent.

Patented Oct. 30, 1906.

Application filed August 25, 1906. Serial No. 332,002.

To all whom it may concern:

Be it known that I, DAVID PETRI-PALMEDO, of the city of Hoboken, county of Hudson, and State of New Jersey, have invented a 5 new and useful Improvement in Linotype-Machines, of which the following is a specifi-

My invention has reference to linotypemachines and kindred machines wherein circulating matrices or type are stored in channeled magazines and released therefrom, one at a time, by escapement devices controlled by finger-key mechanism, so that the matrices may be assembled in line in the order 15 in which their respective characters are to appear in print—as shown, for instance, in Letters Patent of the United States No. 436,532.

My invention has reference to improved escapement mechanism for releasing the mat-20 rices one at a time from the magazine-channels and to this end consists, essentially, in a magazine having in each channel a stationary shoulder to engage and hold the foremost matrix, combined with means for shift-25 ing the matrix out of engagement with the shoulder, so that it may escape, the following matrix being permitted to take its place.

In the accompanying drawings, Figure 1 represents a longitudinal vertical section 30 through the lower end of a magazine provided with my improvements, the parts being in their normal positions of rest. Fig. 2 is a similar view showing the position of the parts the instant the matrix is released. Fig. 35  $\frac{3}{3}$  is a cross-section of the same on the line 3  $\frac{3}{3}$ .

Referring to the drawings, A represents the magazine, consisting, as usual, of two parallel plates provided in their opposing faces with longitudinal grooves arranged to receive and 40 guide the upper and lower edges of the matrices B, which are preferably constructed, as usual, with projecting ears b b at opposite ends.

C represents the portion of the main frame 45 on which the lower end of the magazine is supported, the magazine being removable from the machine at will with the matrices therein, as usual.

I provide each of the magazine-channels, 50 near the lower end, with a transverse bar or shoulder a, so located that when the parts are in their normal positions the upper ear of the foremost matrix will rest behind or whereby said matrix is retained within the 55 magazine and caused in turn to hold those behind or above it.

D represents an escapement-slide mounted to slide vertically upward through the bottom of the magazine in such manner as to act 60 upon the upper end of the foremost matrix and the lower end of the following matrix. When this slide is down in its normal position, (shown in Fig. 1,) it is inactive, and the matrices are held securely in position. When, 65 however, the slide is raised to the position shown in Fig. 2, it lifts the upper ear of the foremost matrix above the detaining-shoulder a, thereby allowing the matrix to pass forward by gravity out of the lower end of 70 the magazine. The slide at the same time sustains the ear at the lower end of the following matrix above the level of the shoulder a, so that as this matrix slides forward, following the one discharged at its forward 75 end, its ear will be carried over the forward stop-shoulder a. As the second matrix continues its forward movement to the position vacated by the first matrix the lip at its upper end will come in contact with the shoul- 80

der a, and its further advance will be arrested.

The parts will be preferably so timed in action that the slide D will descend to its original position in time to leave a clear path for the passage of the upper ear on the second 85 matrix to the stop-shoulder a, but if by chance the slide D should remain in its elevated position until the upper shoulder of the second matrix reaches it the proper ac-tion of the parts will be prevented, since the 90 matrix - ear will encounter the slide D and be momentarily arrested thereby. In such case the descent of the slide will be followed by the advance of the matrix to its final position in the extreme end of the magazine.

The slide D may be actuated through any suitable connections by a finger-key or other actuating means. I prefer to employ, as shown, in connection with each slide D an angular operating-lever E, pivoted at e in the 100 main frame and having one end seated in a notch in the escapement-slide D and the opposite end seated in a notch in a vertical reed F, controlled by the keyboard and serving normally to depress the escapement-lever in 105 opposition to the spring G, secured to the main frame and acting on the lever E, so as above this shoulder, as shown in Fig. 1, | to raise it when released by the raising of the

reed F in response to a touch on the corre-

sponding key of the keyboard.

In order to permit the lifting of the matrices that they may pass over the detaining-shoulder a, the magazine is widened vertically to the required extent directly over the lifting-slide, as shown at  $a^2$ , the channels or grooves in the plate being widened or grooved vertically, as shown. It will of course be understood that the distance between the inner surfaces of the top and bottom plates, the depth of the grooves therein, and the vertical length of the matrix-ears will bear such relation that the matrices will be constantly held and guided at both the upper and the lower edges.

It will be observed that the escapementslides D are mounted in the main frame and that the magazine is a complete unitary structure having both its top and bottom plates extended beyond the escapements in such form and manner as to give support to the lowermost matrix, this construction adapting the magazine when removed to carry with it all the matrices contained in the machine.

The essence of my invention lies in providing a magazine, a stationary shoulder to retain the matrices, and in employing in connection therewith escapement devices adapted to lift the engaging portions of the successive matrices clear of the retaining-shoulder, that they may pass freely thereby. In practice the shoulders are most readily produced by seating a continuous bar transversely in the bottom of the magazine in a groove formed therein, as shown.

It will be understood that the sectional

form of the stop-shoulder and of the devices for lifting the matrices clear of the same may be varied at will, provided they retain essentially the mode of action herein described.

Having described my invention, what I

claim is—

1. In a linotype-machine, a longitudinally-channeled magazine having stationary shoulders in the channels to arrest the end matrices, in combination with means for lifting the matrices clear of said shoulders.

2. A linotype-magazine provided with longitudinal channels and stationary shoul- 50 ders to arrest the end matrices, the channels being widened vertically to admit of the matrices being lifted clear of the shoulders.

3. In a linotype-machine, the longitudinally-channeled magazine provided with retaining-shoulders a, in combination with matrices having ears at their two ends, and means for lifting and supporting the matrixears clear of the detaining-shoulders; whereby the end matrix may be discharged and the 60 second matrix arrested in the position vacated by the first.

4. In a linotype-machine, a magazine consisting of the longitudinally-channeled plates and the fixed bar a seated transversely there- 65 in; whereby a shoulder is provided in each

channel to engage a matrix.

In testimony whereof I hereunto set my hand, this 17th day of August, 1906, in the presence of two attesting witnesses.

DAVID PETRI-PALMEDO.

Witnesse:

Witnesses:

F. M. Eggleston, Walter Moblard.