(No Model.)

T. M. BRINTNALL.

SAFE.

No. 488,961. Patented Dec. 27, 1892.

FIG. 1.

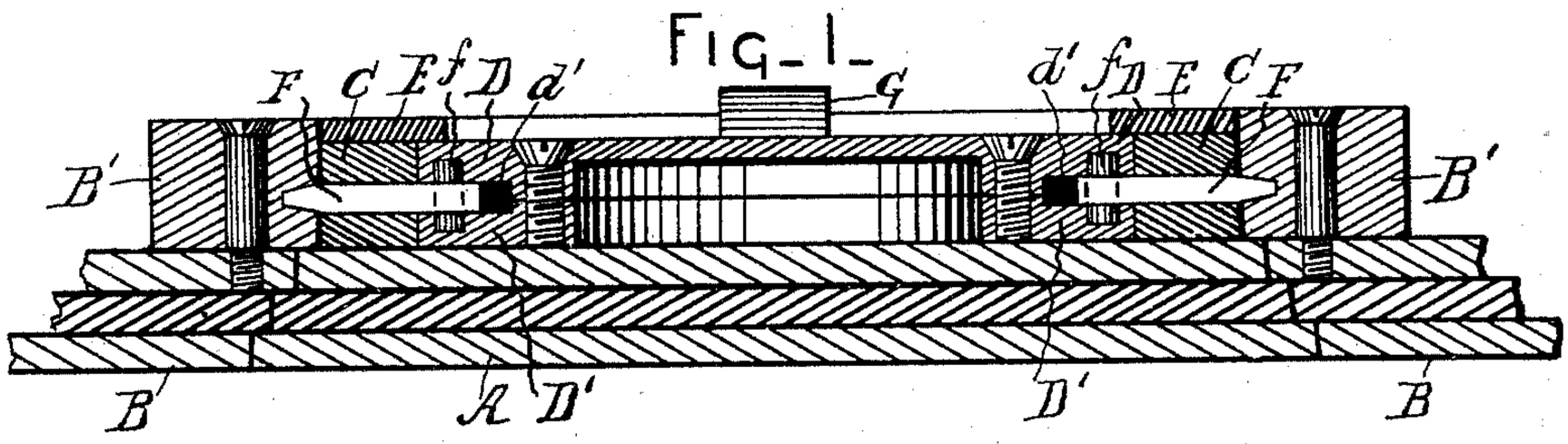


FIG. 2.

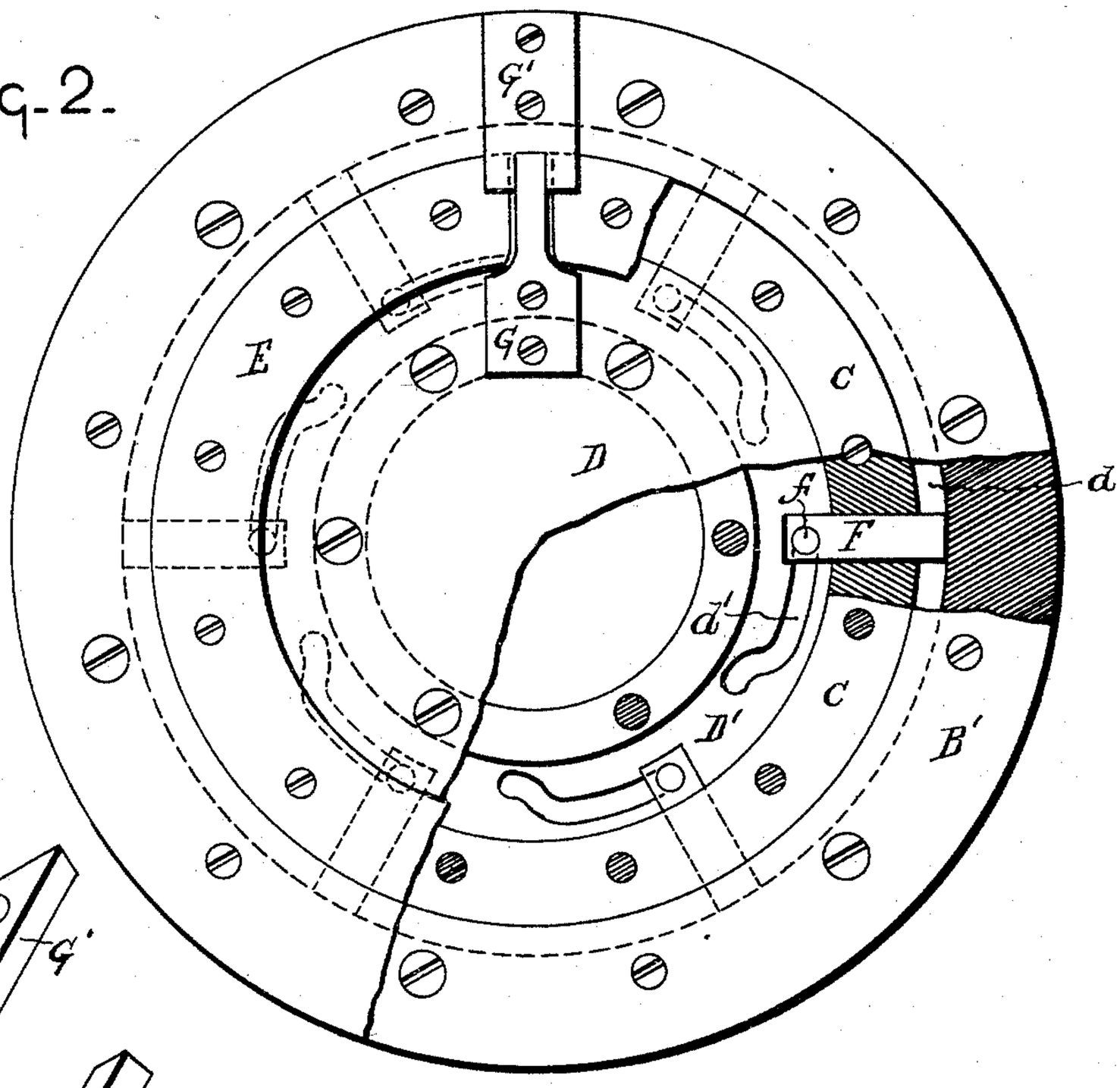
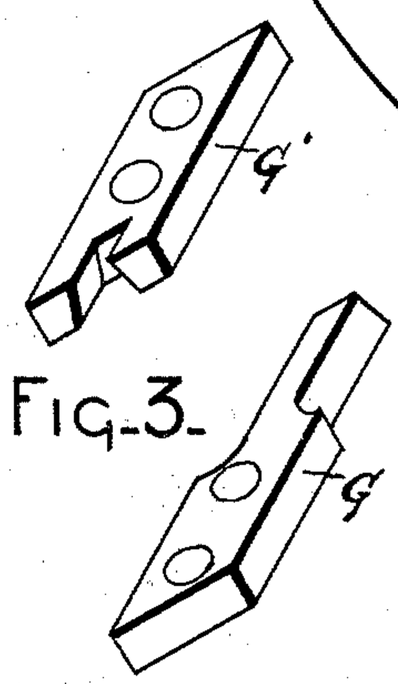


FIG. 3.



Witnesses
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THOMAS M. BRINTNALL, OF MEDINA, OHIO.

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SPECIFICATION forming part of Letters Patent No. 488,961, dated December 27, 1892.

Application filed January 23, 1892. Serial No. 419,078. (No model.)

To all whom it may concern:

Be it known that I, THOMAS M. BRINTNALL, a citizen of the United States, residing at Medina, county of Medina, State of Ohio, have invented a certain new and useful Improvement in Boltwork for Safes; and I do 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 pertains to make and use the same, reference being had to the accompanying drawings, which form a part of this specification.

My invention relates to that class of safes known as circular door safes, and consists principally in an improved method of construction whereby the movement of the bolts to lock and unlock the door, may be obtained by the revolution of the door.

The invention also consists in certain novel features, hereinafter described and claimed.

In the drawings: Figure 1—is a horizontal section through my safe door and the adjacent frame. Fig. 2—is an elevation of a portion of the door and adjacent frame with parts broken away. Fig. 3—illustrates in detail the stop mechanism.

In carrying out the invention A represents the door and B the adjacent frame or jamb.

B′ is the bolt ring located on the frame into which the ends of the bolt shoot when in their locked position.

C is a ring on the face of the door through which the bolts extend, and by which they are carried.

D—D′—are rings or plates keyed together and held to the face of the door by the plate E. The rings or plates D—D′— are movable on the face of the door and have their adjoining faces milled or channeled as at *d*—*d′*—so that when brought together the end of the bolt may play in the channel *d*—while the lugs *f*—on the bolt F will work in the channel *d′*. These latter are cam shaped as shown in Fig. 2.

G is a suitable stop or projection engaged to the plate D and extending outwardly where it may engage with the stop G′ on the frame. The meeting faces of the stops G—G′—are beveled so that as the door is moved to its closed position the two may readily engage together. Now as will be seen when the door is closed the plates D—D′—are held against movement by the stop so that when the door is revolved carrying the ring C and bolts F the lugs *f*—will play in the cam slots *d′* and be moved in or out as the case may be. The ends of the bolts are beveled as shown in Fig. 1—so that as they are forced out into the ring B′ the door is bound tightly to its seat.

Any suitable mechanism may be employed for dogging the door in its locked position, so also any suitable hinge mechanism may be employed, it being unnecessary to illustrate the same since my invention relates entirely to the bolt work and accompanying mechanism.

What I claim is:

1. In a circular door safe in which the revolution of the door acts to shoot the bolts, the combination with the door and its adjacent frame or jamb, of the locking bolts carried by the door and adapted to move therewith, and cam mechanism engaged and held by the frame and adapted to operate the bolts, when the door is revolved substantially as described.

2. In a circular door safe in which the revolution of door acts to operate the bolts, the combination with the door and its adjacent frame or jamb, of the locking bolts carried by the door, cam mechanism located on the door and adapted to operate the bolts when the door is revolved, said cam mechanism engaged by suitable stop mechanism with the frame, substantially as described.

3. In a circular door safe the combination with the door, its adjacent frame or jamb, and the locking bolts carried by the door and adapted to move therewith, of a cam plate or plates engaging said bolts and held against revolution by a stop on the frame, substantially as described.

4. In a circular door safe the combination with the door and the adjacent frame or jamb, the locking bolts having their ends beveled and permanent intermediate connecting mechanism, of a stop carried by the frame which engages and holds a stop carried by the door whereby the revolution of the door when it is closed acts to shoot the bolts and

bind the door to its seat substantially as described.

5. In a circular door safe in which the revolution of the door acts to shoot the bolts, the combination with the door and its adjacent frame or jamb, of the locking bolts having their ends beveled, said bolts carried by the door and adapted to move therewith, and cam mechanism engaged by the frame and adapted to operate the bolts substantially as described.

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

THOMAS M. BRINTNALL.

Witnesses:
FRANK HIGLEY,
ANDY H. HOFFNER.