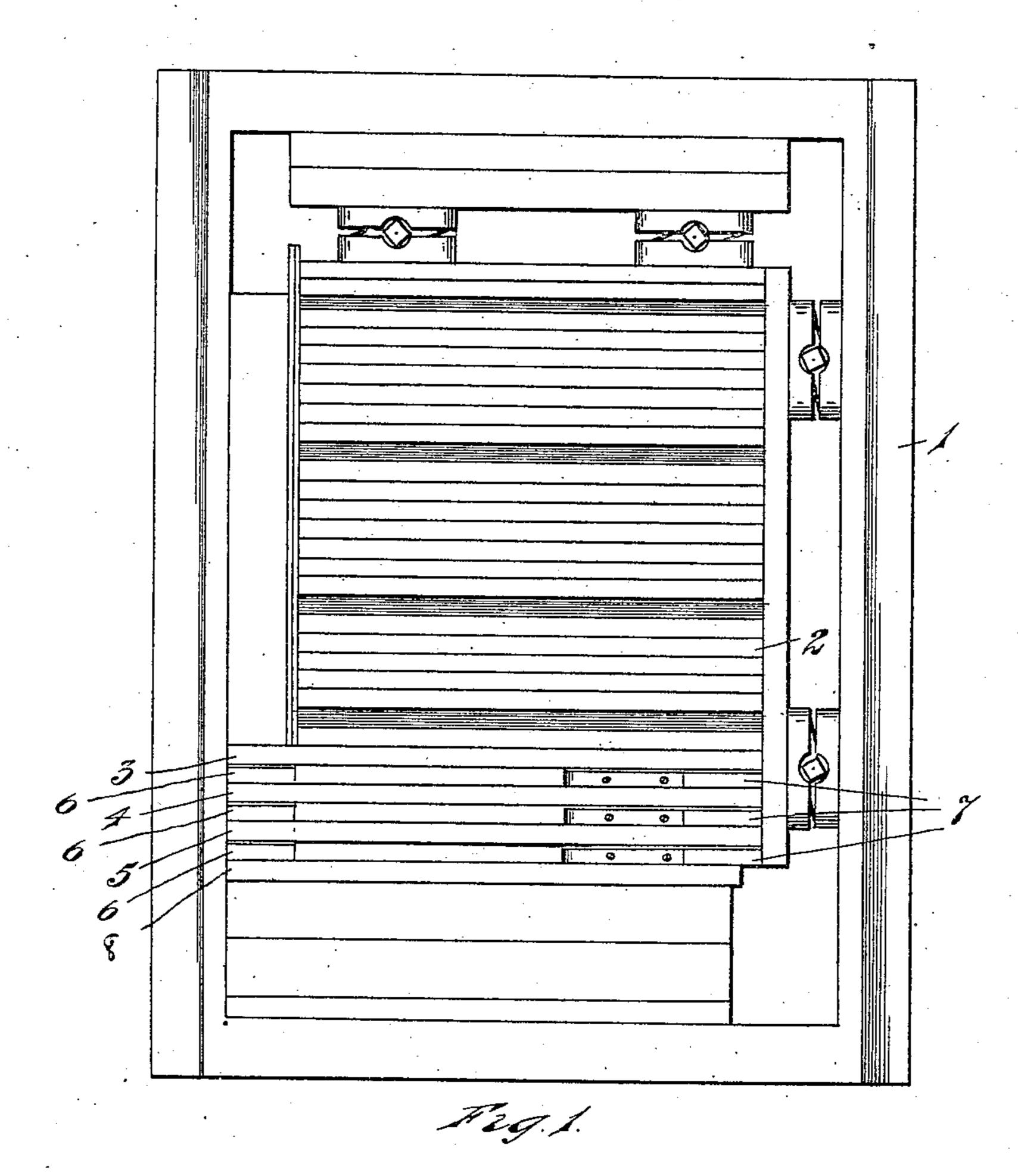
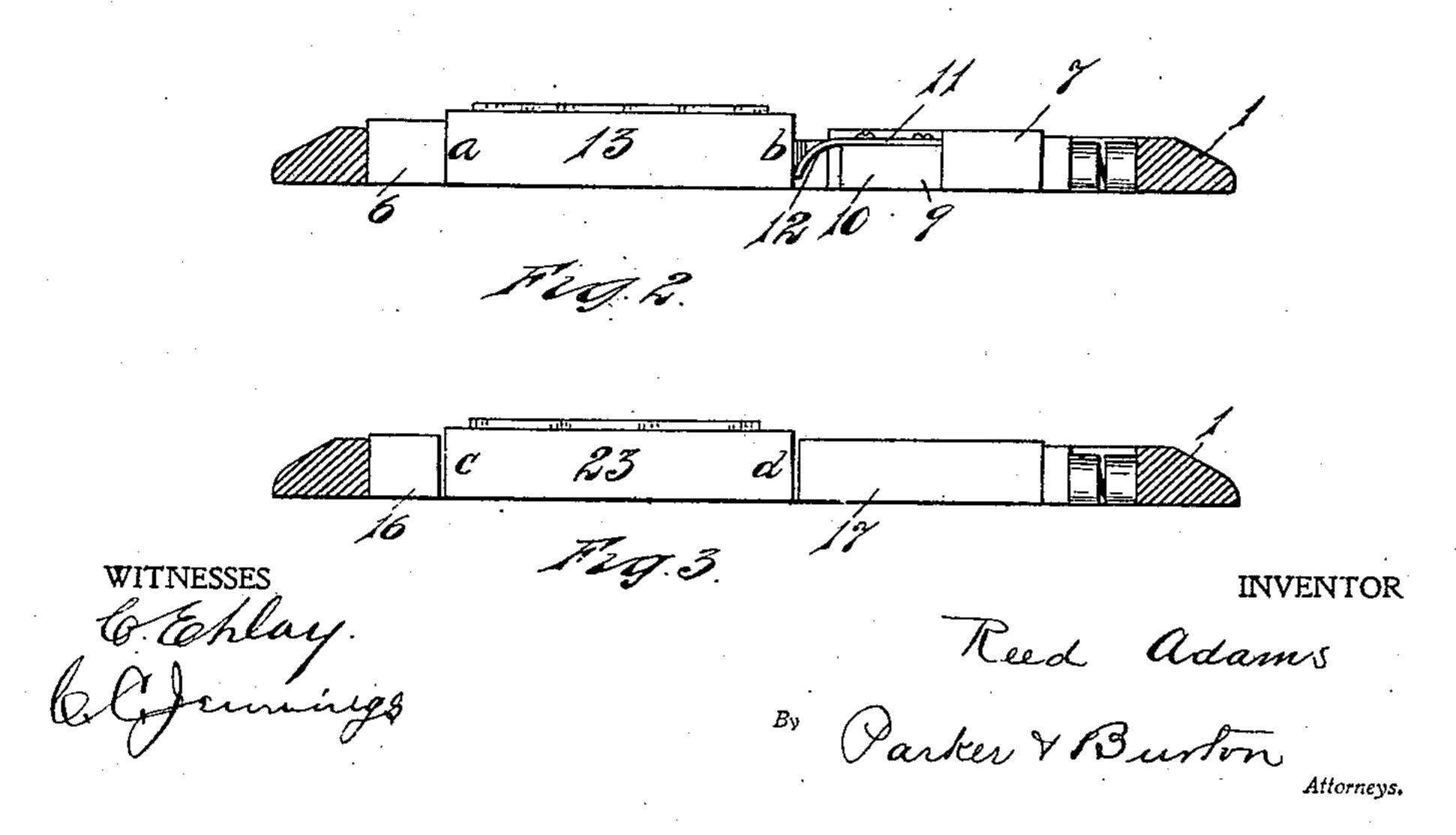
R. ADAMS.

PRINTING DEVICE.

APPLICATION FILED AUG. 31, 1906.





UNITED STATES PATENT OFFICE.

REED ADAMS, OF LAPEER, MICHIGAN.

PRINTING DEVICE.

No. 868,315.

Specification of Letters Patent.

Patented Oct. 15, 1907.

Application filed August 31, 1906. Serial No. 332,740.

To all whom it may concern:

Be it known that I, Reed Adams, a citizen of the United States, residing at Lapeer, county of Lapeer, State of Michigan, have invented a certain new and useful Improvement in Printing Devices, and declare the following to be a full, clear, and exact description of the same, such as will enable others skilled in the art to which it pertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification.

This invention relates to printing; it has for its object an improved device which admits of the quick change of a portion of the type contained in a chase, without unlocking the form or disarranging any parts except the parts that are changed. This enables a printer to print rapidly, circular letters or similar printed matter, and to change the name of the person to whom the letter is addressed and the place of address and similar parts of the letter which may be required where a single copy only is sent to one recipient, and where only one or a few persons are addressed at a particular place.

In the drawings:—Figure 1, shows a form contained in a chase with the parts embodying the invention contained therein. Fig. 2, is an elevation showing a single one of the interchangeable parts; the figure being a section through the chase along a line drawn through its center portion from top to bottom. Fig. 3, shows a section through a slot in which the linotype is held without spring quads.

1, indicates the chase; 2, a form locked up therein, and as a part of the form, there are locked with the other type and parts connected therewith, a number of leads 3, 4, 5, and 8 spaced by quads 6 and 7, leaving 35 slots between the quads 6 and 7, and the contiguous leads at each side of the quads 6 and 7. Each of these slots is partly filled by a spring quad 9; this spring quad is of peculiar construction consisting of a body part 10, slightly shorter or lower than an ordinary quad 40 and having secured to the face thereof a leaf spring 11 which bends over the end and toward the back of the quad furnishing an inclined spring surface 12 that reaches from near to the top of the slot to near the bottom thereof. This spring, it is evident, extends 45 lengthwise of the frame or chase as a whole, so that the shaping up of the type in the individual lines, as respects its position near to, or far from, one side or the other, it is unaffected by the presence or absence of the removable linetype bar 13. It will be noted from 50 an inspection of Fig. 2 that the further toward the tip of the spring and away from the quad a block or linotype bar 13 engages against the spring, the greater is its distance from the body of the quad itself because of the constant outward trend or extent of the spring.

A linotype bar 13 slightly smaller than the space 55 between the quad 6 and the spring quad 9 and provided with suitable printing matter on the face engages in the slot between the quad 6 and the spring 12 of the spring quad 10; this linotype can be inserted or removed readily and easily by catching it at the end 60 a and rocking the end b on the inclined surface of the spring 12. An expert operator is able to insert two or three such linotypes in suitable slots in a few seconds so that when the impressions are taken on an ordinary Gordon press, an operator can remove one set of lino- 65 types and insert another set of linotypes practically without stopping the press, or by stopping it for a very brief interval, and is thus enabled to print circular letters with the proper individual address at the head thereof very much more rapidly than the same circu- 70 lars could be printed and subsequently addressed by a typewriter, and moreover when this device is used, the printing of the address and of the body of the circular is in the same ink and in identically the same type, properly spaced and in proper alinement.

A modified form may be used without spring quads in which case the linotype bar 23 engages between quads 16 and 17 and is made slightly thinner and shorter than the slot into which it can be inserted and from which it can be removed with celerity after a 80 little experience. The first form described is preferable.

What I claim is:—

1. A quad provided with a spring secured to the front thereof, inclined from the front to the rear with a diversence from the body of said quad greater at the rear than at the front, whereby a linotype body may engage thereagainst and be rocked thereon, substantially as described.

2. A spring quad, having in combination a quad body, a spring secured to the face thereof and extending from 90 the face toward the back thereof but inclined with respect to said quad body, and with a greater divergence therefrom at the rear than at the front, substantially as described.

3. In combination with a printing form, composed of type blocks and quads arranged to form a slot, a spring 95 quad located at one end of said slot and having the spring of said quad extending into said slot on an incline and diverging from said quad body toward the back of said slot, whereby a linotype inserted in said slot may bear against the inclined face of said spring and be rocked 100 thereon, substantially as described.

4. In combination, a printing form provided with a slot for the reception of a linotype, a yielding quad provided with an inclined yielding face projecting into said slot, and a linotype adapted to be inserted in said slot or 105 withdrawn therefrom by pressing the said linotype endwise and rocking it on said spring surface, substantially as described.

In testimony whereof, I sign this specification in the presence of two witnesses.

REED ADAMS.

Witnesses:

H. VAUDE BOGART,

D. C. BARTLETT.