

No. 791,669.

PATENTED JUNE 6, 1905.

J. S. BRANDON.

SAFETY LOCK.

APPLICATION FILED SEPT. 20, 1904.

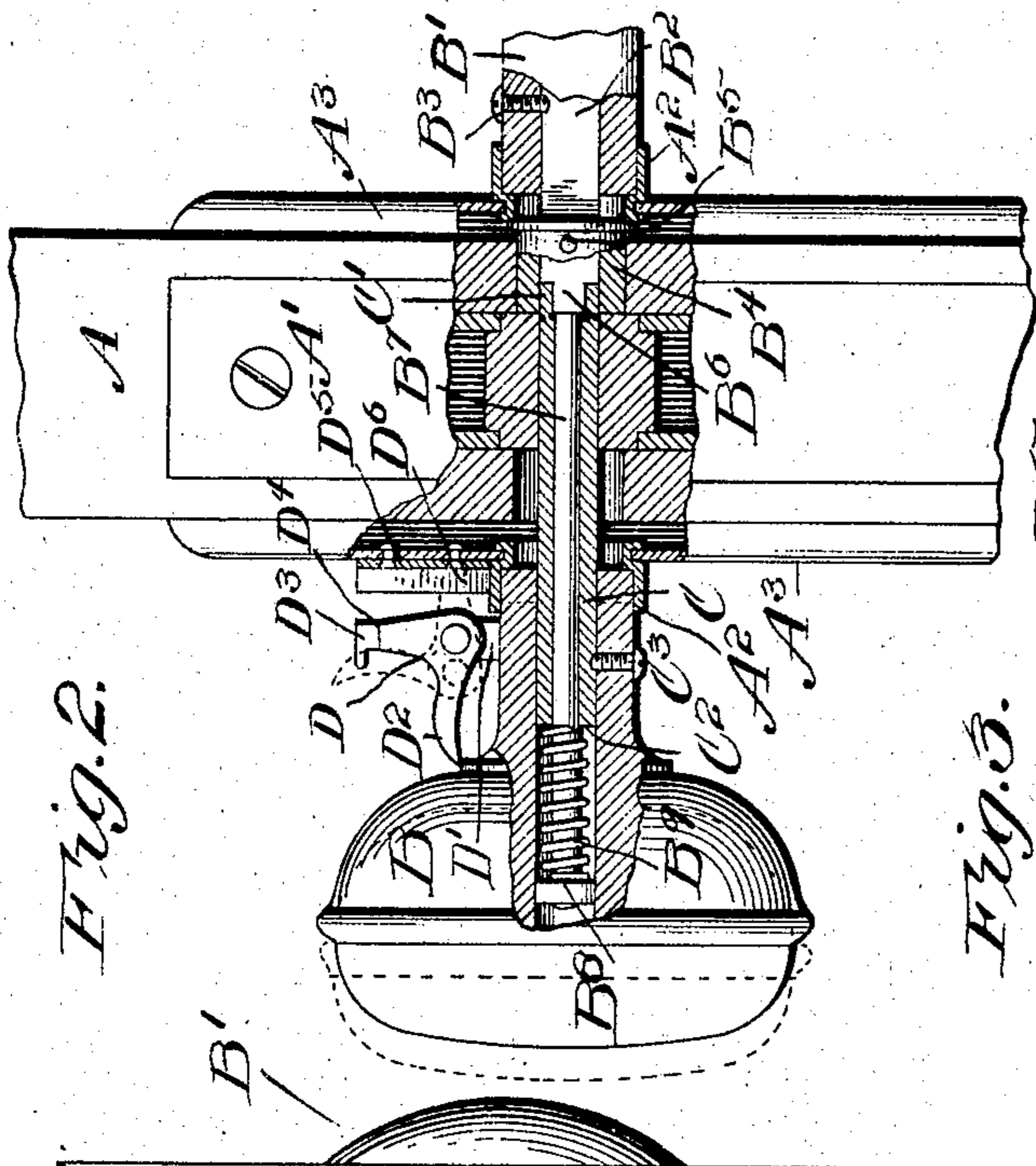


Fig. 2.

Fig. 3.

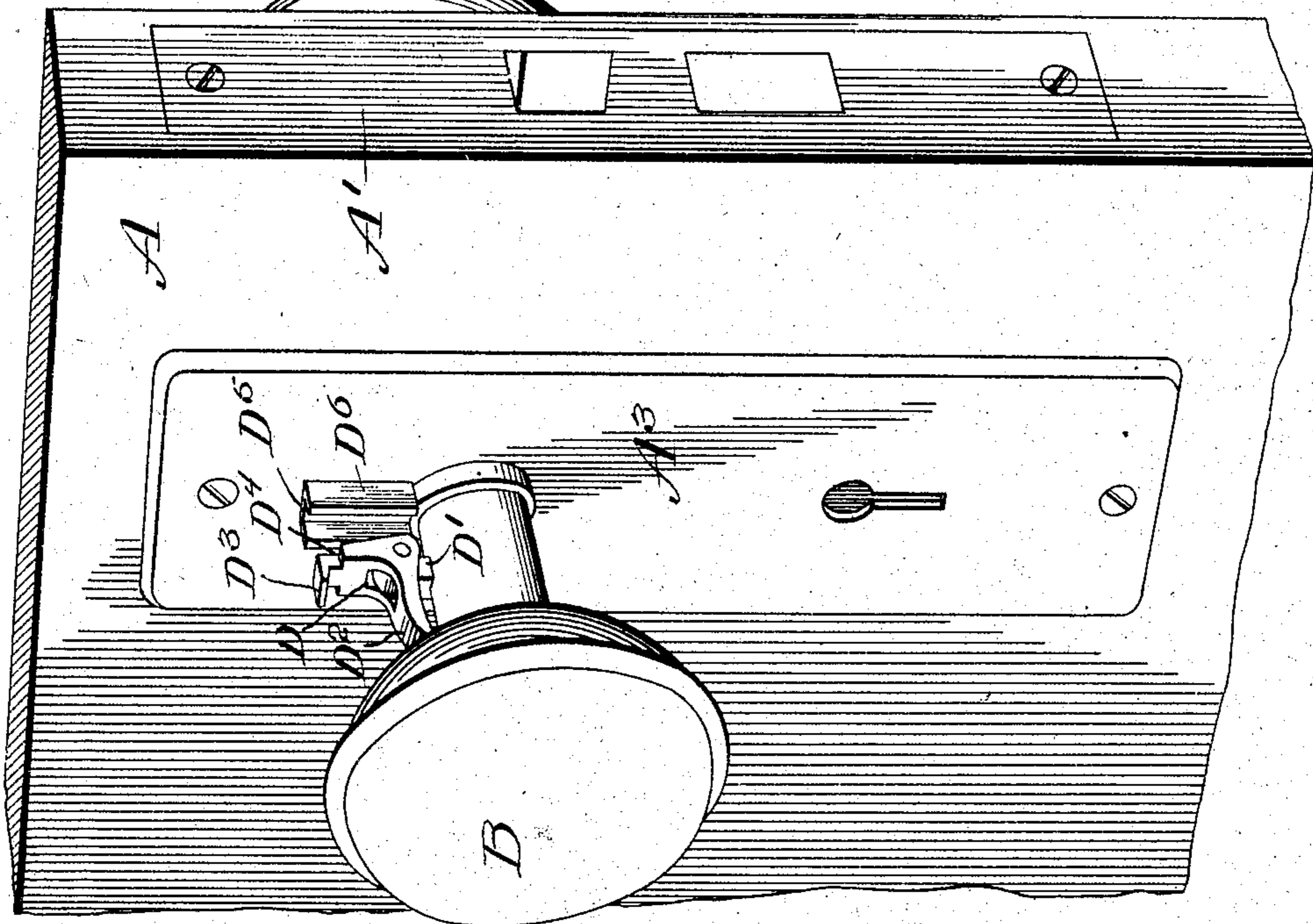
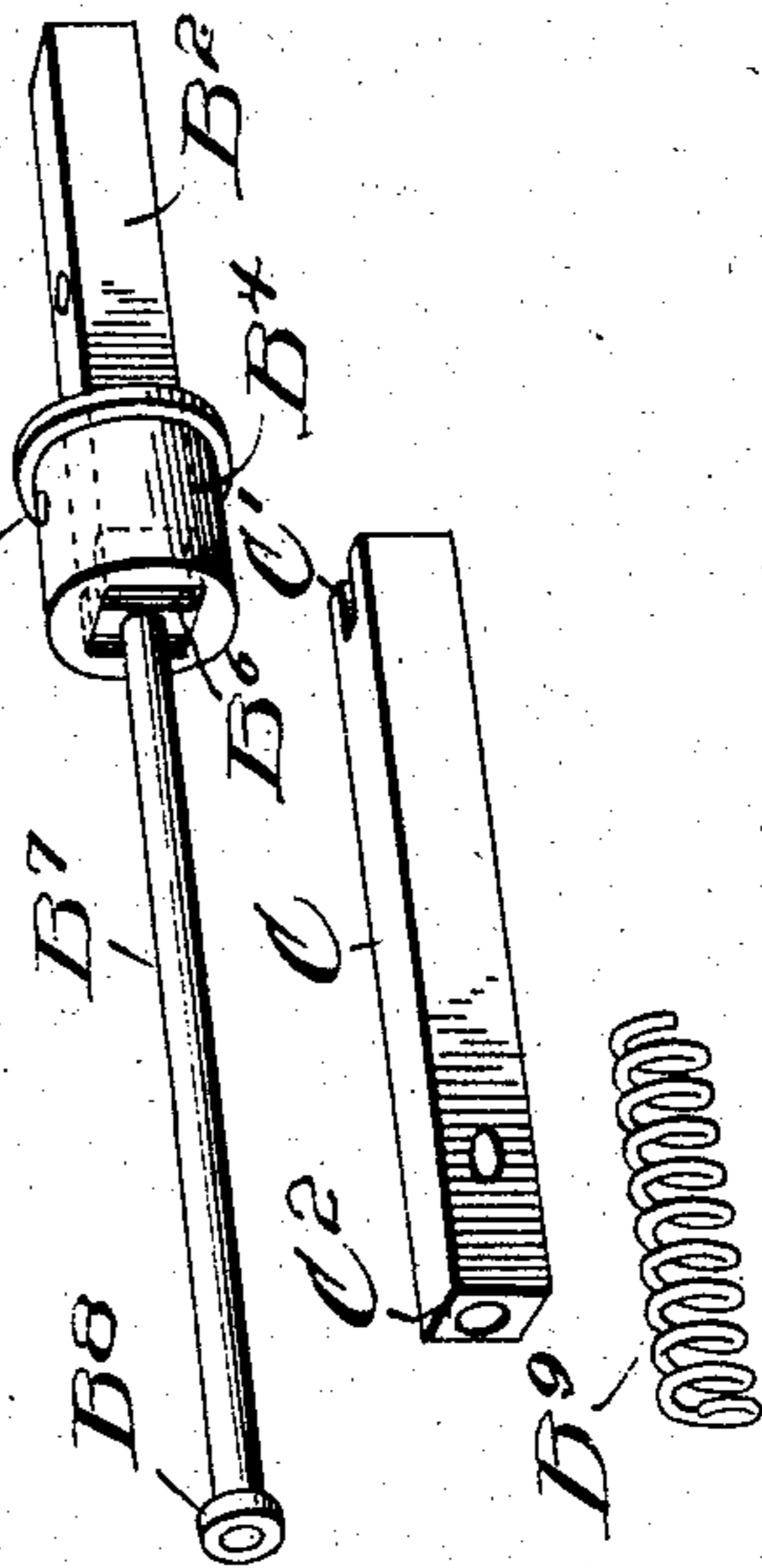


Fig. 1.

WITNESSES:

Wm. F. Lore.
Alfred T. Gage

INVENTOR

James S. Brandon,

By

E. B. Stocking

Attorney

UNITED STATES PATENT OFFICE.

JAMES S. BRANDON, OF CHEYENNE, WYOMING.

SAFETY-LOCK.

SPECIFICATION forming part of Letters Patent No. 791,669, dated June 6, 1905.

Application filed September 20, 1904. Serial No. 225,247.

To all whom it may concern:

Be it known that I, JAMES S. BRANDON, a citizen of the United States, residing at Cheyenne, in the county of Laramie, State of Wyoming, have invented certain new and useful Improvements in Safety-Locks, of which the following is a specification, reference being had therein to the accompanying drawings.

This invention relates to a safety-lock, and particularly to a construction of the latch-operating spindle, whereby one of the knobs thereon may be adjusted to prevent the operation of the latch thereby.

The invention has for an object to provide a construction of knob-spindle embodying clutch members carried by the opposite knobs and normally in contact with each other, so that either knob will operate the latch mechanism, together with means for retaining one of the knobs in a longitudinal shifted position, so as to permit the free rotation of the opposite knob without an operation of the latch mechanism.

Other and further objects and advantages of the invention will be hereinafter set forth, and the novel features thereof defined by the appended claims.

In the drawings, Figure 1 is a perspective of the invention applied to a door; Fig. 2, an end view thereof with parts in vertical section, and Fig. 3 a detail perspective with parts separated of the clutch mechanism.

Like letters of reference refer to like parts in the several figures of the drawings.

The letter A designates a door or other structure to which the invention is applied, which may be provided with any desired form of latch mechanism, as indicated at A', mortised within the door in the usual manner. For the purpose of operating the latch mechanism the opposite knobs B and B' are provided, the latter being secured to an angular spindle B² in the usual manner, as shown at B³, and the end of the knob fits within a suitable flange A², carried by the face-plate A³ upon the side of the door. Beyond this flange the spindle is provided with a collar B⁴, secured thereto in any desired manner—for instance, by a screw, as indicated at B⁵—while the end of the spindle B² is provided with a

clutch member B⁶, inclosed by the collar B⁴, so as to form the sockets adapted to receive the coöperating member C', carried by the sliding spindle-section C. This section is mounted upon the extended rod B⁷ from the spindle B², which rod is provided at its end with a head B⁸, and the sliding section C is normally held in clutching contact by means of the tension-spring B⁹, disposed between the head B⁸ and the opposite face C² of the sliding spindle C. It will be seen that the knob B' and collar B⁴ prevent any longitudinal movement of the spindle B², while the sliding spindle C when unclutched is free for both longitudinal and rotary movement—that is, the rod B' is free to rotate within the spindle C.

The operating-handle B is connected to the spindle C in the usual manner, as shown at C³. For the purpose of retaining the sliding spindle C in unclutched position when the knob and said spindle are shifted longitudinally upon the rod B' a catch D is provided and pivotally mounted upon a post D', carried by the shank of the knob B, and comprises an angle-arm D², forming a handle, and an arm D³, adapted to contact with the surface of the face-plate. If it be desired to hold the knob against any rotation, a shoulder portion D⁴ is provided and adapted to engage the opposite sides D⁶ of a channel member D⁵, by which the catch is held against rotation with the knob. It will be seen that the engagement of the shoulder D⁴ with the sides D⁶ of the channel member D⁵ prevents any rotary movement of the latch in an attempt to turn the knob of the door, while by simple pressure upon the finger-piece D² the catch is removed, so that the clutch members of the spindle automatically engage each other and notches are in operative position for movement of the latch in the ordinary manner.

While the form of catch just described is a desirable one for the operation of this invention, still other forms may be used to accomplish the same purpose.

In the operation of the invention the outer knob B' is intended to be rendered inoperative at night or any other time when it is desired that the latch shall not be operated from the outer side of the door, and this is immediately

accomplished by drawing the inner knob away from the door, thus unclutching the members of the spindle and throwing the catch in position to hold them in such unclutched relation. At this time the outer knob is freely rotatable without affecting the latch, while the inner knob is held against rotation when the groove shown is used; but this groove may be omitted and the catch rotate in contact with the face-plate, under which conditions the inner knob would be free for rotation to operate the latch. The parts may be restored to their usual operative position by simply withdrawing the catch and permitting the spring to restore the spindle members in clutched relation.

It will be obvious that changes may be made in the details of construction and configuration without departing from the spirit of the invention as defined by the appended claims.

Having described my invention and fully set forth its merits, what I claim, and desire to secure by Letters Patent, is—

1. In a device of the class described, a spindle member provided with an operating-knob and clutch thereon, a cooperating slidingly-mounted operating-knob provided with a spindle having a clutch carried thereby to engage the clutch upon the first-mentioned spindle, means for normally holding the clutch members of the spindle in contact with each other, and independently-operated means carried by the slidingly-mounted knob-spindle adjacent to the knob and adapted to engage a face-plate upon a door for retaining the sliding spindle member in unclutched position.

2. In a device of the class described, a spindle member provided with an operating-knob and clutch thereon, a cooperating spindle provided with an operating-knob and clutch slidably mounted upon the first-mentioned spindle, means for normally holding the clutch members of the spindle in contact with each other, and a pivoted catch carried by the knob of the sliding spindle member and adapted to contact with a relatively fixed surface.

3. In a device of the class described, a spindle member comprising a squared portion, a knob applied thereto, a clutch member at one end of said portion, a rod projecting from said clutch, a sliding spindle member mounted upon said rod and provided with a cooperating clutch, a spring upon said rod for normally holding the clutch members together, and an operating-knob carried by said sliding member.

4. In a device of the class described, a spindle member comprising a squared portion, a knob applied thereto, a clutch member at one end of said portion, a rod projecting from said clutch, a sliding spindle member mounted upon said rod and provided with a cooperating clutch, a spring upon said rod for normally holding the clutch members together, an operating-knob carried by said sliding member, and a collar carried by said clutch end of the first-mentioned spindle and adapted to engage a fixed body to prevent longitudinal movement of that portion of the spindle.

5. In a device of the class described, a spindle provided with an operating-knob and a clutch member, a cooperating sliding spindle provided with an operating-knob and a clutch member, and an angular pivoted catch mounted upon the knob of the sliding spindle to engage a relatively fixed surface.

6. In a device of the class described, a spindle provided with an operating-knob and a clutch member, a cooperating sliding spindle provided with an operating-knob and a clutch member, an angular pivoted catch mounted upon the knob of the sliding spindle to engage a relatively fixed surface, a grooved member carried by the face-plate, and shoulders upon the catch adapted to engage the opposite sides of said member.

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

JAMES S. BRANDON.

Witnesses:

CHARLS PHENSTEIN,
ARTHUR J. GEREKE.