G. W. PROUTY.

Improvement in Printing-Presses.

No. 132,599. Patented Oct. 29, 1872.

Fig. 1.

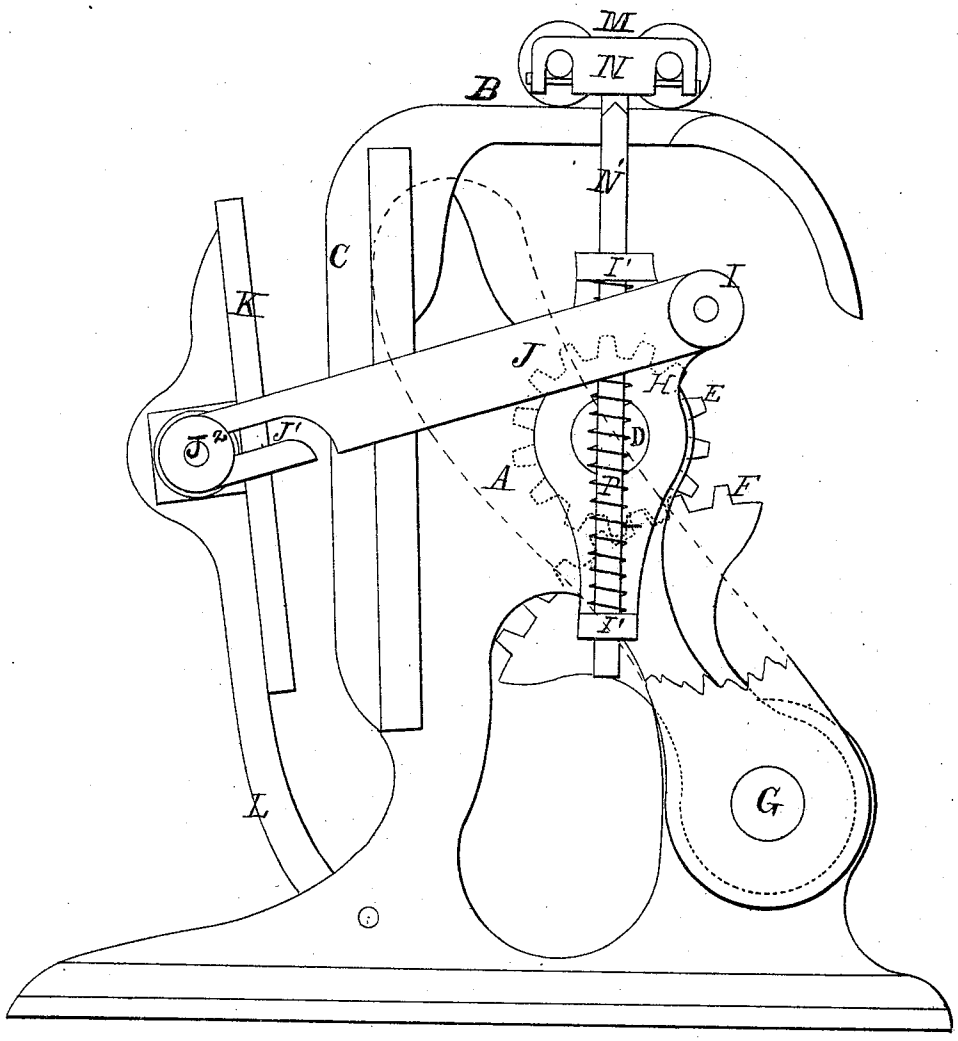
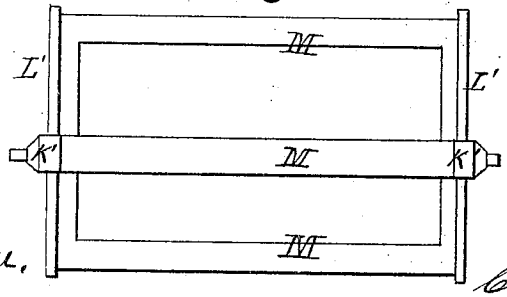


Fig. 2.



WITNESSES.

Geo. E. Upham.

Jos. B. Loomis.

INVENTOR.

Geo. W. Prouty.

Chipman Hosmer & Co.

attys.

UNITED STATES PATENT OFFICE.

GEORGE W. PROUTY, OF CHARLESTOWN, MASSACHUSETTS.

IMPROVEMENT IN PRINTING-PRESSES.

Specification forming part of Letters Patent No. **132,599**, dated October 29, 1872.

To all whom it may concern:

Be it known that I, GEORGE W. PROUTY, of Charlestown, in the county of Middlesex and State of Massachusetts, have invented a new and valuable Improvement in Printing-Presses; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawing making a part of this specification and to the letters and figures of reference marked thereon.

Figure 1 of the drawing is a representation of a side view of my invention; and Fig. 2 is a detail of the same.

This invention has relation to printing-presses for small job work; and consists in the novel construction and arrangement of the devices for operating the platen and inking-rollers and for coupling the same to the one driving-shaft, all as hereinafter more fully described.

Referring to the accompanying drawing illustrating my invention, A represents the sides of the press embodying my improvements. B indicates the ink-plate, supported at the top of the press, and C the type-bed, located at the front of the latter, and arranged in a vertical position. D designates a horizontal shaft, holding a pinion, E, actuated by means of a toothed segment, F, attached to the main shaft G. Upon the ends of the shaft D are arranged the peculiar crank-plates H, each furnished with a crank-arm, I, and with the two brackets I′. To the crank-arms are pivoted the pitmen J, connecting said crank-plates to the platen K, in order to transmit motion from one to the other when the shaft D is rotated. The platen is hinged to the lower part of the press-frame by means of the curved arms L. M represents the inking-rollers, journaled to the end plates N, to which are pivoted the rods N′, passing thence through the brackets I′ and encircled by the spiral springs P, so arranged as to keep the inking-rollers in contact with the type and ink-plate, and to allow them to freely adapt themselves to the peculiarities of form and arrangement of the type-bed and ink-plate. As will be observed, the relative arrangement of the brackets I′ to the crank-arms H is such that the platen comes in contact with the type just when the inking-rollers have reached the limit of the ink-plate, and that the platen completes its reverse movement simultaneously with the arrival of the rollers to the lower edge of the type-bed. At the ends of the inking-rollers are arranged small wheels K^1 loose upon the roller-shafts K^2, and adapted to rotate in contact with the flanges L′ cast or formed on the sides of the chase M′. These wheels are designed to lessen the friction of the inking-rollers, and to thereby protect them from speedy wear as well as to cause the press to work easily. The ends of the pitmen J are constructed with curved open-ended slots J^1, in which the arms J^2 of the platen have their bearings. These slots are made in the form shown, so that the pitmen may be readily uncoupled from the platen, and the latter let down to a horizontal position for the better arrangement of work, and for other purposes.

What I claim as new is—

1. The plates H having the brackets I′ and side crank sockets or equivalents I for the connecting of the platen and inking-rollers to the pinion-shaft through the medium of the pitmen J and rods N′, substantially as described.

2. The toothed segments F engaging with the pinion E, and arranged to transmit motion to the platen and inking-rollers through the medium of the shaft D, crank-plate H, pitmen J, and rods N′, or their equivalents, substantially as specified.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

GEORGE W. PROUTY.

Witnesses:
L. W. CHAMBERLIN,
DANIEL MCLAUGHLIN.