

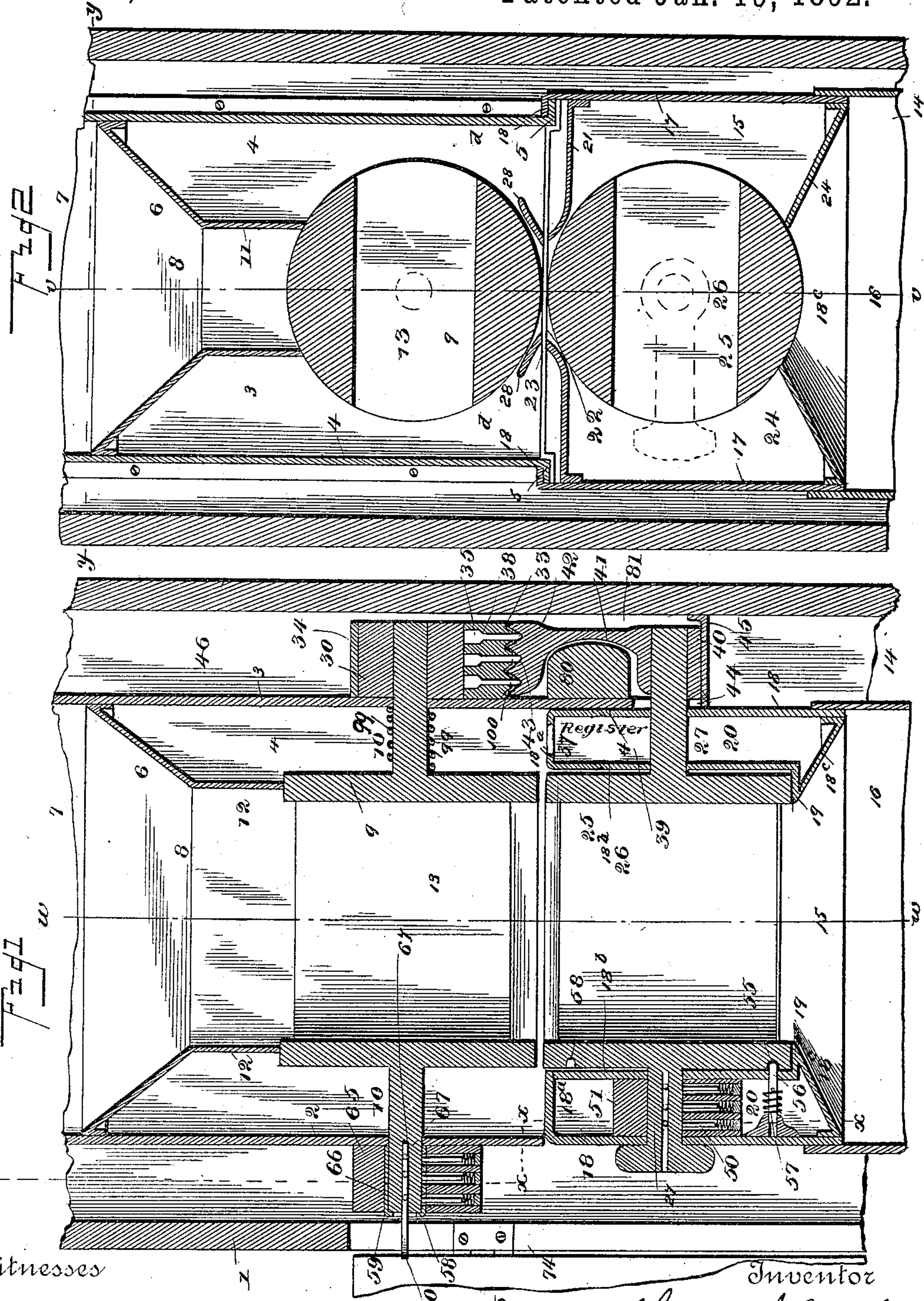
(No Model.)

4 Sheets—Sheet 1.

W. F. BEASLEY.
CASH OR TICKET RECEIVER.

No. 467,146.

Patented Jan. 19, 1892.



Witnesses

John D. Moore
J. W. Nichols

By his

Attorney

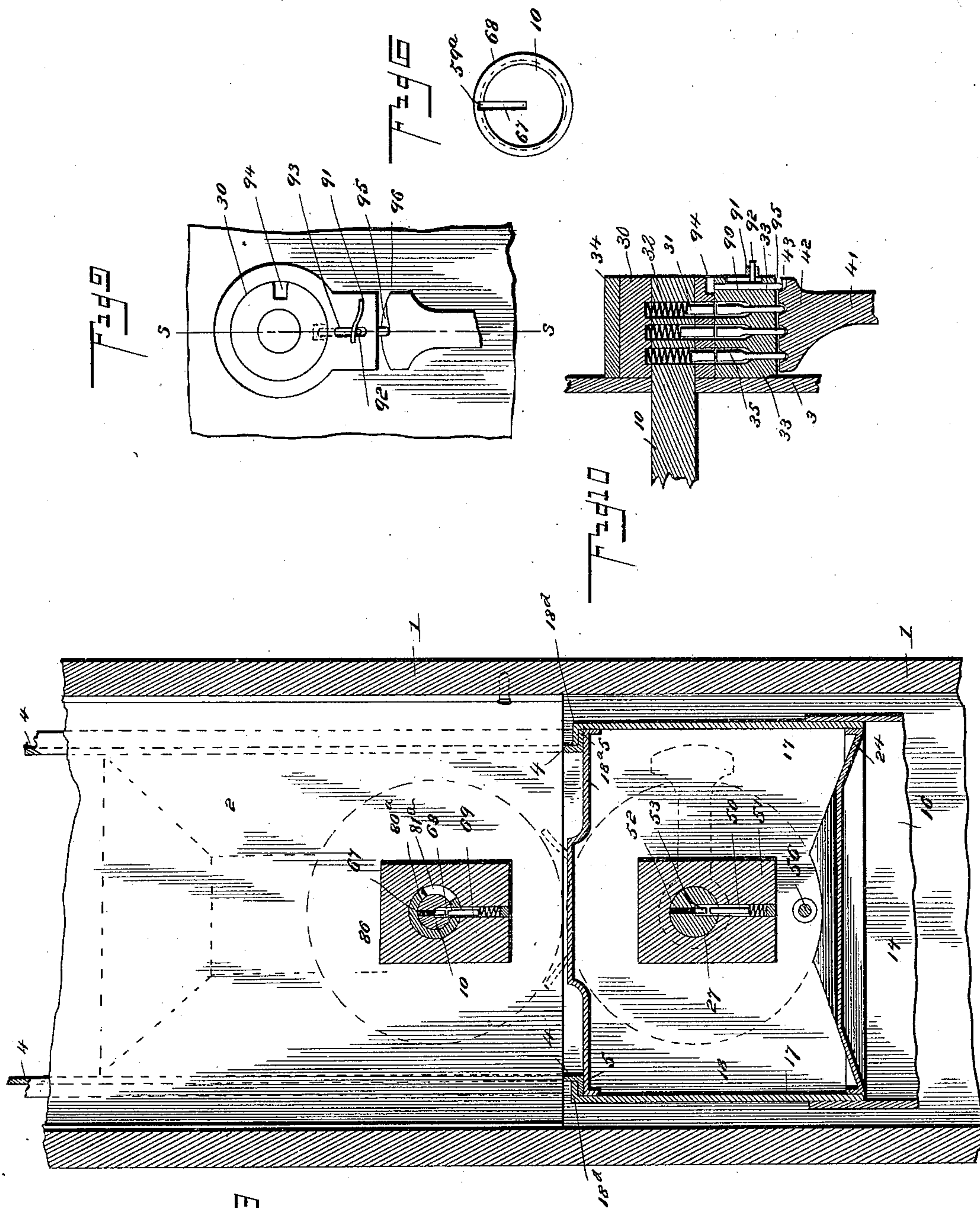
W. F. Beasley
Thomas M. Dorey

Inventor

4 Sheets—Sheet 2.

No. 467,146.

Patented Jan. 19, 1892.



Witnesses

John D. Mirie
J. H. Richard

Inventor

Inventor
William L. Beasley
By his Attorney
Venow M. Dorsey

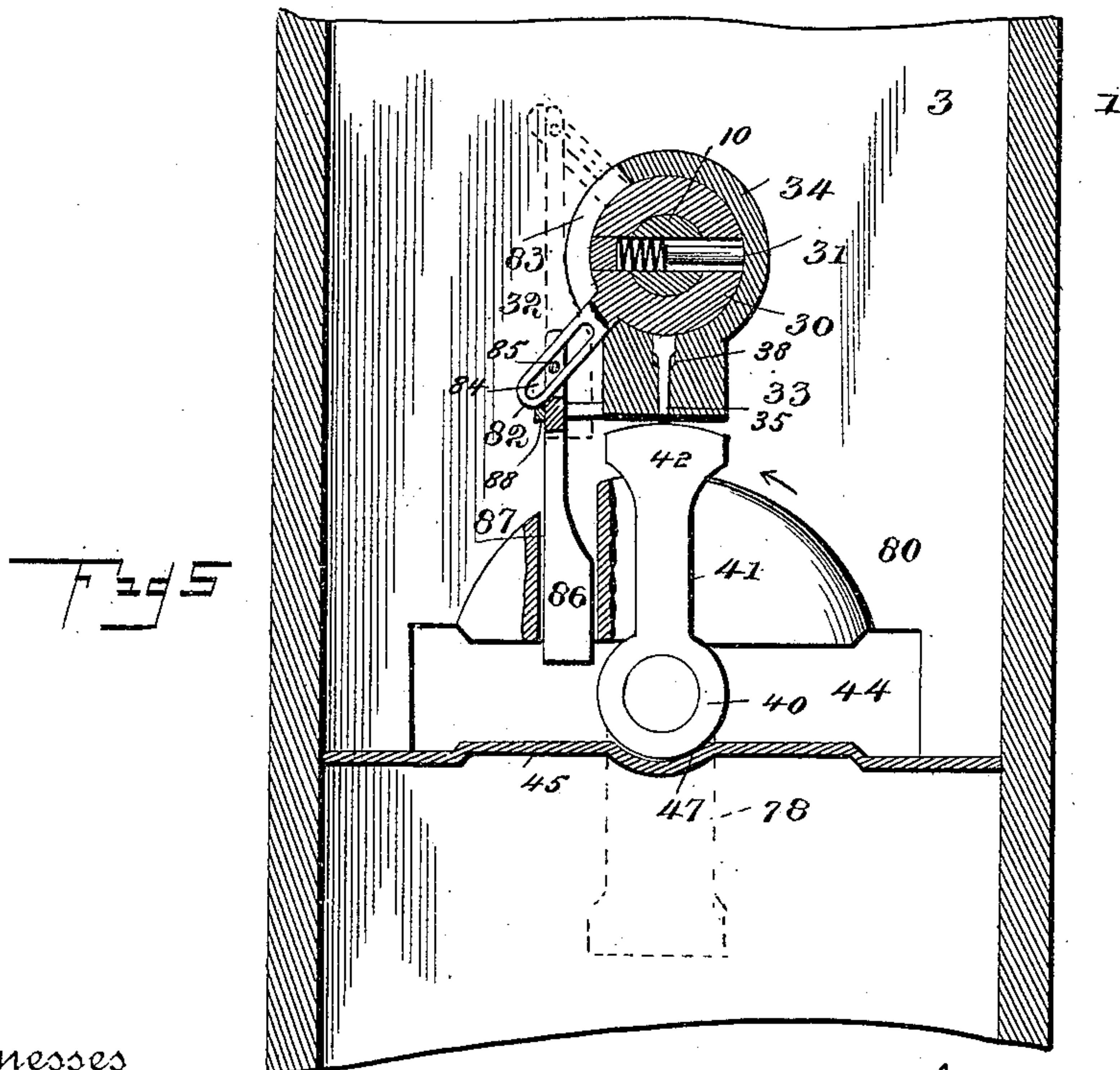
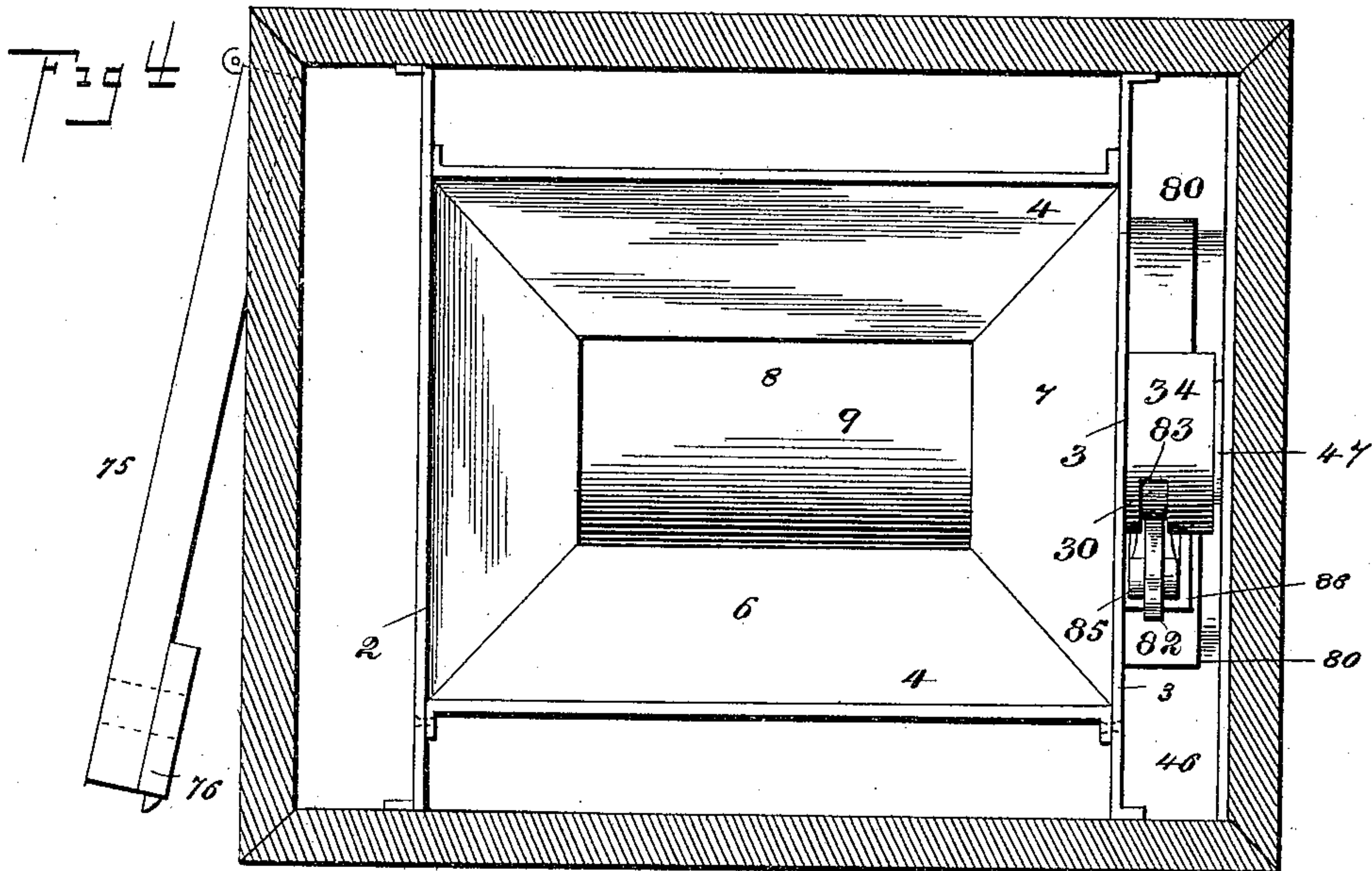
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4 Sheets—Sheet 3.

W. F. BEASLEY.
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Witnesses

John D. Smith
J. W. Nichol

Inventor

William F. Beasley
By his Attorney
Thomas M. Dancy

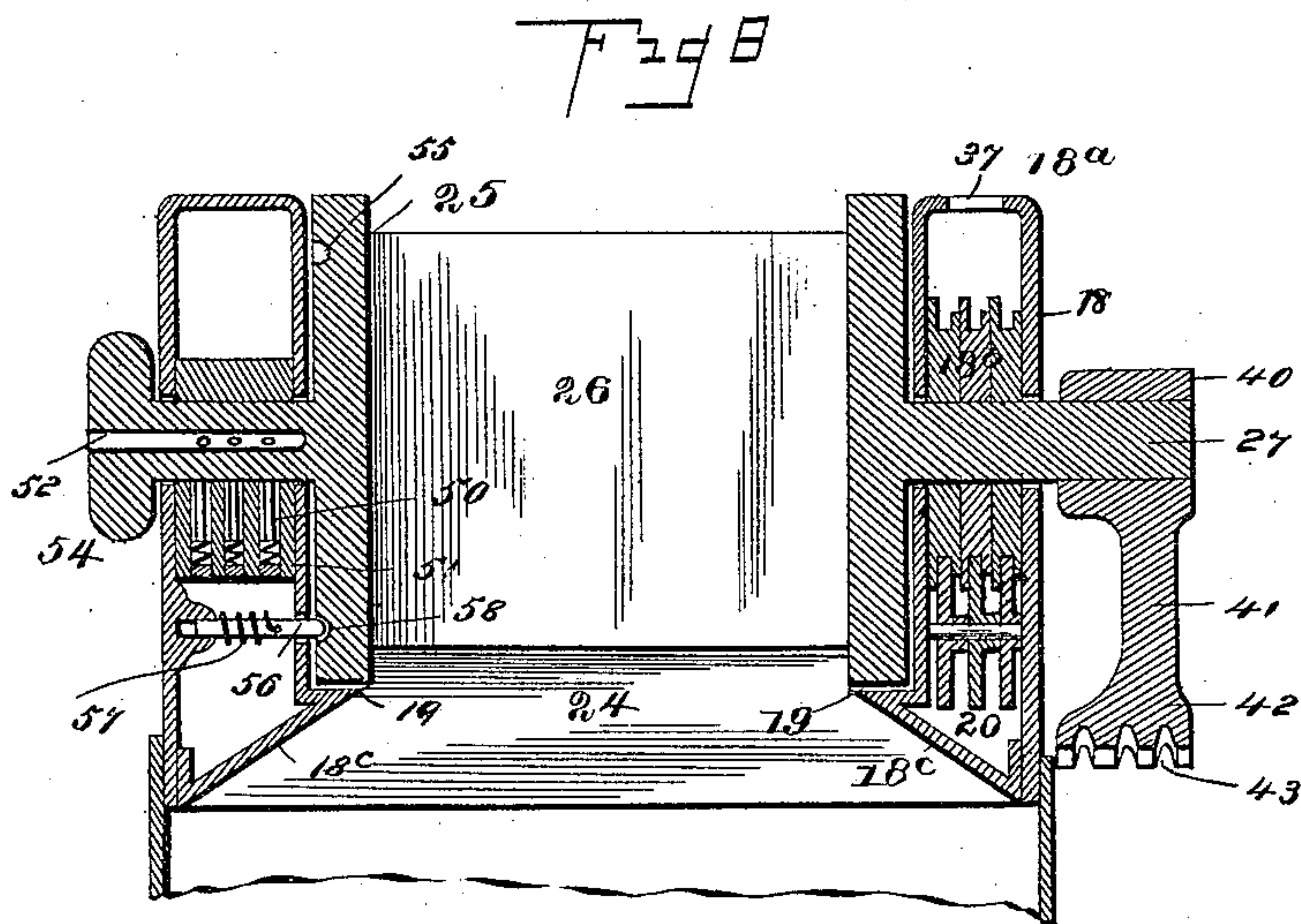
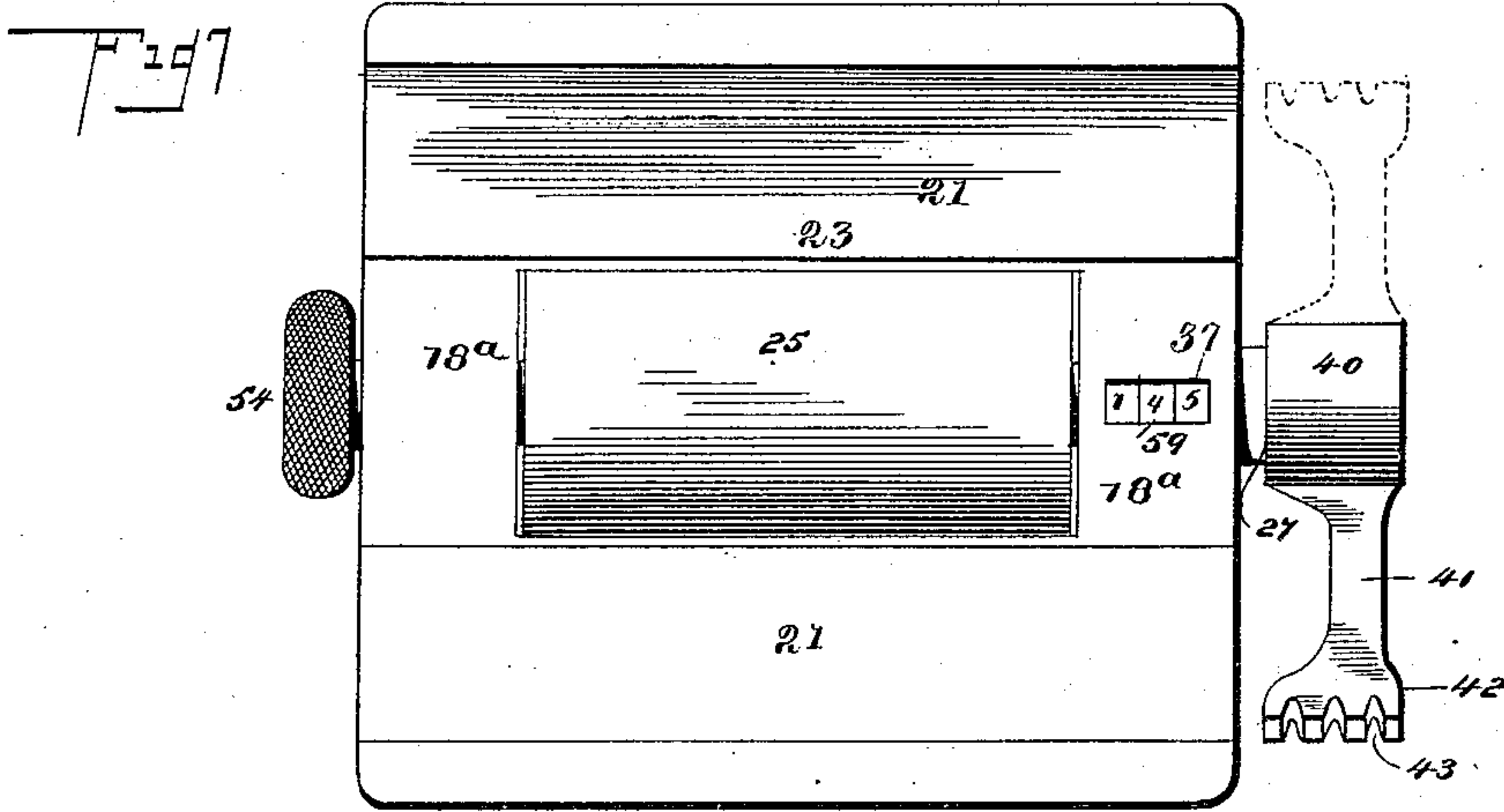
(No Model.)

4 Sheets—Sheet 4.

W. F. BEASLEY.
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Witnesses

John D. Minie
J. W. Richard

Inventor

William F. Beasley
By his Attorney
Timothy M. Dorsey

UNITED STATES PATENT OFFICE.

WILLIAM F. BEASLEY, OF OXFORD, NORTH CAROLINA.

CASH OR TICKET RECEIVER.

SPECIFICATION forming part of Letters Patent No. 467,146, dated January 19, 1892.

Application filed February 11, 1891. Serial No. 381,073. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM F. BEASLEY, a citizen of the United States, residing at Oxford, in the county of Granville and State of North Carolina, have invented certain new and useful Improvements in Cash-Receivers; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

My invention relates to certain new and useful improvements in cash-receivers which are adapted for use in connection with coin-controlled vending-machines, ticket-receivers, fare-boxes, &c.; and it has for its object to provide such a construction that the coin, tickets, &c., may be removed therefrom and placed in a locked carrier, in which carrier they may be carried to and delivered at any desired point without it being at any time during such operation in the power of the collector engaged therein to handle or abstract the coin, ticket, &c.; and for this purpose it consists in the construction, arrangement, and combination of the parts of which it is composed, as will be hereinafter more fully described and claimed.

Referring to the accompanying drawings, in which corresponding parts are designated by similar numbers, Figure 1 is a central longitudinal vertical section on line *vv* of Fig. 2, showing the carrier in position under the receptacle of a vending-machine, ticket-receiver, &c., all the parts being in the position which they occupy when the contents of the latter fall into the former. Fig. 2 is a central transverse section on line *ww* of Fig. 1, the parts being in the position which they occupy immediately upon the backward movement of the carrier. Fig. 3 is a transverse vertical section on line *xx* of Fig. 1, the parts being in the position they occupy immediately upon the forward or outward movement of the carrier. Fig. 4 is a horizontal section on line *yy* of Figs. 1 and 2. Fig. 5 is a rear view, partly in section, of the locking mechanism for the cylinder of the receptacle, the parts being in the same position as in Fig. 1. Fig. 6 is a detail elevation of the key-guard for the auxiliary lock of the cylinder of the receptacle, which is in the position shown in Figs. 2 and

3. Fig. 7 is a plan view of the carrier, it being shown locked, while the position of its lifting-arm while the carrier is being inserted beneath the receptacle is shown in dotted lines. Fig. 8 is a central longitudinal section of the carrier when the cylinder thereof is in the position to permit the removal of its contents. Fig. 9 is a fragmental rear view of a modified form of lock for the cylinder of the receptacle. Fig. 10 is a vertical section in line *ss* of Fig. 9.

The casing 1 of the fare-box, &c., has two parallel transverse vertical plates 2 and 3, secured therein and extending from side to side, the rear one 3 of which plates extends below the forward one, while two parallel longitudinal vertical plates 4 4 are secured between the said transverse plates, one near each side thereof, the lower ends of the said longitudinal plates 4 projecting slightly below the bottom of the forward transverse plate 2 and being bent outwardly, forming flanges 5, which serve as slides for the carrier, as will be hereinafter more fully described.

Within the plates 2, 3, and 4 4 is secured the plate 6, forming the bottom of the chamber 7, inclosed by the said vertical plates, which is used as the receptacle for the coin, tickets, &c., which may be inserted in a slot provided for that purpose, and it will be evident that any desired devices for inspecting the coin, tickets, &c., and for preventing their withdrawal, as well as any desired form of coin-controlled mechanism, may be placed between such slot and the receptacle 7; but as such devices form no part of this invention they need no further illustration here.

The plate 6, forming the bottom of the chamber, has a central elongated longitudinal opening 8 therein, toward which it slopes from all sides, thus causing the bottom of the receptacle 7 to be funnel-shaped, whereby the coin, tickets, &c., dropped thereon will slide down to the central opening 8, below which is a rotary cylinder 9, mounted on trunnions 10 at its front and rear ends, which trunnions pass through the front and rear transverse plates 2 and 3, respectively, which thus form bearings therefor. Curtains 11 have their upper edges secured to the lower surface of the plates 6 at the sides of the opening 8 therein, or are formed integral therewith and

extend downward to near the periphery of the cylinder 9, while curtains 12 are similarly secured to the end edges of the slot 8, connected to the ends of the curtains 11, and have concaved lower ends which embrace the upper surface of the cylinder 9.

The cylinder 9 has a central diametrical slot 13 therein, extending from side to side of the same size as the slot 8 in the plate 6, so that when the cylinder has been placed in the proper position (shown in dotted lines in Fig. 2 and in full lines in Fig. 1) by the rotation thereof, the four walls of such slot will correspond with the curtains 11 and 12, thus permitting the contents of the receptacle 7 to fall down and out through the said slots 8 and 13, the cylinder being at the same time capable of being so rotated as to cause one of the imperforated chords thereof to come below the said slot 8, thus closing the latter, and it is in this position, which is its normal one, that it is shown in Figs. 2 and 3.

The carrier 14 consists of the mouth-frame 15 and the suitable bag or box 16, secured to the lower edge thereof, and I in most cases prefer to use a bag of the construction shown and described in an application for Letters Patent filed in the United States Patent Office by me on the 22d day of September, 1890, and serially numbered 365,803.

The mouth-frame itself consists of the side plates 17, whose upper edges are bent inward, forming tongues or flanges 18^a, adapted to slide on the flanges 5 of the plates 4, secured within the casing 1, thus affording a means for suspending the carrier beneath the cylinder 9 and cash-receptacle 7, while the ends of the mouth-frame 15 are formed by the plates 18, which are bent inward at their top, as at 18^a, downward, as at 18^b, inward, forming shoulder 19, (which have concaved upper surfaces and plain lower ones,) and outward, as at 18^c, to the inner surface of its opposite end, to which its free edge is secured, thus forming two chambers 20 20, one at each end of the mouth-frame. A top plate 21 is secured over the upper portion 18^a of the end plates 18 on each side of the center, leaving a central slot 22, the inner edges of the said plates being bent upward and inward, as at 23, while deflecting plates or wings 24 are secured to the lower edges of the side plates 17 and project inward and upward to near the surface of the cylinder 25, contained below the said slot 22, the distance between the inner edges of the said wings being the same as the width of the slot 23. The cylinder 25 is similar to the cylinder 9 in having a diametrical slot 26 therein (which is by preference equal to the slot 13 in size) and in having trunnions 27, which project through the plates 18 and 18^b at the front and rear of the carrier. It will now be readily understood that if the carrier be slid in place under the cylinder 9 (the top of the plates 21 of the carrier being lower at the sides for the purpose of permitting the engagement

of the flanges 5 and 18^a without loss of space) and the two cylinders 9 and 25 be so turned that their slots 13 and 26 are vertical and register with each other the coin, tickets, &c., contained in the receptacle will fall into the carrier, wings 28 being placed below the cylinder 9 and on each side thereof, having their ends secured to the transverse plates 2 and 3, in order to the more certainly guide the coin, &c., to the slot in the cylinder 25. It will also be seen that in this operation the coin is entirely protected against abstraction while passing to the slot 26, as the space between the two cylinders 9 and 25 is narrow and is rendered difficult of access by the depending plates 3 and 4 and by the close joint formed between the flanges 5 and 18^a and by the contact of the lower edge of the plate 2 and the upper plate 18^a at the front of the mouth-frame of the carrier. It will be further evident that the cylinder 25 may be so turned as to present an imperforated chord at the slot 23 and between the inner edges of the wings 24 and may by suitable mechanism be locked in that position, thus preventing the removal of the contents of the carrier after it has been withdrawn from beneath the receptacle. In order to cause the cylinder 25 to be locked in this position before the carrier is withdrawn from beneath the receptacle and to prevent the cylinder 9 from being so turned as to open the slot 8 in the bottom of the receptacle 7 when the carrier is not in the proper position to receive its contents, I use the following devices: The rear trunnion 10 of the cylinder 9 has upon the rear side of the transverse plate 3 a collar 30, secured thereon, which collar, as well as the trunnion, is apertured to receive pins 31 and springs 32 for actuating the said pins, driving them outward, where they will, when the cylinder 9 is in a position to close the bottom of the receptacle 7, enter the corresponding apertures 38 in the housing 33, secured to the rear face of the plate 3, the said housing being provided with the upper annular extension 34, which encircles the collar 30 and retains the pins 31 within the collar when the cylinder 9 is in any other position than that mentioned. As the pins 31, by entering the holes 38 in the housing 33, lock the cylinder 9 against rotation, pins 35, having enlarged upper ends, are contained with such holes 38, (which are of a corresponding shape to prevent the pins 35 from falling out,) the lower ends of the pins 35 projecting below the lower surface of the housing 33, the said pins being of different lengths and being adapted, when raised to the proper extent, to so lift the pins 31 in the collar 30 as to cause the lower ends thereof to be smooth with the exterior surface of the collar, thus unlocking the cylinder 9, but being also adapted, when raised above the proper extent, to enter the apertures in the collar 30, again locking the cylinder 9.

The rear trunnion 27 of the cylinder 25 of the carrier, which projects through the rear plates 18 and 18^b, has upon its rear end a collar 40, carrying on one of its sides an arm 41, terminating in a shoe 42, the outer surface of which is curved, it being struck from a center located between it and the center of trunnion 27. The said curved face of the shoe is channeled, as at 43, in planes parallel to the plane of rotation of the arm, the channels being of such a depth that when the carrier is in place beneath the receptacle and the cylinder 25 rotated to cause the shoe to slide under the housing 33, lifting the pins 35, (the lower ends of which will be in the said channels,) the pins will be raised the proper amount to unlock the cylinder 9, which may then be turned, opening the slot 8 in the base of the receptacle and permitting its contents to fall through the slot 26 in the cylinder 25 into the carrier, the collar 40 being so mounted on the trunnion 27 as to cause the shoe thereon to unlock the cylinder 9 only when the slot 26 in the cylinder 25 is in such a position as to open the mouth of the carrier. In order to prevent the withdrawal of the carrier before its mouth has been closed, the rear transverse plate 3 has an elongated slot 44 in its base extending an equal distance on both sides of its center, and immediately below the said opening the plate 3 is bent backward, forming a bottom 45 for the chamber 46, formed by the back of the casing 1 and the plate 3. This bottom in its center has a concaved depression 47, adapted to receive the circular face of the collar 40 when the carrier is slid in place, the arm 41 on the carrier being at that time horizontal and passing through one end of the slot 44. Upon rotating the cylinder 25 to open the mouth of the carrier, the arm will assume a vertical position and the depression 47 will serve to steady and guide the collar 40, holding it in the proper position for the action of the shoe 42. It will be noticed that while the arm is in this vertical position it is impossible to withdraw the carrier, the plate 3 engaging the arm preventing this, and as the cylinder 25 is prevented from being turned backward by mechanism, to be hereinafter referred to, it is necessary, in order to release the carrier, that the forward movement of the arm (in the direction of the arrow in Fig. 5) be continued until the arm is again horizontal and can be drawn back through the opposite end of the slot 44 to that through which it was inserted; but as in causing the arm to assume this position the mouth of the carrier has been closed the cylinder will be locked against further rotation by the spring-actuated pins 50, contained in the housing 51, entering the holes in the forward trunnion 27. (See Fig. 3.) The housing 51 is contained in the forward chamber 20 in the mouth-frame of the carrier, and the said pins are adapted to be shoved back flush with the surface of the trunnion by means of

a key inserted in the slots 52 therein through the medium of the pin 53, contained in the trunnion 27, the forward part of the trunnion terminating in a knob 54.

In order that the shoe 42 may be retained when it reaches the proper position to unlock the cylinder 9, I form a depression 55 in the forward end of the cylinder 25 at what is at that time the lower edge thereof, and place a pin 56, actuated by the spring 57 within the front chamber, the rear end of the pin projecting through a perforation in the plate 18^b and being adapted to engage the said depression, thus retarding the motion of the cylinder and also notifying the operator by its clicking noise that the shoe is in the proper position to unlock the cylinder 9. I also form in the front head of the cylinder a second depression 58, diametrically opposite to the depression 55, which second depression is adapted to be engaged by the pin 56 when the cylinder 25 is in the proper position for the removal of the contents of the carrier, as shown in Fig. 8. As it is intended that the key to the cylinder 25 be kept at a central office or by some trustworthy agent a registering mechanism 39—such as that described in Letters Patent No. 220,124, granted September, 1879, to Henry Clark—is placed within the rear chamber 20, (or it may be placed in the forward chamber, together with the locking mechanism,) and is adapted to register each revolution of the trunnion 27, and thus of the cylinder 25, upon indicating-wheels 59, showing through a glazed aperture 37 in the top plate 18, the register-wheels being so arranged as to be actuated on the rotation of the cylinder from the position shown in Fig. 3 to that shown in Fig. 8, thus assuring that any rotation of the cylinder 25 will be detected if the lock should be picked after the carrier has been removed from the casing, the binding of the parts of the register being generally sufficient to prevent the backward rotation of the cylinder 25, although the invention described in Letters Patent No. 452,433, granted to me on the 19th day of May, 1891, may be applied.

As an additional safeguard against the unwarranted turning of the cylinder, I inclose the forward end of the forward trunnion thereof in a housing 65, secured to the forward face of the front plate 2, a collar 66 being between the said housing and trunnion and having its forward end crimped inward, as at 59, over the end of the trunnion, the crimped portion being notched, as at 59^a, which notch registers with the key-slot 67 in the trunnion whenever the latter is in such a position as to cause holes 68 therein to be engaged by the spring-actuated locking pins 69, contained in the housing 65, which occurs only when the cylinder 9 is in such a position as to close the bottom of the receptacle. By this construction, which is common in the so-called "Yale" locks, it is rendered impossible to insert or withdraw the notched key 70, ex-

cept when the cylinder 9 is in the position for closing the opening in the bottom of the receptacle, and as the key is necessary to the collector in withdrawing the coin, tickets, &c., from each machine he visits, it will be seen that he must remove it from the trunnion 10 before leaving the machine, and it is thus necessary for him to place the cylinder 9 in a position to be locked by both the front and rear sets of spring-actuated locking-pins 69 and 31. As an additional safeguard against his leaving the key in the trunnion 10, I make the key of a sufficient length to project through the opening in the lower part of the front of the casing 1, which is cut away, affording access to the interior thereof for the insertion of the carrier and the rotation of the cylinder 9, thus preventing the door 75 (provided with a lock 76) for the said openings from being closed until the key is withdrawn. It will also be seen that as the only access to the chamber 46 is through the slot 44, in the base of the plate 4, the pins 31 are prevented from being tampered with by the collector after he has unlocked and opened the door 75 and before he has inserted the carrier.

In order to prevent the insertion of any instrument up into the chamber 46 through the slot 44 to actuate the pins 38, I secure the arm 41 to the lower surface of the shoe, near the rear edge of the latter, and form a projection 80 upon the rear surface of the plate 3 above the slot 44, the upper surface of the projection being arc-shaped to permit the passage of the forward end of the shoe thereon, the projection extending rearward a sufficient distance to form a narrow passage 81 between it and the rear of the casing, through which the arm 41 may move.

As it is desirable to prevent the withdrawal of the carrier before the cylinder has completed its backward revolution to close the slot 8, I form a radial arm 82 upon the collar 30, projecting outward through a slot 83 in the annular extension 34 of the housing 33, the said arm being slotted, as at 84, to receive a pin 85, projecting therethrough and through the forks 85 of the vertical plunger 86, the lower end of which (when the cylinder is in a position to open the slot 8) lies in the forward path of the arm 41 and projects through the vertical perforation 87 in the projection 80 and down into one end of the slot 44, the plunger also passing through a guide 88, secured to one side of the housing 33, as shown in Fig. 5. Upon the rotation of the cylinder 9 to close the slot 8 the rising of the arm 82 will cause the plunger 86 to rise sufficiently to raise its lower end above the path of the shoe 42, as shown in dotted lines in Fig. 5, thus releasing the shoe for the forward movement at the moment the cylinder 9 has assumed such a position as to be locked by the pins 31 and 69.

Instead of the above construction to prevent the withdrawal of the carrier when the cylinder 9 is in an unlocked position, I may

use the devices shown in Figs. 9 and 10. In these figures a plunger 90, contained within the rear of the housing 33, is slightly longer than the depth of the housing and is forced downward by the flat spring 91, acting upon the lug 92, formed thereon and projecting through a vertical slot 93 in the housing to the rear surface thereof. The collar 30 has a recess 94 formed in its periphery near its rear end, the said recess being in line with the locking-pins 31. A recess 95 is formed in the upper surface of the shoe 42, also near its rear end, the said recess 95 having its rear face 96 inclined and its forward face upright. It will thus be seen that when the cylinder 9 is in a locked position the shoe in moving into place to lift the pins 38 will also lift the plunger 94. When the shoe has moved in this direction far enough to disengage the cylinder, the recess 95 in the shoe will be under the plunger, which will be forced downward by the spring 91, permitting the cylinder 9 to be turned; but as the smallest movement of the cylinder from its locked position will remove the recess 94 from over the head of the plunger the shoe cannot continue its rotation until the cylinder 9 is again placed in a locked position, as the inclined face 96 of the recess 95 in the former will strike the lower end of the plunger 90, tending to force it upward against the periphery of the collar, which will hold the plunger down until the notch 95 is again in a position to receive its upper end, when the cylinder 9 will again be in a position to be locked upon the removal of the shoe.

Such being the construction of my invention, the method of its use is as follows: A carrier 14, whose cylinder 25 is in the position shown in Fig. 8, is handed the operator, the state of the register 39 thereof being first noted. The collector, on arriving at the machine, opens the door 75 thereof and turns, by means of the knob 54, the cylinder 25 forward through an arc of ninety degrees, causing it to close the mouth of the carrier and the arm 41 and shoe 42 to have the horizontal position shown in dotted lines in Fig. 2, in which position they are adapted to pass through one end of the slot 44, and placing the flanges 18^d upon the flanges 5 of the plates 4 shoves the carrier backward until the rear of the mouth-frame 15 comes in contact with the forward face of the rear plate or other suitable stop. He now turns the cylinder 25 through another arc of ninety degrees until it assumes the position shown in Fig. 1 and the pin 56 engages in the depression 55 on the end of the cylinder, the noise of which will be heard by the collector, notifying him that the rear trunnion 10 of the cylinder 9 is unlocked, and at the same time holding the cylinder against further rotation until a considerable strain is applied thereto. The collector now inserts his key 70 and rotates the cylinder 9 through one-fourth of a revolution, (its path of rotation being limited to that

amount by a pin 80^a on the forward trunnion 10, which projects through a slot 81^a in the collar 66 or by the arm 80 on the rear trunnion,) thus causing the said cylinder to open the slot in the base of the receptacle, the contents of which will fall into the carrier. After permitting a proper time in which this may take place the collector turns the cylinder 9 back into its normal position and withdraws his key 70 and turns the cylinder 25 of the carrier through another arc of ninety degrees, causing it to close the mouth-opening of the carrier and the arm 41 and shoe 42 to assume a horizontal position and to register with the opposite end of slot 44, the position of the cylinder 25 and the arm and shoe being shown in Fig. 3, in which position they will be locked by the pins 50, entering the forward trunnion of the cylinder. The carrier is then withdrawn and the door 75 closed and locked. The carrier is now taken back to the central office, where the cylinder 25 thereof is unlocked by a key inserted in its forward trunnion and is rotated forward through an arc of ninety degrees, actuating the register and causing the parts to assume the position shown in Fig. 8, when the pin 56 will engage in the depression 58 in the forward face of the cylinder 25, holding it in place while the carrier is inverted to cause the contents thereof to fall out, the wings 24 and plates 18^c guiding the contents to the aperture 26 in the cylinder. It will now be seen that the carrier is again in proper position to be returned to the operator or collector, which is done after the state of the register thereof has been again taken.

I may in some cases desire to so arrange the parts that the carrier may be inserted when the arm 41 is in the position shown in Fig. 8, thus obviating the necessity of first turning the cylinder 25 to the position shown in Fig. 2, and in this case I continue the rear plate 3 downward to the bottom of the casing and cause the slot 44 to consist of two parts, one vertical and the other horizontal, the vertical portion being in the center of the plate, as shown at 78 in dotted lines in Fig. 5, the said portion 78 being adapted to receive the arm when the carrier is inserted, the arm being then turned through an arc of one hundred and eighty degrees to engage the pins 38, thus unlocking the cylinder 9, as before described.

A spring 99 may be used to hold the cylinder 9 in a position to close the opening 8, and in Fig. 1 I have shown such a spring encircling the rear trunnion 10 of the cylinder, one end of the said spring being secured thereto and the opposite end being secured to the frame of the casing in any suitable manner. The advantages derived from the use of the spring are that the cylinder will immediately return to the closed position if released by the collector and that it serves to prevent the picking of the front lock, which it does in the

following manner: It is well known that experts are able to pick the so-called "Yale" locks by applying a rotary strain to the lock and simultaneously moving one or more of the pins, when a sensitive hand can feel by a slight rotary movement of the key the pins assuming an unlocking position; but if a spring such as 99 is used its resistance will so modify and conceal the movement of the key that the movement of the pins will be undistinguishable. I may also make the channels 43 in the shoe of a sufficient depth to engage corresponding channels 100 in the lower surface of the housing 33, as shown in Fig. 1, and in this case it will be evident that the engagement between the shoe and the housing will afford an additional safeguard against the premature withdrawal of the former. It will also be noticed that the cylinder 9 serves as a rotary valve for the apertured bottom 6 of the receptacle, and that therefore any desired form of such a valve may be used, and I do not, therefore, limit myself to the exact construction of the cylinder 9, hereinbefore described. I may also, if I so desire, provide means for removing any obstructions that may be placed below the cylinder 9 to prevent the falling of tickets, &c., into the carrier, and it is evident that many of the devices described above are capable of numerous arrangements and modifications without departing from the spirit of my invention, and I do not, therefore, limit myself to the exact construction thereof shown and described; but

What I claim as my invention is—

1. The combination, with a receptacle having an apertured base, of a rotary valve mounted below the aperture therein, a lock securing the said valve in a closed position, a carrier adapted to be inserted below the said valve, and means carried by the said carrier for actuating the said lock, as described.

2. The combination, with a receptacle having an apertured base, of a slotted cylinder having trunnions upon its opposite ends mounted below the said base, two locks, one engaging each of the said trunnions when the cylinder is in the position to close the base of the said receptacle, a carrier adapted to fit under the said cylinder, and means mounted upon the said carrier for actuating one of the said locks, as described.

3. The combination, with a receptacle having an apertured base, of a rotary valve mounted below the said aperture therein, a plurality of locks securing the said valve in a closed position, a carrier adapted to be inserted under the valve, and means upon the said carrier for actuating one of the said locks, as described.

4. The combination, in a carrier, of a suitable body, a slotted cylinder mounted in the mouth thereof, and a register recording the rotations of the said cylinder, as described.

5. The combination, with a receptacle hav-

ing an apertured base, of a rotary valve mounted below the aperture therein, a lock securing the said valve in a closed position, a carrier adapted to be inserted below the said valve, and means for actuating the said lock and simultaneously engaging the said receptacle, as described.

6. The combination, with a receptacle having an apertured base, of a valve mounted below the aperture therein, a lock securing the said valve in a closed position, a carrier adapted to be inserted below the said valve, a slotted rotary cylinder adapted to close the mouth of the said carrier, and means carried by the said cylinder for actuating the said lock and simultaneously engaging the said receptacle when the cylinder is in a position for opening the mouth of the said carrier, as described.

7. The combination, with a receptacle having an apertured base, of a valve adapted to close the aperture therein, a pin locking the said valve in a closed position, a carrier adapted to be inserted below the said valve, a slotted cylinder mounted in the mouth of the said carrier, a shoe adapted to actuate the said pin, mounted upon the said cylinder, a plate having a slot therein, secured to the said receptacle, and means for locking the said cylinder against rotation when the shoe thereon registers with one end of the said slot, as described.

8. The combination, with a receptacle having an apertured base, of a rotary valve adapted to close the aperture therein, a carrier adapted to be inserted and secured beneath the said valve, and means for closing the mouth of the said carrier and simultaneously disengaging the carrier, as described.

9. The combination, with a receptacle having an apertured base, of a rotary valve adapted to close the aperture therein, a carrier adapted to be inserted and secured beneath the said valve, means for closing the mouth of the said receptacle and simultaneously disengaging the said carrier, and a lock adapted to secure the mechanism therefor in that position, as described.

10. The combination, with a receptacle having an apertured base, of a valve mounted below the said receptacle, a lock securing the said valve in a closed position, a carrier adapted to be inserted beneath the said valve,

an arm mounted on the said carrier and adapted to actuate the said lock and simultaneously engage the receptacle, and means actuated by the said valve for arresting the motion of the said arm when the said valve is in an unlocked position, as described.

11. The combination, with a receptacle having an apertured base, of a valve mounted below the said receptacle, a plurality of locks securing the said valve in a closed position, a key for one of the said locks, means whereby the withdrawal of the key is prevented, except when the valve is in a closed position, and a carrier adapted to be inserted beneath the said valve and adapted to actuate the opposite lock thereof, substantially as described.

12. The combination, with a receptacle having an apertured base, of a valve located below the aperture therein, a lock securing the said valve in a closed position, a carrier adapted to be inserted beneath the said valve, a rotary valve mounted in the mouth of the said carrier, and a shoe carried by the said valve and adapted to actuate the said lock when the rotary valve is in an open position, substantially as described.

13. The combination, with a receptacle having an apertured base, of a valve below the aperture therein, a lock securing the said valve in a closed position, a carrier adapted to be inserted beneath the said valve, a valve adapted to close the mouth of the said carrier, and an arm carried by the said last-named valve and adapted when the said valve is in an open position to actuate the said lock and engage the said receptacle, as described.

14. The combination, with a receptacle having an apertured base, of a valve adapted to close the aperture therein, a carrier adapted to be inserted below the said valve, a rotary slotted cylinder contained in the mouth of the said carrier, an arm carried by the said cylinder and adapted to engage the said receptacle when the said cylinder is in an open position, and means for locking the said cylinder in a closed position, substantially as described.

In testimony whereof I affix my signature in presence of two witnesses.

WILLIAM F. BEASLEY.

Witnesses:

VERNON M. DORSEY,
ZAIDEE GIBSON.