(No Model.)

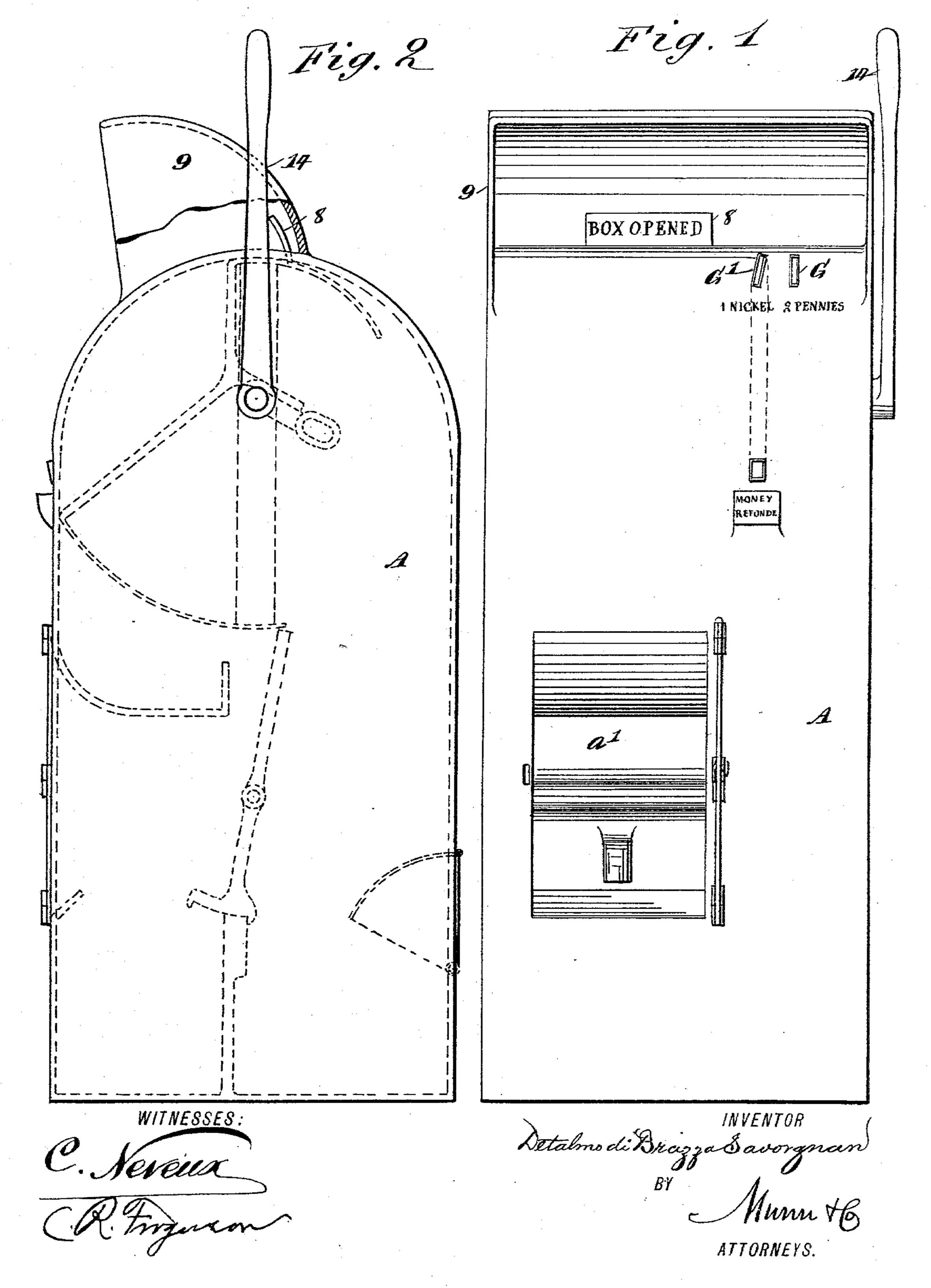
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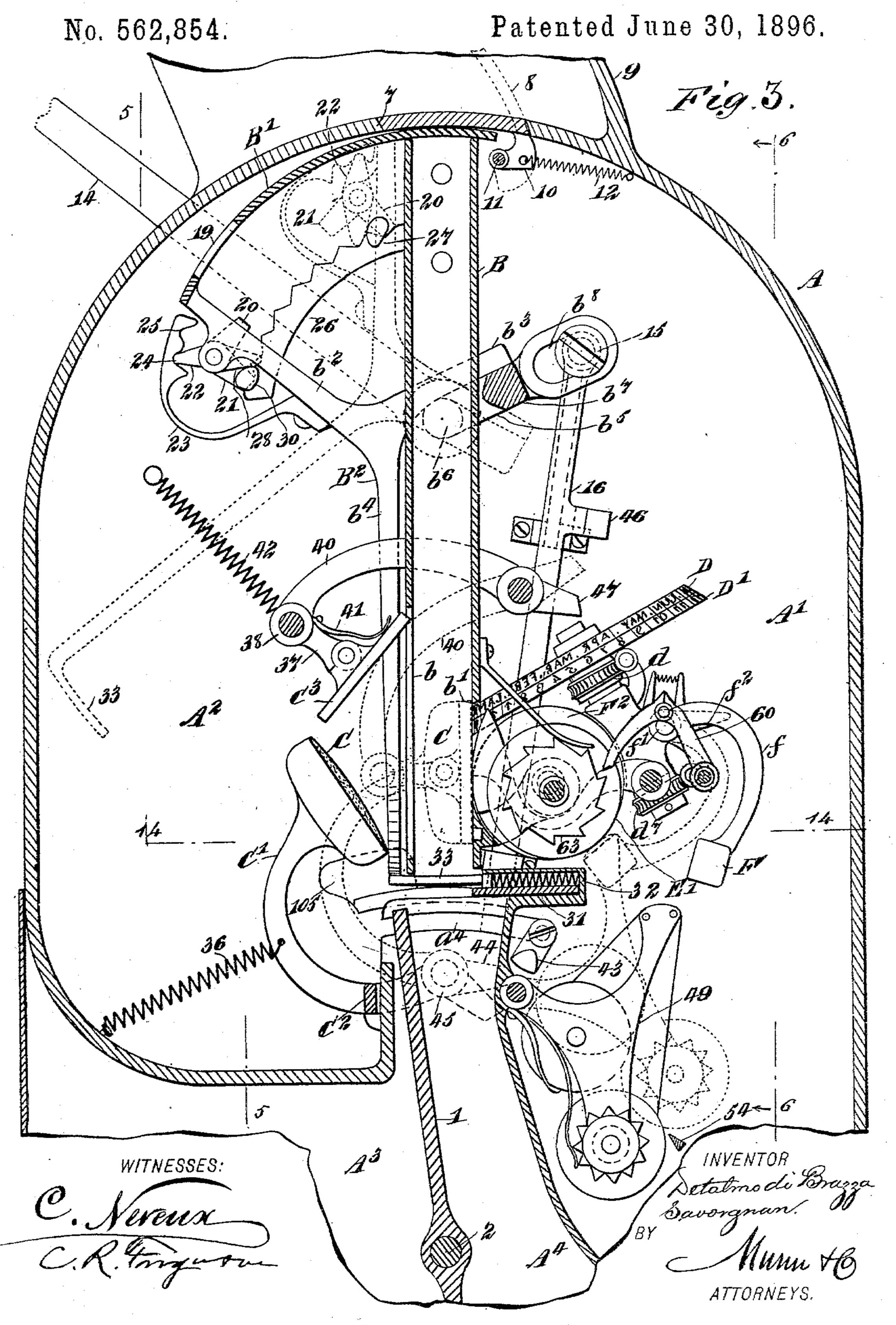
D. DI B. SAVORGNAN.

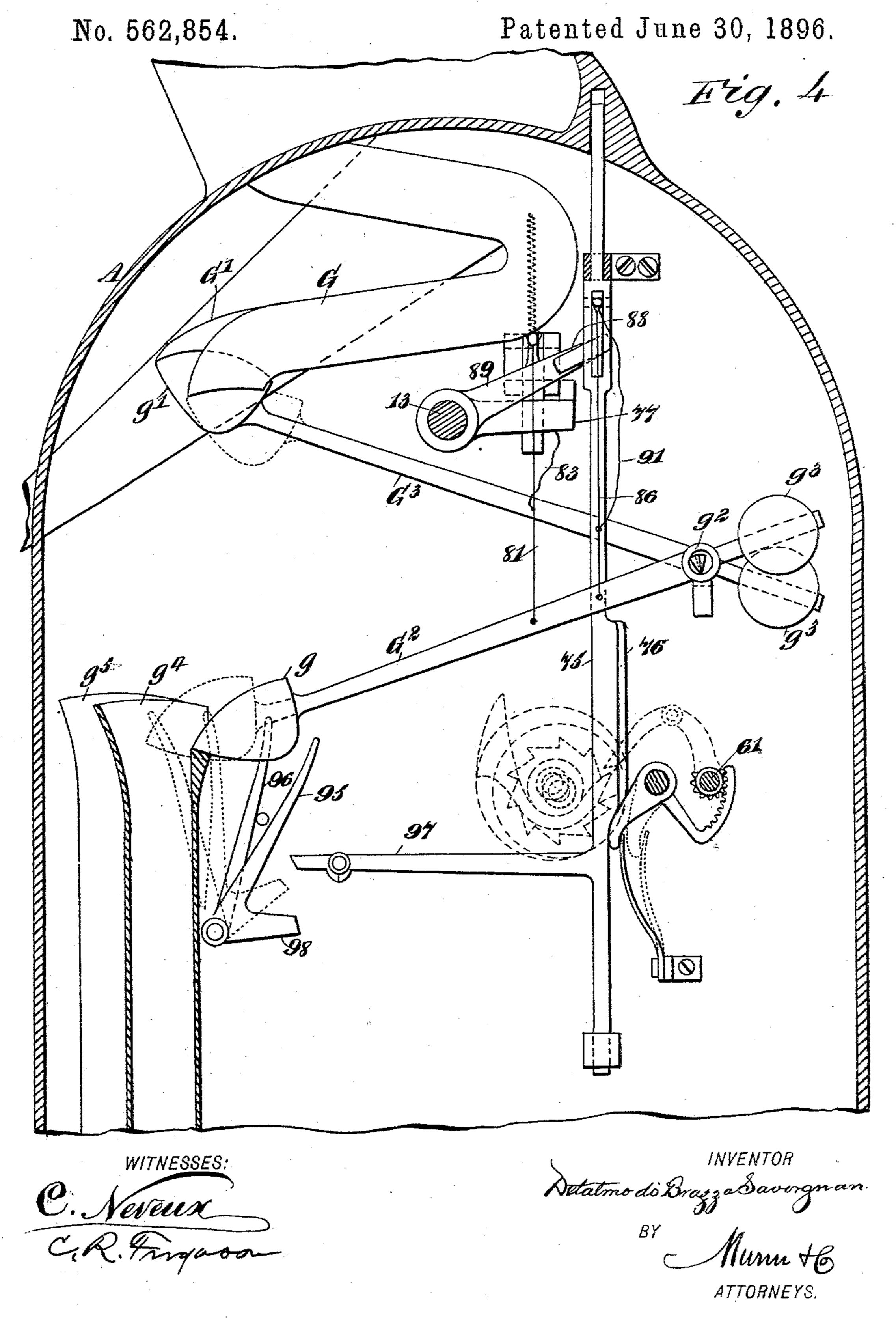
COIN FREED LETTER POSTING OR STAMPING MACHINE.

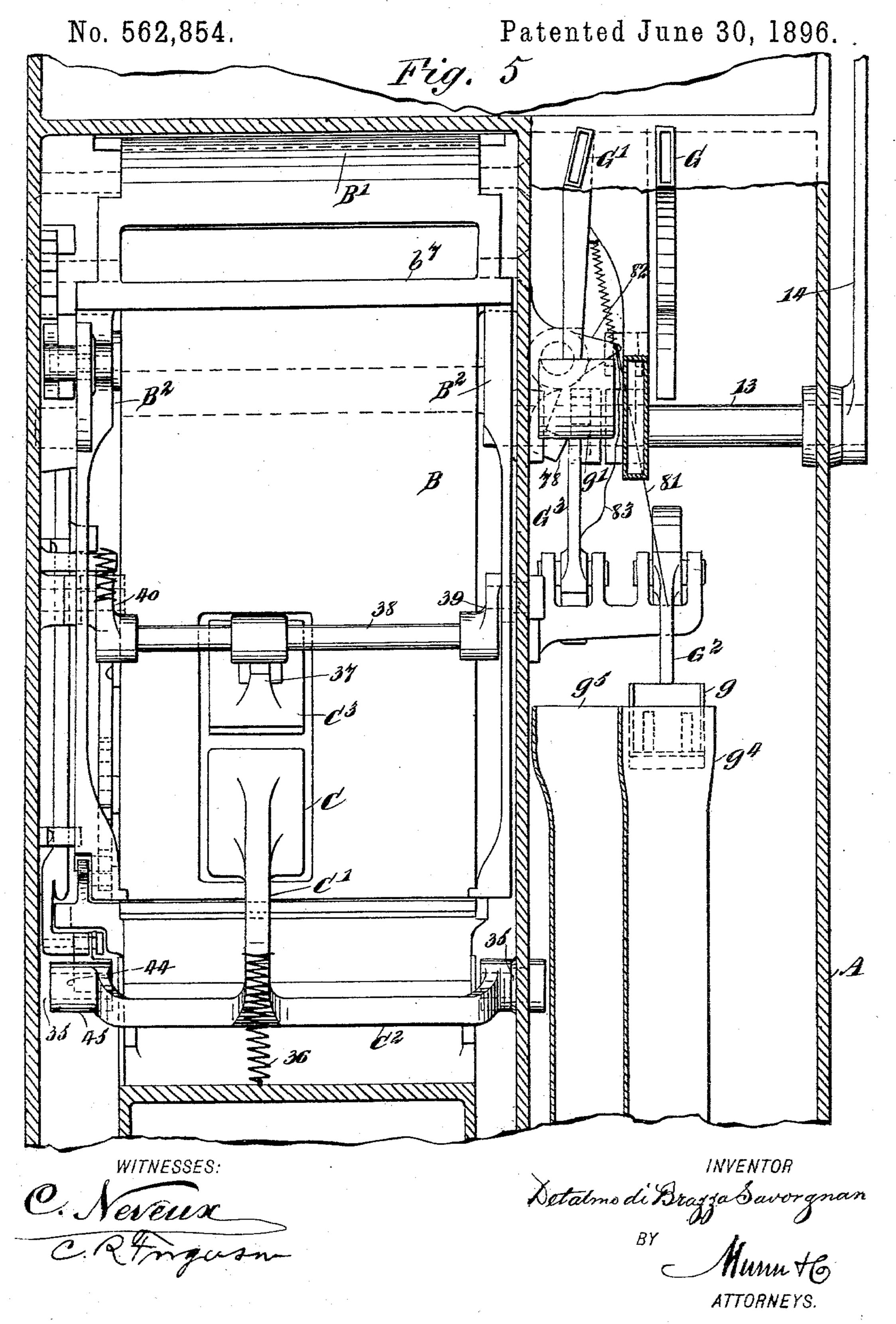
No. 562,854.

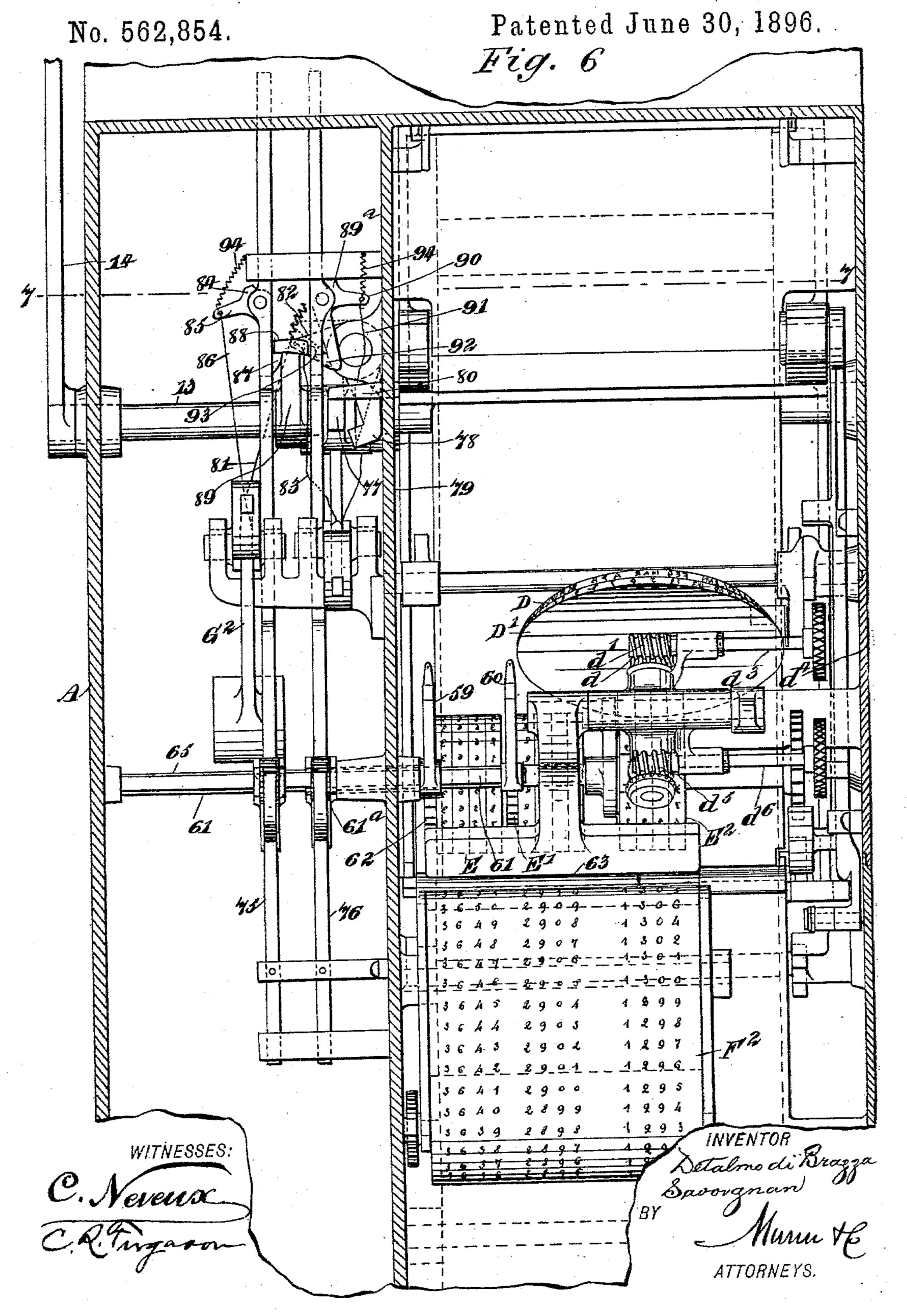
Patented June 30, 1896.











(No Model.)

10 Sheets—Sheet 6.

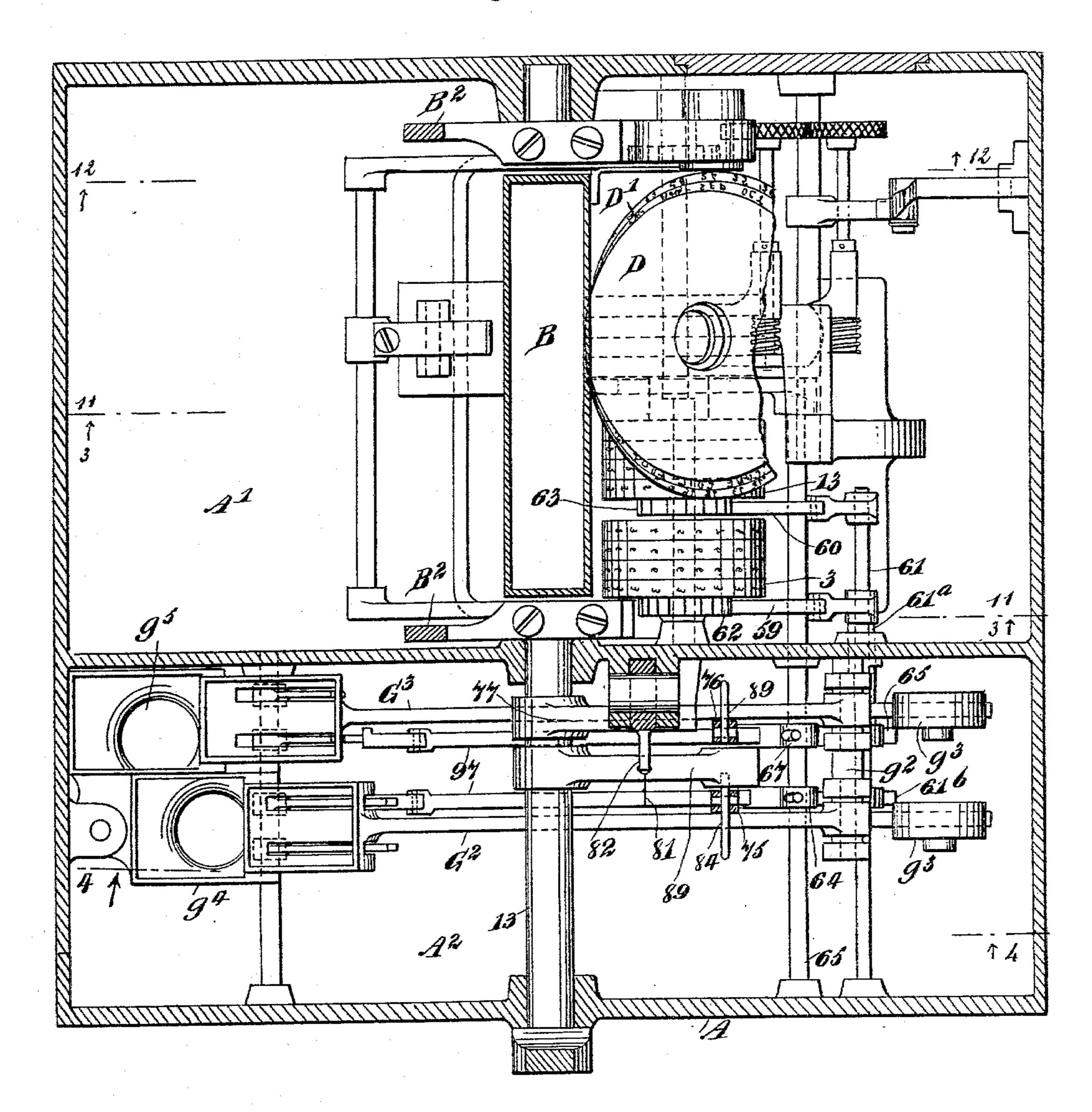
D. DI B. SAVORGNAN.

COIN FREED LETTER POSTING OR STAMPING MACHINE.

No. 562,854.

Patented June 30, 1896.

Fig. 7



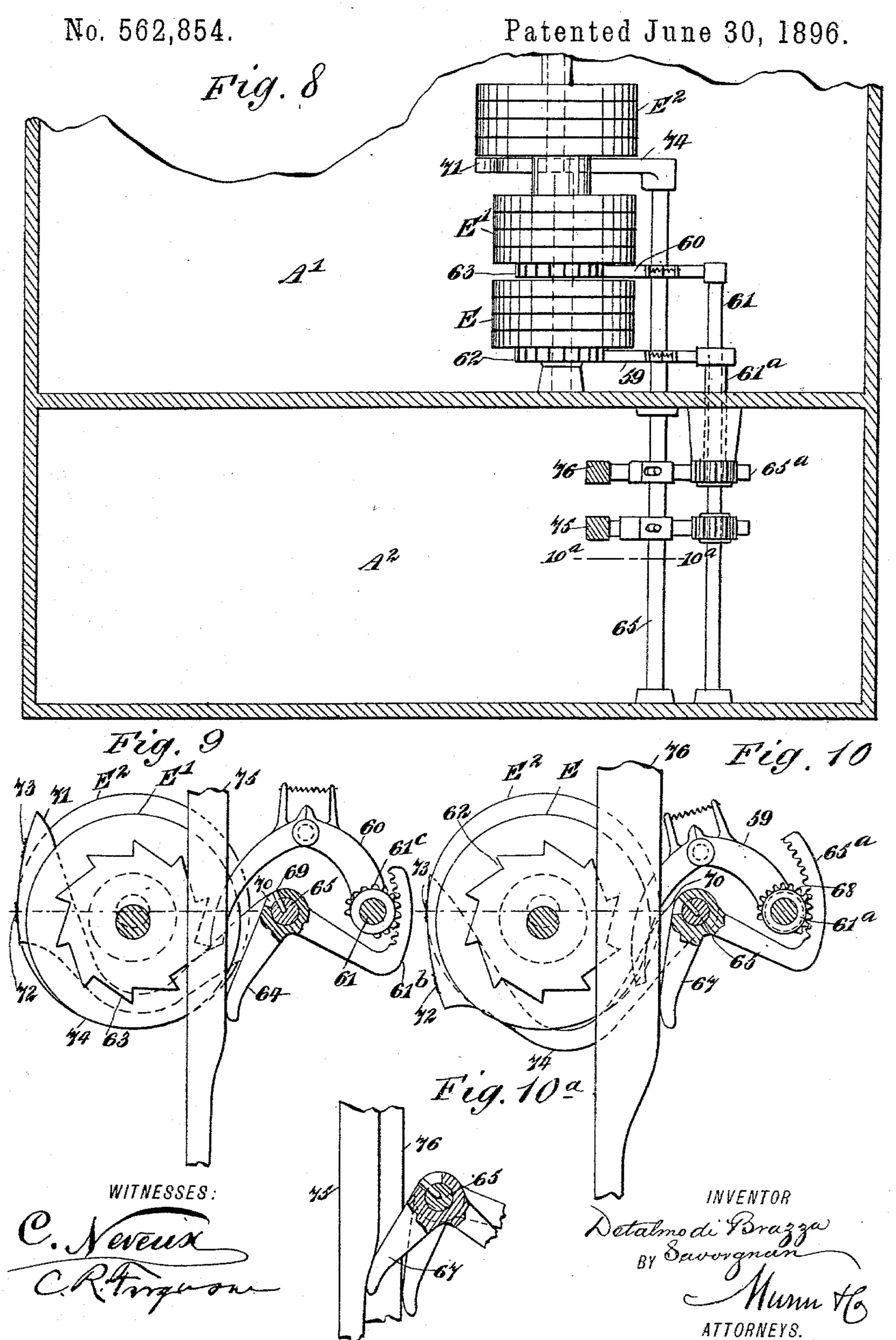
C. Neveren C. R. Frigues INVENTOR

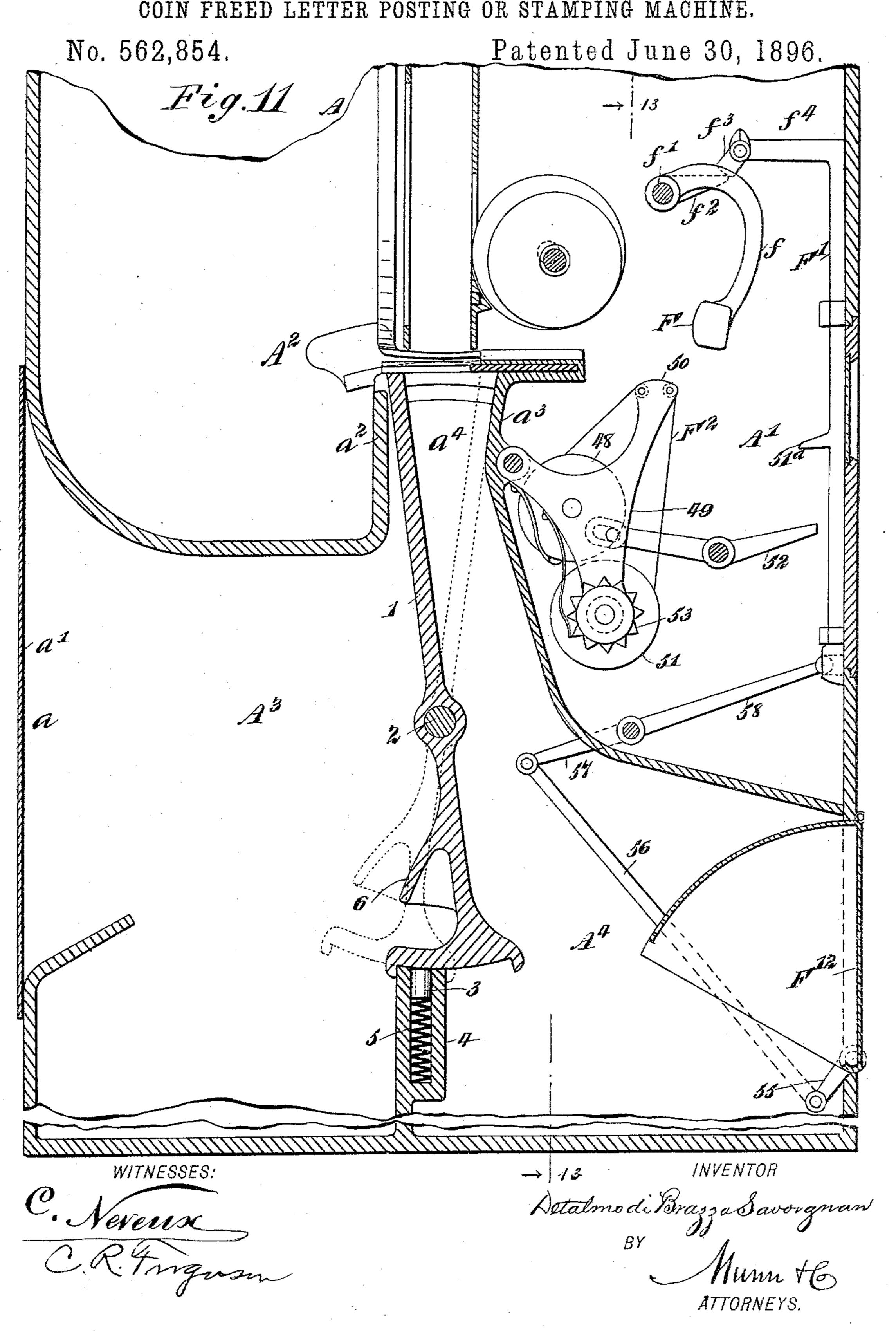
Detalmodi Brazza Savorgnan

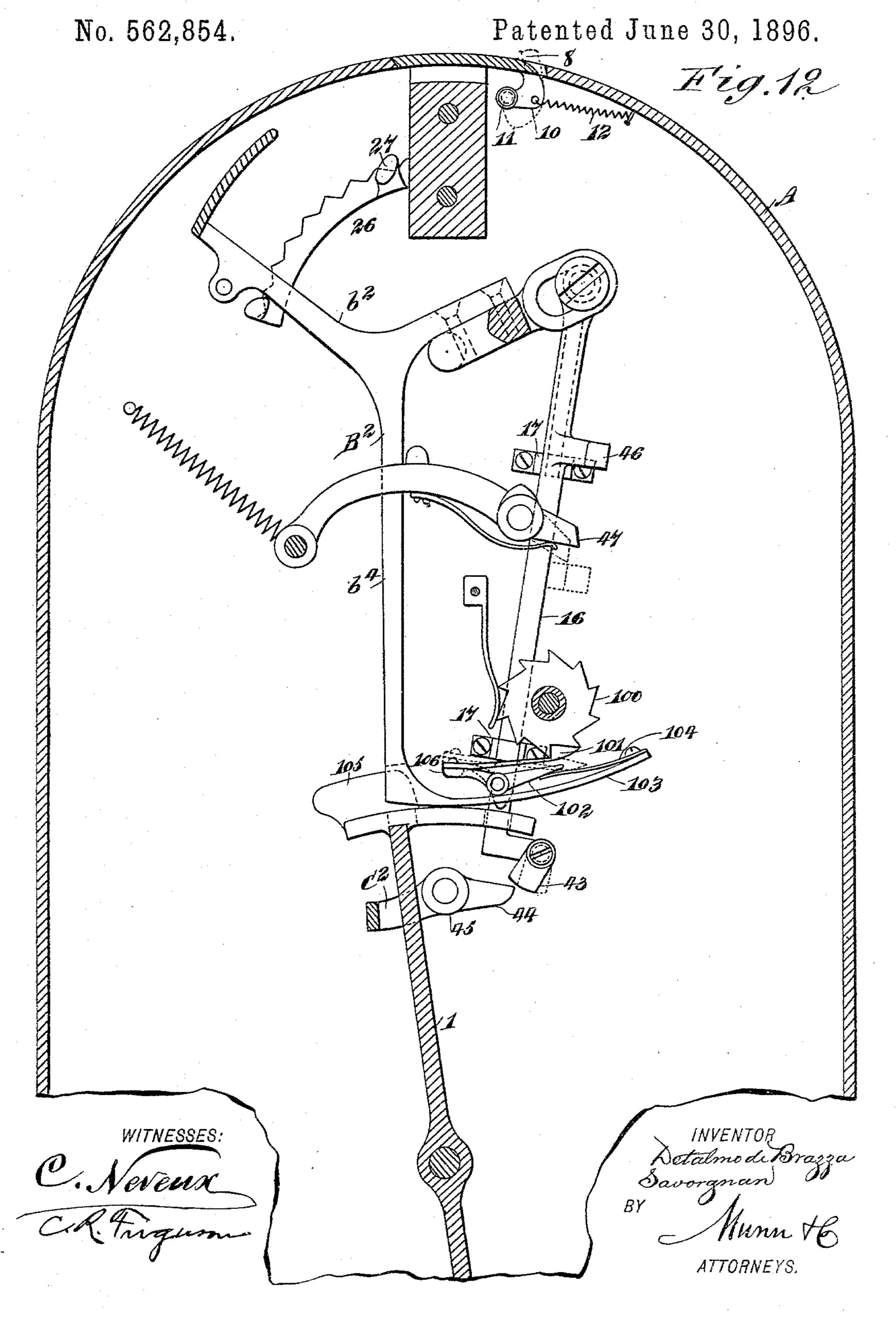
BY

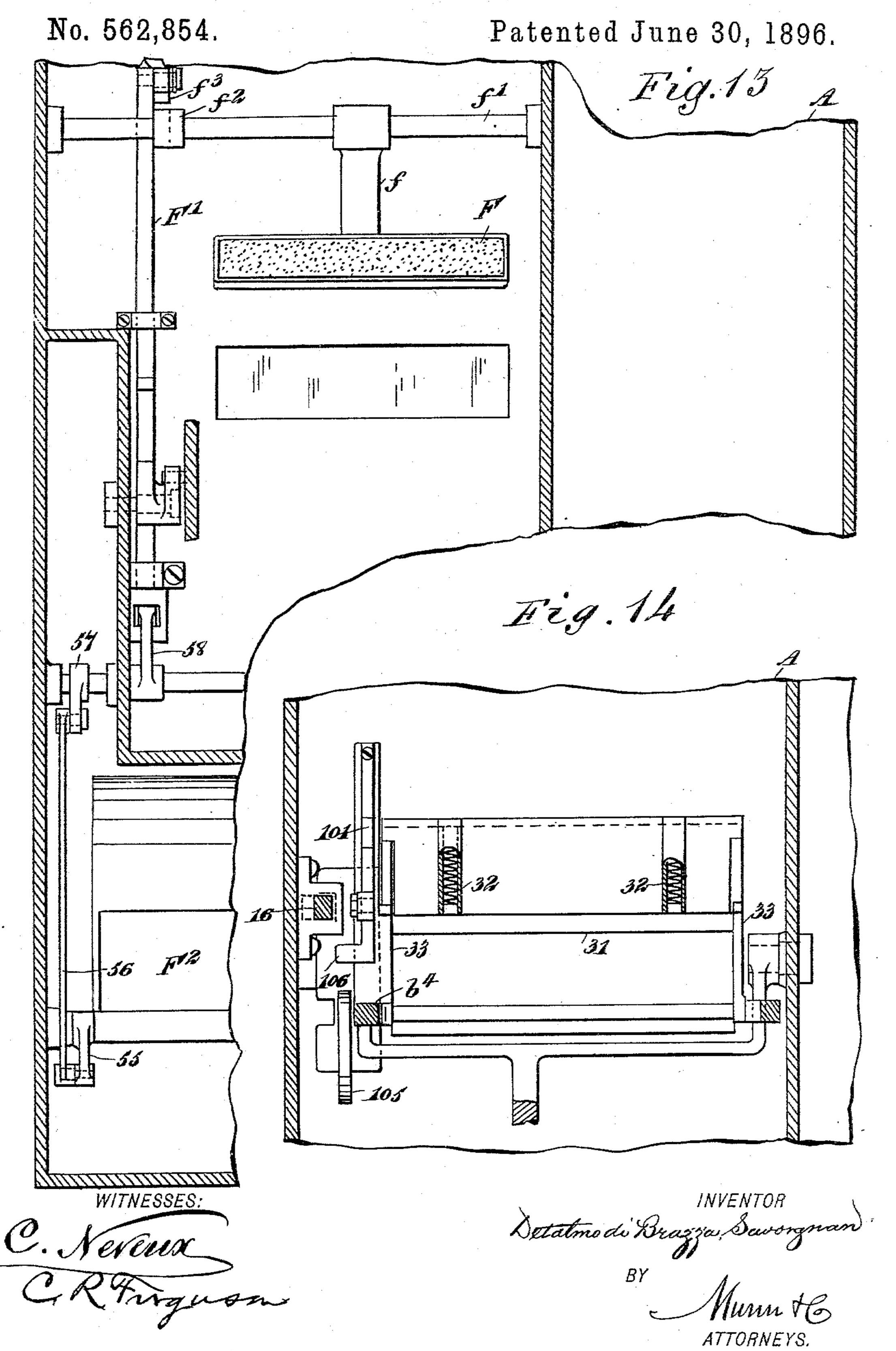
Munn Ho

ATTORNEYS.









United States Patent Office.

DETALMO DI BRAZZA SAVORGNAN, OF ROME, ITALY, ASSIGNOR TO CORA ANN SLOCOMB DI BRAZZA SAVORGNAN, OF MORUZZO, ITALY, AND NEW YORK, N. Y.

COIN-FREED LETTER POSTING OR STAMPING MACHINE.

SPECIFICATION forming part of Letters Patent No. 562,854, dated June 30, 1896.

Application filed September 20, 1895. Serial No. 563,147. (No model.)

To all whom it may concern:

Be it known that I, Detalmo di Brazza Savorgnan, of Rome, Italy, have invented a new and Improved Coin-Freed Letter Posting or Stamping Machine, of which the following is a full place and exact description.

is a full, clear, and exact description. This invention relates to letter boxes or receptacles designed to be placed in any desired locality for depositing letters to be mailed, and 10 it comprises mechanism for progressively numbering the envelops as they are deposited and after the proper coin or coins shall have been deposited to prepay the postal fee. In this machine or depository I have embodied 15 means for indicating on the envelop the place and date of deposit, the numeral or numerals which serve in lieu of the ordinary printed and attached stamp, and also means to designate on the envelop the amount of postage depos-20 ited therefor, whether domestic or foreign. It further embodies means for making a permanent record of the number on the last letter deposited prior to the removal of the letters by an authorized agent of the government, and 25 also means for making a permanent record of the whole amount of coin removed from the machine by an authorized agent. It further embodies means whereby a letter may be placed in the machine and operated upon after 30 a coin shall have been placed in the proper chute, and whereby the said letter may be returned to a position to be removed by the depositor should he be aware that a greater amount of postage is required, thereby ena-35 bling him to again deposit the letter with a sufficient amount of coin to wholly prepay the

I will describe the machine embodying my invention, and then point out the novel fea-

40 tures in the appended claims.

postage.

Reference is to be had to the accompanying drawings, forming a part of this specification, in which similar characters of reference indicate corresponding parts in all the views.

Figure 1 is a front elevation of a letter-box embodying my invention. Fig. 2 is a side elevation thereof. Fig. 3 is a vertical section on the line 3 3 of Fig. 7. Fig. 4 is a vertical section on the line 4 4 of Fig. 7. Fig. 5 is a vertisocal section on the line 5 5 of Fig. 3. Fig. 6 is a

vertical section on the line 6 6 of Fig. 3. Fig. 7 is a sectional plan view on the line 77 of Fig. 6. Fig. 8 is a plan view of certain number-printing devices employed. Fig. 9 is a partial elevation and partial section of a certain num- 55 ber-printing device employed, showing the same in one position. Fig. 10 is a similar view of parts of the same device, showing the same in another position. Fig. 10^a is a partly sectional side view of operating dogs or arms for 60 said parts. Fig. 11 is a vertical section on the line 1111 of Fig. 7. Fig. 12 is a vertical section on the line 12 12 of Fig. 7. Fig. 13 is a partial section and partial elevation on the line 1313 of Fig. 11, and Fig. 14 is a partial plan and par- 65 tial section on the line 14 14 of Fig. 3.

Referring to the drawings, A designates a box adapted to be secured to any desired fixture, and comprising, essentially, the compartments A', A², A³, and A⁴. The com- 70 partment A³ is designed to receive a letter which the depositor desires returned to him to be again inserted in the machine with an amount of money sufficient to wholly prepay the postage, and access may be gained to this 75 compartment A^3 through an opening a in the front of the box normally closed by a door a'. The compartments A' A² A⁴ are designed to receive the working parts of the device, and they are isolated from the compartment A³ 80 by suitable partitions, so that a person cannot manipulate certain parts through the said compartment A³.

Between the inner short partition portion a^2 of the compartment A^2 and the partition 85 a^3 of the compartment A' a chute a^4 is formed, through which letters may be directed to the compartment A³ when it is desired to remove them, or to the compartment A^4 where they are finally deposited. As a means for direct- 90 ing a letter into either one of these compartments I employ a deflector-plate 1, movable across the chute a^4 . It is shown as pivoted on the rod 2, and its lower end is curved transversely, as shown, to engage with a re- 95 tarding device here shown as a plug 3, arranged in a fixed socket 4, and impelled outward or against the deflector-plate by means of a spring 5. This retarding device is intended to prevent the deflector-plate from 100 being accidentally moved, but the said deflector may be easily moved when desired by a person reaching his hand into the compartment A³ and grasping a finger-piece 6 on the 5 lower portion of the deflector-plate. By this construction it will be seen that when the deflector is in the position shown in full lines in Fig. 11 a deposited letter will be directed into the compartment A^4 ; but when said de-10 flector is in the position indicated by dotted lines in said Fig. 11 the deposited letter will be directed to the compartment A^3 .

The upper part of the box A is provided with an opening 7, normally closed by a door 15 S, and over this door a hood 9 is placed to prevent the entrance of rain or snow, but the said hood is open at its front, so that a letter may be passed therein into the opening 7. The door 8 has lugs 10 extended into the 20 box A, and pivotally connected with studs 11, extended from the inner portion of the box, and from one or both of the lugs 10 a spring 12 extends to a fixed portion within the box. This spring is designed to return and hold 25 the door 8 in its normally-closed position.

Within the box A, and providing communication from the opening 7 to the chute a^4 , is a fixed receiver B. This receiver B has an opening b in one side through which an ink-30 ing-pad and impression-platen are to be extended, as will be hereinafter described, and it has at its opposite side an opening b'through which certain printing-characters may extend, for printing on the envelop de-

35 posited.

The upper end of the receiver B is normally closed by a plate B', transversely curved and carried on the arms b^2 of the three-armed levers B². The levers B² com-40 prise the arms b^2 , the arms b^3 , extended in the opposite direction to the arms b^2 , and downwardly-extended arms b^4 . The arms b^3 are attached by screws or otherwise to, or they may be made integral with, levers b^5 , 45 one of which has a trunnion-bearing b^6 in the casing A, and the other of which has a shaft 13. The said shaft is extended outward through the box A, and is provided at its outer end with a lever 14. The levers b⁵ are 50 connected together by a transverse bar b^7 , and one of these levers b^5 (here shown as the one extended from the trunnion b^6) is projected outward beyond the bar b^7 and is provided with a slot-opening b^8 , in which the 55 pivot 15 of a vertically-reciprocating bar 16 is engaged, the said bar 16 being movable through guides 17, attached to the inner side of the wall of the box.

The plate B' is provided with an opening 60 19, adapted to register with the upper end of the receiver B, and with the opening 7 in the top of the box A, to allow a letter to be passed therethrough. Pivoted to the arm b^2 of the lever B² is a dog comprising fingers 20, 21, 65 and 22, and also attached to the arm b^2 is a spring-plate 23, having at its free end notches 24 25, adapted to receive the finger 22 of the

dog. The partition between the notches 24 25 is curved transversely, as shown in Fig. 3. so that the finger 22 of the dog may be readily to passed from one to the other of the said notches, to allow the lever to be moved in a desired direction.

26 is a curved rack affixed to a suitable. support in the box A, and adapted to be en- 5 gaged by each of the fingers 20 21 of the dog. This mechanism just described is designed to prevent a return movement of the lever B' before it shall have been rocked to its extreme position in either direction. It will be seen that the finger 21 of the dog engages with the rack 26, and that the finger 22 engages in the notch 24 of the spring 23. When in this position, the lever B² may be rocked by manipulating the hand-lever 14 to carry the 35 plate B'across the top of the receiver B. The spring 23 will yield sufficiently to allow the finger 21 to ride over the teeth of the rack 26. In moving upward, the end of the finger 21 being rearward of the pivotal point of the dog, it is obvious that the lever cannot be returned until it shall have completed its upward movement, where a trip or lug 27 on the upper end of the rack-bar 26 will engage a finger 28, extended between the fingers 20 21 15 of the dog, and then the continued movement of the lever with said finger 28 against the lug 27 will rotate the dog so that the finger 20 will engage with the rack, at the same time shifting the finger 22 into the notch 25 of the 100 spring 23. When in this position, the lever may be returned to its normal position to close the opening at the upper end of the receiver B, and after it shall have reached nearly to the end of its normal movement a 105 trip or lug 30 will shift the dog again to the position shown in full lines in Fig. 3.

To prevent a letter from passing through the lower end of the receiver B and into the chute a^4 , while the plate B' is moving from 110 its open to its closing position, I employ a plate 31, movable in suitable guideways across the top of the chute a^4 . The plate 31 is impelled to its closing position by means of a spring 32, arranged in suitable housings, as 115 shown in Figs. 3 and 14, and it may be moved into a position for opening the chute a^4 by means of fingers 33, carried by the portions b^4 of the three-armed lever B^2 engaging with said plate 31 or projections thereon.

C is an inking-pad mounted on the end of a curved arm C', extended from a transverse bar C², having pivotal bearings on studs 35. extended from fixed portions of the box Λ . This inking-pad is designed to be moved into 125 the receiver B, for the purpose of applying ink to the printing-characters, and this inward movement of the pad is made automatic by a mechanism to be hereinafter described. and it is drawn outward to its normal posi- 130 tion by means of a spring 36 engaging at one end with the arm C', and at the other end with the wall of the box A.

C³ is an impression-platen designed to be

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moved into the receiver B, for the purpose of forcing an envelop closely against the printing-characters. This printing-platen C³ is pivotally connected to an arm 37, extended 5 from a shaft 38, mounted in the ends of curved arms 39 40, having pivotal connection with the box. In order that the platen may yield and move with its front face in a substantially vertical position when it engages with an en-10 velop within the receiver B, a spring 41 is provided, the free end of which engages with the rear side of the platen C3, and the other end of which is attached to the arm 37. A spring 42 serves to return the platen and the 15 arms to their outward normal position.

As a means for moving the inking-pad C to its inking position against the printingcharacters the vertically-reciprocating rod 16 is provided at its lower end with a yield-20 ing finger 43, adapted to engage during its downward movement with a finger 44, extended rearward from a journal-bearing 45 of the bar C². This lever 44 is curved downward at its end, so that when the bar 16 moves down-25 wardly the yielding portion 43 will engage with the side of the finger 44, tilting the same to move the inking-pad against the printingcharacters. Upon a return movement of the bar 16, the portion 43 by striking against the 30 curved part of the finger 44 will be moved to the position indicated by dotted lines in Fig. 12, and of course during this movement the inking-pad is returning to its normal position under the influence of the spring 36. During 35 the upward movement of the bar 16 motion is imparted therefrom to move the impressionplaten C³ against an envelop in the receiver This motion is imparted from the bar 16 by means of a lug 46, extended from said bar 40 and adapted to engage the under side of a finger 47, extended rearward from the arm 40. This finger 47 is adapted to yield relatively to the arm 40 as the bar 16 is moved downward, thus allowing the lug 46 to engage with 45 the finger 47 and rock the finger 47 without imparting motion to the impression-platen. On the upward movement, however, of said bar 16, the lug 46 will engage with the under side of the finger 47, and carry the same up-50 ward to rock the arms 39 and 40, thus moving the impression-platen into its impressing position.

The printing mechanism employed in this device is similar to the printing mechanism 55 shown and described in my application for · Letters Patent of the United States, filed August 2, 1895, Serial No. 557, 984, and therefore needs no extended description here or details in the drawings showing the construc-60 tion, as reference may be had to said application. Referring to the several printing mechanisms generally, however, DD' indicate disks having characters on the peripheries indicating the months of the year and the days 65 of the month. These disks are not automatic in their action, but are designed to be set at the proper time by a collector of the mails.

As a means for setting the same I employ a worm-wheel d on a hollow shaft of the disk D', which is engaged by a worm d' on a shaft 70 d^3 , extended outward and having a fingerpiece at its outer end which may be manipulated by an attendant reaching through an opening in the box normally closed by a cover d^4 , and the disk D may be set by means of a 75 worm d^5 on a shaft d^6 , having a suitable finger-piece like the shaft heretofore described, the said worm d^5 engaging with a wormwheel d^7 , secured to the shaft of the disk D, which extends through the hollow shaft of the 80 disk D', the said hollow shaft having a bearing in a suitable boxing mounted on a bracket extending from the receiver B or from any other fixed portion of the device.

E designates a series of printing-disks ar- 85 ranged to print numbers consecutively. E' is a series of numbering-disks substantially like the first-named series, and E² is still another series of numbering-disks. These several sets or series of numbering-disks each consist of 90 peripherally-numbered wheels, one of which is termed the "units-wheel," another the "tens-wheel," another the "hundreds," and so on to higher denominations if desired, and their manner of coacting one with the other is 95 immaterial in this application, because I do not wish to be confined to any particular mechanism therefor, and further, the mechanism that may be employed is shown and described

a permanent record of the amount of money deposited in a day or in a certain length of time. The series E is designed to represent the amount of coin deposited for foreign post- 105 age, and the series E' is designed to print the amount of money deposited in payment of local postage. The series E² is designed to print the number of letters as deposited in consecutive order.

in my application before referred to. The 100

numbering devices E E' are designed to print

F is a inking-pad for applying ink to the printing devices E E'. This inking-pad is mounted on an arm f, extended from a rockshaft f', and from this rock-shaft f' a finger or $\log f^2$ extends outward and is adapted to 115 be engaged by a yielding finger f^3 , carried by an arm f^4 , extended inward from the upper end of a bar F', movable vertically in guideways affixed to the inner wall of the box A. The under side of the finger f^2 is beveled 120 from its connection with the rock-shaft upward to its end, and it is obvious that when the bar F' moves downward the yielding finger f^3 thereon will engage with the upper side of the finger f^2 , and the continued downward 125 movement of the bar F' will cause the shaft f'to rock and force the inking-pad F against the printing devices. Upon the return-movement, however, of said rod or bar F', the yielding finger f^3 will be deflected by the fin- 130 ger f^2 , so that the said finger f^3 may pass to its upper position, and the printing-pad F may return to its normal position by gravity.

F² is a strip of paper or similar material

adapted to receive impressions from the numbering devices EE. This paper extends from a feed-roller 48, journaled in a swinging frame 49, and thence over a platen 50 on the upper 5 end of said frame, and thence to a take-up roller 51, journaled in said frame 49. The frame 49 is moved upward to bring the paper strip on the platen 50 into engagement with the printing-characters by means of a lug 51°, extended inward from the bar or rod F', and IOI adapted to engage at one end with a fulcrumed lever 52, the other end of which has a slotted connection with said frame 49. When the bar or rod F' is moved downward, the lug 51° 15 will engagage with the end of the lever 52 and rock the frame upward, and when the bar or rod F returns to its upward position the frame will fall by gravity to its downward position. A step-by-step motion is imparted 20 to the paper to carry it from the roller 48 to the roller 51 by means of a toothed wheel 53 on the shaft of the roller 51, engaging during the upward movement of the frame 49 with a fixed pin or projection 54.

25 The upward and downward movement of the bar or rod F' is imparted during the movements of a hinged door F¹² for the compartment A4, through the medium of levers 55, 56, 57, and 58, which have a loose connection 30 with the rod. It will be seen that when the door is swung open the lever 55 will force the levers 56 57 upward and rock the lever 58 downward, thus drawing the rod F down, and when the door closes an opposite movement

35 of the parts takes place.

numbering-wheels comprising the sets E and E', respectively, by means of fingers 5960, the said finger 60 being extended from the rock-40 shaft 61, and the finger 59 is extended from a sleeve 61°, turning on the said rock-shaft 61. Each finger comprises two sections connected together by a yielding spring-joint. The finger 59 is adapted to engage with its free end 45 against a tooth of a ratchet-wheel 62, attached to the units-wheel of the series E, and the free end of the finger 60 is adapted to engage with the tooth of a ratchet-wheel 63, attached to the units-wheel of the series E'. Obviously, as 50 the shaft 61 is rocked to move the free end of the finger 60 downward, the said free end will engage with the ratchet-wheel 63 and move the units-wheel one step, and obviously, the rocking of the sleeve 61° will impart the same 55 motion to the ratchet-wheel 62 on the unitswheel of the series E, and when the fingers return to their normal positions the spring connection between the sections of the fingers will allow the end of the free sections to move 60 over the ratchet-wheels without imparting motion thereto.

Motion is imparted to the rock-shaft 61 by means of a curved rack 61b, engaging with a gear 61°, mounted on said shaft 61. The said 65 rack 61b extends from the dog 64, mounted on a rock-shaft 65, and motion is imparted to the finger 59 by means of a curved rack 65a, ex-

tended from a dog 67, mounted on the shait 65, and engaging with a gear 68, attached to the sleeve 61^a.

It will be seen that the dogs 64 and 67 have a slight rotary motion in relation to the shart upon which they are mounted, and for this purpose the said dogs are loosely mounted on the shaft, and a pin 69 extends outward from 75 the shaft through a slot-opening 70, formed through the top wall of the dog. The purpose of this construction will be hereinafter. more fully explained.

71 is a type-carrier having on its front face. So which is adapted to extend through the opening b' upon the side of the receiver B, printing-characters 72, indicating a payment of local postage, and also printing-characters 73. indicating payment of foreign postage. This \$5 carrier 71 is mounted on an arm 74, extended from the rock-shaft 65, adjacent to the series of wheels E².

75 76 are vertically-reciprocating operating-rods for the printing devices. Each 90 rod is provided with a rearward projection. the projection of the rod 76 being larger than that of the rod 75. These projections are adapted, respectively, to engage with the dogs 64 67. The rods are independent one of the 95 other, and are designed to be moved downward by mechanism released by the coin deposited in the device in payment of postage. as will hereinafter appear. When the rod 75 is forced downward, its rearward projectico tion engaging the dog 64 will rock the same. thus rocking the shaft 65 to bring the print-A step-by-step motion is imparted to the ling devices 72 on the carrier 71 in proper position for printing on an envelop the amount deposited in payment of local postage.

> Owing to the slot-opening 70 in the dog 57. the shaft 65 may rotate without imparting motion to the dog 67 and consequently the parts connected therewith. When the rod 76 is forced downward, its projection engaging 110 the dog 67 will rock said dog and consequently the shaft 65, without imparting motion to the dog 64, and turning the carrier 71 through a greater arc of a circle than was done by the operation of the dog 64 bringing 115 the printing-characters 73, indicating the amount of money deposited for foreign postage, in position within the letter-receiver.

> Obviously when the dog 64 is rocked downward, motion will be imparted to the shart 120 61 and finger 60, to set the numbering-wheels in the series E', and when the dog 67 is rocked by its bar 76 the sleeve 61° will be rotated. and the finger 59 will operate to set the number-wheels in the series E. It will be under- 125 stood that none of these motions can take place until after the coin shall have been inserted by a party depositing a letter, and I will now describe the mechanism whereby the parts are operated upon the insertion of a coin. 130

G indicates a chute opening outward at its upper end through the casing A, and adapted for the reception of a coin such as a penny or pennies for the payment of local postage,

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and G' is a chute having its upper end opening outward through the said casing A, and designed for the insertion of a coin for the payment of foreign postage, such, for instance, 5 as a five-cent nickel. Both chutes are extended downward and rearward, and then forward and downward, as indicated in Fig. 4, and the inner open end of the chute G is designed to be engaged by a coin-pan g, mount-10 ed on a pivoted arm G^2 , and a coin-pan g' is adapted to engage with the open inner end of the chute G'. The coin-pan g' is mounted on a pivoted arm G³. These arms G² G³ are pivoted on a shaft g^2 , and each has a portion 15 extended rearward of the shaft g^2 and provided with a counterbalanced weight g^3 . The coin-pans g g' when rocked downward are adapted, respectively, to communicate with the open upper end of coin-receivers g^4g^5 , into 20 which the money received for postage is deposited.

On the shaft 13 an arm 77 extends rearward and is adapted to be engaged at its end by a pivoted latch 78, (see Fig. 6,) having its piv-25 otal bearings in lugs extended from the partition 79 within the box A, and a lug 80 also extends from this partition 79 and against which the upper side of the arm 77 will engage when the said arm is in its upward or rear position, 30 thus preventing the back rotation of the shaft 13. From the arm G² a cord 81 extends to a connection with an arm 82, extended at right angles from the arm upon which the arm 78. is mounted, and a cord 83 extends from the 35 arm G³ to a connection with said arm S2 of the

latching device.

An angle-lever 84 is pivoted to and adapted to swing transversely of the operating-rod 75. One arm 85 of this lever 84 is connected by a 40 cord 86 with the arm G², and the other arm of this angle-lever 84 is provided with a hook 87, adapted to be engaged by the under side of a block 88, extended laterally from the end of an arm 89, extending from the shaft 13.

Pivoted to and adapted to swing transversely of the operating-rod 76 is an anglelever 89a, having one arm 90 connected by a cord 91 with the arm G³, and the other arm of this lever 89^a is provided with a hook end 92, 50 adapted to engage with a lateral projection 93 on the arm 89. Retracting-springs 94 may be provided for the angle-levers 84 and 89a, and a retractile spring may also be provided for the latching device 78. By this construction 55 it will be seen that when the arm G² is rocked downward by the weight of a coin the cord 81 will rock the latching-lever to disengage the latch 78 from underneath the arm 77, and the cord 86 will rock the angle-lever 84, to bring 60 its hooked end underneath the lateral projection on the arm 89. When the parts are in this position, and upon rocking the shaft 13 by means of the crank 14, the operating-rod 75 will be moved downward, thus imparting 65 motion to the part 71 and also to the mechanism for operating the numbering-disks in the series E', and of course at this time the oper-

ating-bar 76 will remain stationary. However, if a coin in payment of foreign postage is inserted in the pan carried by the arm G³, 70 as said arm moves downward, the latch 78 will be released from the arm 77 through the medium of the cord 83, and the hook end of the angle-lever 89° will be thrown into engagement with a lateral projection 93 of the arm 75 89, so that when the shaft 13 is rocked the operating-rod 76 will be forced downward to rotate the part 71 of the numbering devices.

I provide means for discharging coin from the coin-pans gg'. This means as here shown 85 consists of pivoted fingers 95 96, the ends of which are adapted to pass through the slotopenings in the respective coin-pans g g'. This movement takes place on the upward movement of the operating-bar 75 or 76, that 85 is, on the upward movement of the bar 75 the end of a rod 97, extended from said rod 75, will engage with an angle portion 98 on the finger 95, so as to rock the end of said finger through the slot-opening in the coin-pan g, and the 90 operating-rod 76 is provided with a similar rod 97 to engage with a projection on the finger 96, to rock said finger through the slot-opening in the pan g'. To allow the rod 97 to pass below the plane of the projection 98, the end 95 of said rod 97 has a spring yielding pivotal connection with the main body of the rod, so that said end will tilt upward as the rod is moved downward. Of course, after the end shall have passed over the end of the pro- 100 jection 98, the spring-pressed end of the rod will resume its position parallel with the body of the rod, so that upon an upward movement of the operating-bar 75 the top of the yielding end of the rod will engage the lower side of the 105 projection 98 and rock the finger 95.

I will now describe the means for operating the numbering-wheels comprised in the series E². To the units-wheel of said series is attached a ratchet-wheel 100, adapted to be 110 engaged by the hook end of a yielding finger 101 attached to a lever 102, pivotally connected at its central portion to a lug or lugs extending from an arm 103, projecting rearward from the lower end of the portion b^4 of 115 the lever B². A spring 104, secured at one end to the arm 103, bears with its free end against the under side of the rock-lever 102, at its end opposite that to which the yielding finger 101 is attached. Obviously when the 120 shaft 13 is rotated to carry the portion b^4 of the lever B² forward, or to the position indicated in dotted lines in Fig. 3, the yielding finger 101 will rotate the ratchet-wheel 100 through the space of one step, and of course, upon 125 the return of the portion b^4 , the finger 101 will yield against a tooth on the wheel 100 and pass beyond the same to be ready for the further rotation of said wheel when necessary.

Should it be necessary to deposit a letter more than once to fully prepay its postage, the numbering devices in the series E² should only be set to print but one number on the

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letter; that is, upon a second deposit of the letter with a second coin motion should not be imparted to the ratchet-wheel 100. I therefore provide means to throw the hook 5 end of the yielding finger 101 out of its line of engagement with the wheel 100. This means consists of a cam-block 105 on the upper end of the deflector-plate 1. When the deflector-plate 1 is thrown over to the proper 10 position for directing a letter into the compartment A³, the cam-block 105 will be moved into a position to be engaged by a lug 106, projected laterally from the portion of the rocking lever 102 to which the yielding finger 15 101 is attached, so that when the lever B² is rocked the said lug 106 will engage upon and ride over the cam-block 105, thus tilting the rock-lever 102 against the resistance of the spring 104 to a position out of line with a 20 tooth of the wheel 100, as indicated by dotted lines in Fig. 12. Obviously when the deflector 1 is in a position to direct a letter to the compartment A³, the lever B² may be oscillated as often as required without imparting motion 25 to the numbering devices in the series E^2 .

I have described the operation of the several parts in detail; but to present the operation more clearly, I will describe the same as a whole. Assuming that it is desired to mail 30 a letter requiring a single postage, for instance, a domestic postage, the party mailing the same will first deposit two pennies in the coin-chute G. When the pennies reach the pan g, the arm G^2 will be rocked, as hereto-35 fore described, releasing the latch 78 from the arm 77, and throwing the hook end 87 of the angle-lever 84 into engagement with the lateral projection 88 of the arm 89: Now the party mailing the letter will grasp the lever 40 14, and turn the same to a substantially vertical position. This of course will rock the lever B², allowing the plate 31 to slide underneath the receiver B, and the curved plate B' by engaging lateral projections thereon, ad-45 jacent to the opening 19, (shown in Fig. 5,) with the lugs 10 will swing the door 8 open, and when the opening 19 in the plate B' is in line with the opening at the top of the receiver B, and of course in line with the opening having 50 the door 8, a letter may be inserted. During this upward movement of the crank 14, and the consequent rocking of the shaft 13, the arm 89, engaging with the hook end of the angle-lever 84, will force the operating-rod 75 55 downward, thus operating the numbering devices in the series E', and also moving the carrier 71 into proper position. Upon the return movement of the lever 14, the impression-platen C³ will be operated, as heretofore 6c described, for pressing the envelop against the type-surfaces within the receiver B, and when the lever B² shall have reached its ex-

treme or normal position the plate 31 will be forced back by it, so that the letter will drop into the compartment A⁴.

Should a domestic letter require more than two cents postage, the sender will open the

door a' and deflect the plate 1, so that the letter when first posted and stamped, as heretofore described, will fall into the compartment A³, from which it may be removed, and additional coin may then be inserted in the proper tube and the parts manipulated as before described; but before turning the plate for the second insertion of the letter the de- 3 flector-plate 1 will be returned to a position for deflecting the letter into the compartment A^4 , and at this time the numbers on the wheels in the series E² will be properly set by the mechanism described to print upon an en- 30 velop, and after the printing the letter will fall into the compartment A^4 . Of course this same operation takes place whether the letter be domestic or foreign.

Having thus described my invention, I 35 claim as new and desire to secure by Letters Patent—

1. A coin-freed letter posting or stamping machine, comprising a casing, a letter-receiver therein, open at its upper end, a rock-lever, a plate on said rock-lever adapted to pass over the open upper end of the receiver and having an opening adapted to communicate with the opening in the upper end of said receiver, and coin-freed locking mechanism of for the said lever, substantially as specified.

2. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letter-receiver therein open at its upper end, the said opening registering with an opening in 100 the casing, a fulcrumed lever, a plate carried by said lever and adapted normally to close the opening in the upper end of the receiver, and also having an opening to register with the opening in the receiver, and a ratchet 105 mechanism carried by said lever, substantially as specified.

3. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letter-receiver therein open at its upper end, the said opening registering with an opening in the casing, a fulcrumed lever, a plate carried by said lever and adapted normally to close the opening in the upper end of the receiver. and also having an opening to register with the opening in the receiver, a ratchet-mechanism device carried by said lever, consisting of a pivoted dog carried by the lever, a notched spring carried by the lever and engaging with one arm of said dog, and a fixed rack over two which another arm of the said lever rides. substantially as specified.

4. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letter-receiver therein having an opening in each 125 of its side walls, printing devices projected through one of said openings, an inking device movable through one of said openings. a printing-platen movable through the said last-named opening, a pivoted lever for operating the printing devices, and a coin-freed locking mechanism for said lever, substantially as specified.

5. A coin-freed letter posting or stamping

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machine, comprising a casing, a fixed letterreceiver therein, independent compartments below said receiver, a chute common to both of the compartments arranged in line with 5 the open end of the receiver, and a deflector for deflecting letters into either one of said compartments, substantially as specified.

6. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letterso receiver therein, printing devices projected in the said receiver, coin-freed mechanism for operating said printing devices, independent compartments below the receiver, a chute common to both of the compartments and 15 registering with the open lower end of the receiver, a deflector in said chute, and a retarding device for the deflector, substantially as

specified.

7. A coin-freed letter posting or stamping 20 machine, comprising a casing, a fixed letterreceiver therein open at its upper and lower ends, a series of printing-disks having a portion projected into said receiver, compartments below the receiver, a deflector for di-25 recting letters from the receiver into either one of the said compartments, a coin-freed lever for operating the printing-disks, and means carried by said lever adapted to engage with a stationary part for rendering said 30 lever operative with relation to the printing-

disks, substantially as specified.

8. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letterreceiver, compartments in said casing below 35 the receiver, a deflector for directing letters from the receiver to either one of said com-· partments, a cam on said deflector, a series of printing-disks, a coin-freed rocking lever, a yielding catch carried by said lever, for en-40 gaging a toothed wheel on the units-disk of the printing device, and turning the same when the lever is rocked, and a part on said yielding device, for engaging with the cam on the deflector for throwing the yielding 45 catch out of operative engagement with the toothed wheel, substantially as specified.

9. A coin-freed letter posting or stamping machine, comprising a casing, a letter-receiver therein, a coin-freed rocking lever hav-50 ing a part for controlling the opening in the open end of said receiver, printing-disks extended into said receiver, means for operating the same, an inking-pad movable against printing-characters within the receiver, a 55 printing-platen movable in said receiver, and a vertically-movable part or rod having operative connection with the rocking lever and adapted on its downward movement to move the inking-pad into operative position, and 60 on its upward movement to move the printing-platen into operative position, substantially as specified.

10. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letter-65 receiver therein, a rocking lever carrying a closure for the open upper end of said receiver, rotary printing-disks projected into

said receiver, means for operating the same upon the movement of the lever, another set of rotary numbering-disks, a coin-actuated 70 lever, a locking device for the rocking lever adapted to be thrown out of engagement with the rocking lever by a downward movement of the coin-actuated lever, a vertically-movable rod actuated by the rocking of the rock- 75 ing lever, and connections between said rod and the last-named numbering-disks, for operating said disks, substantially as specified.

11. In a coin-freed letter posting or stamping machine, a series of numbering-disks, a 80 coin-freed rocking lever, a vertically-movable bar adapted to be moved downward by said rocking lever, a rock-shaft operated by a vertically-movable bar, another rock-shaft having a gear-wheel engaged by a rack carried 85 by the first-named rock-shaft, and a finger comprising yielding sections mounted on the last-named rock-shaft and adapted to engage with a toothed wheel for operating the numbering-disks, substantially as specified.

12. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letterreceiver therein, numbering-disks extended into said receiver, means for operating the same, a carrier movable in said receiver and 95 having printing-characters thereon indicating a plurality of postal rates, and mechanism for moving the said carrier for bringing either one of said printing devices into operative position within the receiver, substan- 100

tially as specified.

13. A coin-freed letter posting or stamping machine, comprising two series of rotary printing-disks, a rock-shaft having a portion to engage with and operate the printing-disks of 105 one series, a sleeve mounted on the rock-shaft and having a portion to engage with and operate the printing-disks of the other series, and means for operating said parts independently one of the other, substantially as speci- 110 fied.

14. A coin-freed letter posting or stamping machine, comprising a rock-shaft, a carrier mounted on said rock-shaft, printing-characters on the front face of said carrier arranged 115 one above the other, a dog mounted on the rock-shaft, a vertically-movable rod for operating said dog to rock the printing-characters to a position to bring the lower set of said printing-characters into operative position, 120 another dog on said rock-shaft, and a vertically-movable rod for operating with said dog to rock the carrier to bring the upper set of said printing-characters into operative position, substantially as specified.

15. A coin-freed letter posting or stamping machine, comprising two series of printingdisks, a rock-shaft, a dog having a lost-motion rotary connection with said rock-shaft, means coacting with said dog for rocking the shaft, 130 a rack carried by said dog, another rock-shaft having a gear engaging with said rack, a finger on said last-named rock-shaft for operating one of the series of numbering-disks, an-

other dog on the first-named rock-shaft and having a lost-motion rotary connection therewith, means coacting with the said dog for rocking the first-named rock-shaft, a rack car-5 ried by the last-named dog, a rotary part having a gear engaging with said rack, and a finger on said rotary part for operating the second series of numbering-disks, substantially as specified.

16. A coin-freed letter posting or stamping machine, comprising a coin-freed rock-shaft, numbering-disks, a vertically-movable rod for operating said disks, a coin-actuated lever, an angle-lever pivoted to the vertically-operatis ingrod, a connection between one arm of said lever and the coin-actuated lever, and an engaging device on the other arm of said anglelever to engage with an arm on the coin-freed rock-shaft, whereby when said rock-shaft is parted to the vertically-operating rod subparted to the vertically-operating rod, substantially as specified.

 $17.4 A coin-freed letter posting or stamping <math>17.4 A coin-freed letter posting or stamping \\ 17.4 A coin-freed letter posting or stamping <math>17.4 A coin-freed letter posting or stamping \\ 17.4 A coin-freed letter posting or stamping \\ 17.4 A coin-freed letter posting or stamping \\ 17.4 A coin-freed letter posting \\ 17.4 A coin-freed lett$ machine, comprising a casing, a fixed letter-

receiver therein, printing devices substan- 25 tially as described, compartments in the lower portion of said casing having a chute communicating with the open lower end of the receiver, a deflector for directing letters from the receiver to either one of said compart- 30 ments, a spring-impelled closure for the lower end of the letter-receiver, and a coin-freed rock-lever having a portion adapted to engage with said closure, to open the same, substantially as specified.

18. A coin-freed letter posting or stamping machine, comprising a casing, a fixed letterreceiver therein, a rock-lever carrying a closure for said receiver, a locking device for said rock-lever, and a plurality of coin-actuated 40 levers, each having independent operative connection with said locking device, substan-

tially as specified.

DETALMO DI BRAZZA SAVORGNAN.

Witnesses:

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