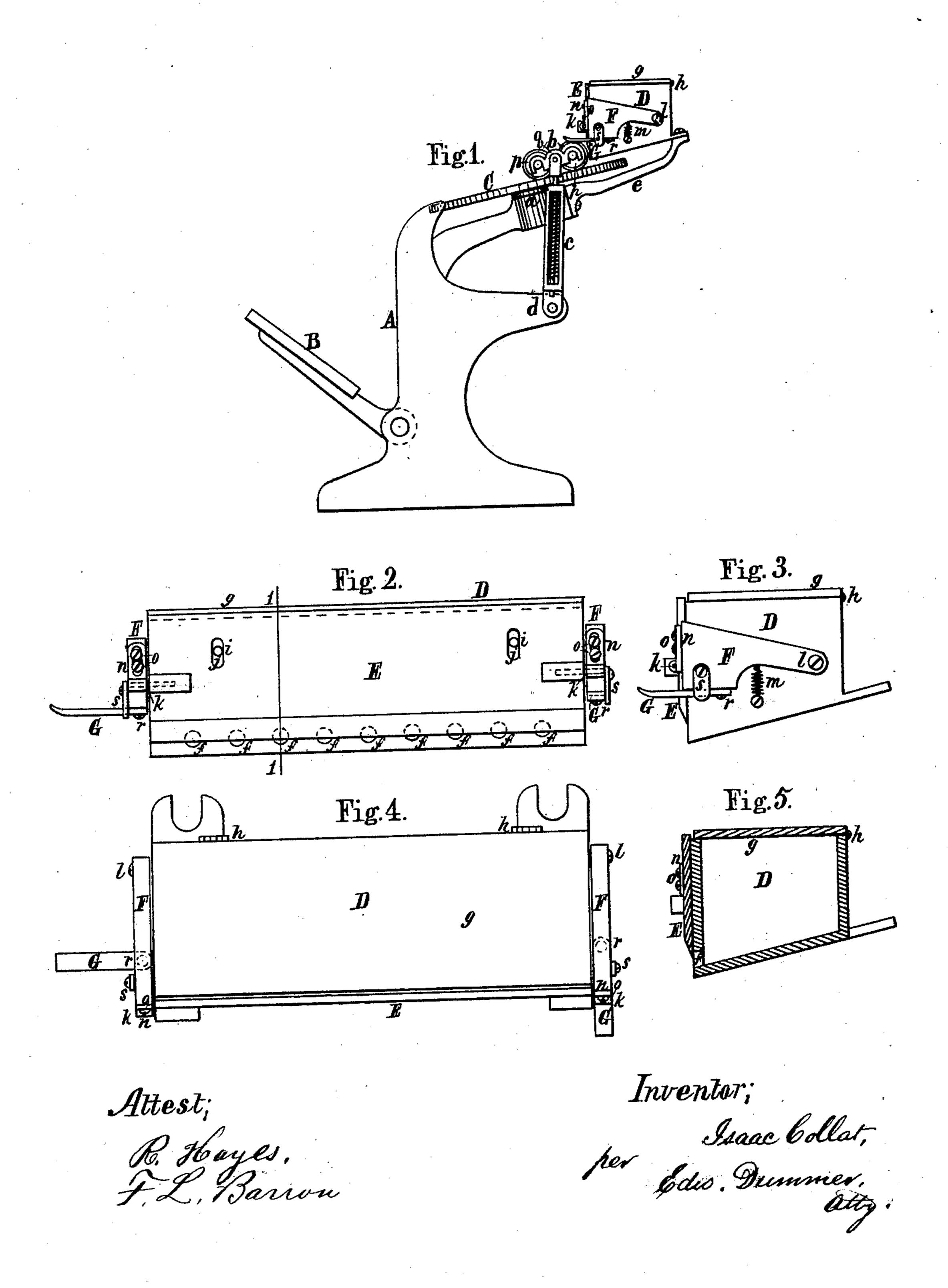
I. COLLAT. Ink Fountain.

No. 232,335.

Patented Sept. 21, 1880.



INITED STATES PATENT OFFICE.

ISAAC COLLAT, OF BOSTON, MASSACHUSETTS.

INK-FOUNTAIN.

SPECIFICATION forming part of Letters Patent No. 232,335, dated September 21, 1880.

Application filed February 14, 1880.

To all whom it may concern:

Be it known that I, ISAAC COLLAT, of Boston, in the county of Suffolk and State of Massachusetts, have invented a new and useful 5 Ink-Fountain for Printing-Presses, of which the following is a specification, reference being had to the accompanying drawings.

My invention relates to an ink fountain or apparatus as an attachment to a printing-press, ro by which the ink-plate and ink-rollers shall receive a constant and even supply of ink dur-

ing the operation of the press.

My invention consists, first, in a reservoir to contain ink, which may be fixed on the 15 press and located in such relation to the inkplate and ink-rollers that one or more of said rollers may come in contact, or nearly in contact, with the reservoir opposite one or more openings therein, to touch the ink which may 20 flow through said openings, and thus take ink so as to distribute the same in suitable quantity on themselves and on the ink-plate; secondly, in a plate, shield, or cover, in such combination with said reservoir that said 25 openings may be closed or their size gaged by the same; thirdly, in mechanism by which the ink-rollers, their shafts or pulleys thereon, or pieces or arms containing the bearings of said shafts, may move the said plate, shield, or 30 cover that there may be free passage for the ink through said openings only when one or more of the rollers are at or near the reservoir.

In the drawings, Figure 1 is a side elevation of so much of a press having my ink-fountain 35 or attachment connected therewith as is necessary to show the position and manner of attaching my device. Fig. 2 is a front elevation, Fig. 3 a side elevation, and Fig. 4 a plan view, of the ink-fountain detached from the press. 40 Fig. 5 is a cross-section taken on line 1 1 in Fig. 2.

All the figures are drawn on the same scale, with the exception of Fig. 1, which is on a

smaller scale.

The parts shown are those of an oscillating press having a bed, A, platen B, and circular ink-plate C arranged in relation to each other as shown, the ink-plate C being caused to make part of a revolution about its center a at the 50 time of every impression. The ink-rollers bare caused to pass forward and backward over

the bed A after every impression, and while the impression is being given forward and backward over the ink-plate C, by means of the arms c, pivoted at d, and by mechanism 55

well known in this kind of presses.

D is my reservoir, which is of a proper size and shape to hold the ink and is fixed a little above the ink-plate C, being firmly held to the press by means of one or more arms or sup- 60 ports, e. The reservoir D is of a form and so located that one of the rollers b, at the extreme limit of its motion in that direction, shall touch, or nearly touch, along its length the front of the reservoir near its lower edge and 65 opposite openings f, which are passages for the outward flow of the ink along the front and near the bottom of the reservoir. There may be a cover or lid, g, for the reservoir, hinged at h, to protect the ink from dust, &c. 70

Against the front face of the reservoir Dis a plate, shield, or cover, E, which may slide vertically, being held by arms F and guided by pins i in the slots j. Each of the arms Fis pivoted to the plate E at k and to the res- 75 ervoir at l. Springs m tend to draw the arms F, and hence the plate E, downward. When the plate E is down the openings f are closed, but when it is raised the ink may flow through the openings. The pivot-pins k are in bear- 80 ings forming part of slides or plates n, which may be adjusted by screws o to have the plate E rise the distance to uncover the openings fto the proper extent.

Arms G extend outward from the arms or 85 levers F at the front of the reservoir, so that the rollers b, their shafts or pulleys p thereon, or pieces q, in which their shafts bear, (preferably the pulleys p,) may press thereunder, and by them lift the arms F, and hence raise the 90 plate E, the arms G being curved at their outer ends for this purpose, as shown. Thus the openings f will be closed till the near approach of the rollers b. The arms G, being pivoted at r, may be swung out of the way, as 95 shown in the drawings in case of one, so that the plate E may remain down to cover the openings f when desired. Buttons s will hold the arms G in position to be acted on by the rollers.

The reservoir D may be of any desirable shape that will permit one or more of the ink-

rollers to come in contact with openings therein to receive the ink, and that said openings may be closed substantially, as by plate E. It will be seen that instead of the circular 5 openings f shown, these may be of other shapes, or there may be simply one longitudinal opening or slit. At times it may be best not to have the plate or cover E raised at every approach of the rollers, but to have it so fixed to as to let out constantly the amount of ink reand the work.

My ink-fountain need not be confined in application to an oscillating press, but may be adapted to any printing-press where the ink 15 roller or rollers may approach the reservoir and receive ink therefrom, substantially as

described.

1. A reservoir for ink, having one or more 20 openings, f, along its front lower edge, and a vertical plate or cover, E, for closing or gaging said openings, in combination with an ink-

plate and the bed of a printing-press, and with an ink-roller which comes in contact with said openings and passes over said ink-plate and 25 bed, substantially as hereinbefore described.

2. An ink-reservoir, D, in combination with a plate or cover, E, for closing or gaging openings therein, and with levers F, pivoted at k and l, springs m, and ink-roller which passes 35 over both ink-plate and bed, or with parts moving with said roller for operating said plate or cover, substantially as hereinbefore described.

3. The combination of the ink-reservoir D, 35 plate or cover E, levers F, pivoted at k and l, and arms G, pivoted so as to be swung out of contact with the inking-roller, or parts moving therewith, substantially as hereinbefore described.

ISAAC COLLAT.

Witnesses:

EDW. DUMMER, LOUIS COHEN.