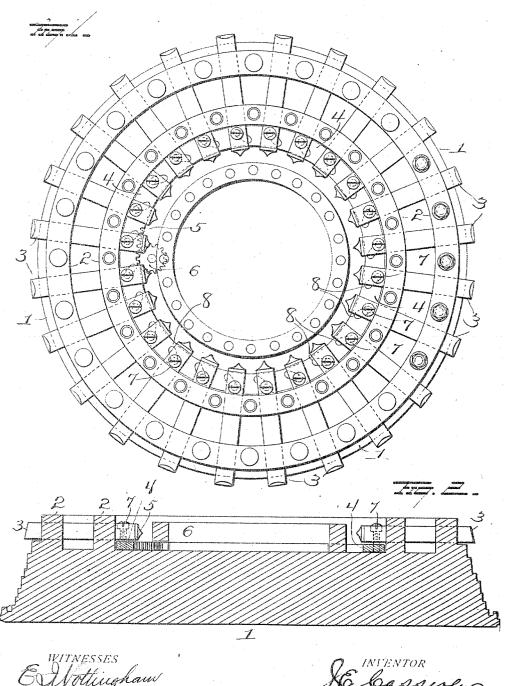
J. E. CASSERLY.
BOLTWORK FOR CIRCULAR DOORS.
APPLICATION FILED APR. 10, 1905.



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## UNITED STATES PATENT OFFICE.

JOSEPH E. CASSERLY, OF NEW YORK, N. Y., ASSIGNOR TO REMINGTON AND SHERMAN COMPANY, OF PHILADELPHIA, PENNSYLVANIA.

## BOLTWORK FOR CIRCULAR DOORS.

No. 811,696.

Specification of Letters Patent.

Patented Feb. 6, 1906.

Application filed April 10, 1905. Serial No. 254,696.

To all whom it may concern:

Be it known that I, JOSEPH E. CASSERLY, a resident of New York, in the county of New York and State of New York, have invented 5 certain new and useful Improvements in Boltwork for Circular Doors; 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 10 appertains to make and use the same.

My invention relates to improvements in boltwork for circular doors, the object of the invention being to provide improved mechanism for simultaneously withdrawing and projecting all of a series of radially-disposed bolts around the door; and the invention consists in certain novel features of construction and combinations and arrangements of parts, as will be more fully hereinafter described, 20 and pointed out in the claim.

In the accompanying drawings, Figure 1 is a view in elevation illustrating my improvements, and Fig. 2 is a view in section thereof.

1 represents a door having parallel rings 2 25 secured on its inner side and providing bearings for a series of radially-disposed bolts 3. A movable ring 4 is mounted to turn just inside the smaller fixed ring 2, and a portion of said movable ring 4 is provided with teeth, 30 forming a rack 5 in mesh with an operatingpinion 6, which latter is controlled by any approved mechanism. The inner ends of all

of the bolts 3 extend over this ring 4 and have screws or pins 7 therein, which project into inclined or cam slots 8 in ring 4, so that when 35 said ring is turned all of the bolts will be simultaneously moved inward or outward, according to the direction of movement of

ring 4.

A great many changes might be made in 40 the general form and arrangement of the parts described without departing from my invention, and hence I would have it understood that I do not restrict myself to the precise details set forth, but consider myself at 45 liberty to make such slight changes and alterations as fairly fall within the spirit and scope of my invention.

Having fully described my invention, what I claim as new, and desire to secure by Let- 50

ters Patent, is-

The combination with a door and a series of radially-disposed bolts thereon, of a movable ring having a cam-slot for each and every bolt, pins carried by the bolts and located in 55 the slots, gear-teeth on said ring and an operating-pinion meshing therewith.

In testimony whereof I have signed this specification in the presence of two subscrib-

ing witnesses.

JOSEPH E. CASSERLY.

Witnesses:

Frank O. Herring, RUTHERFORD S. FOWLER.