

J. W. WARNER.  
Fire-Proof Vaults.

No. 134,575.

Patented Jan. 7, 1873.

\*Fig. 1.

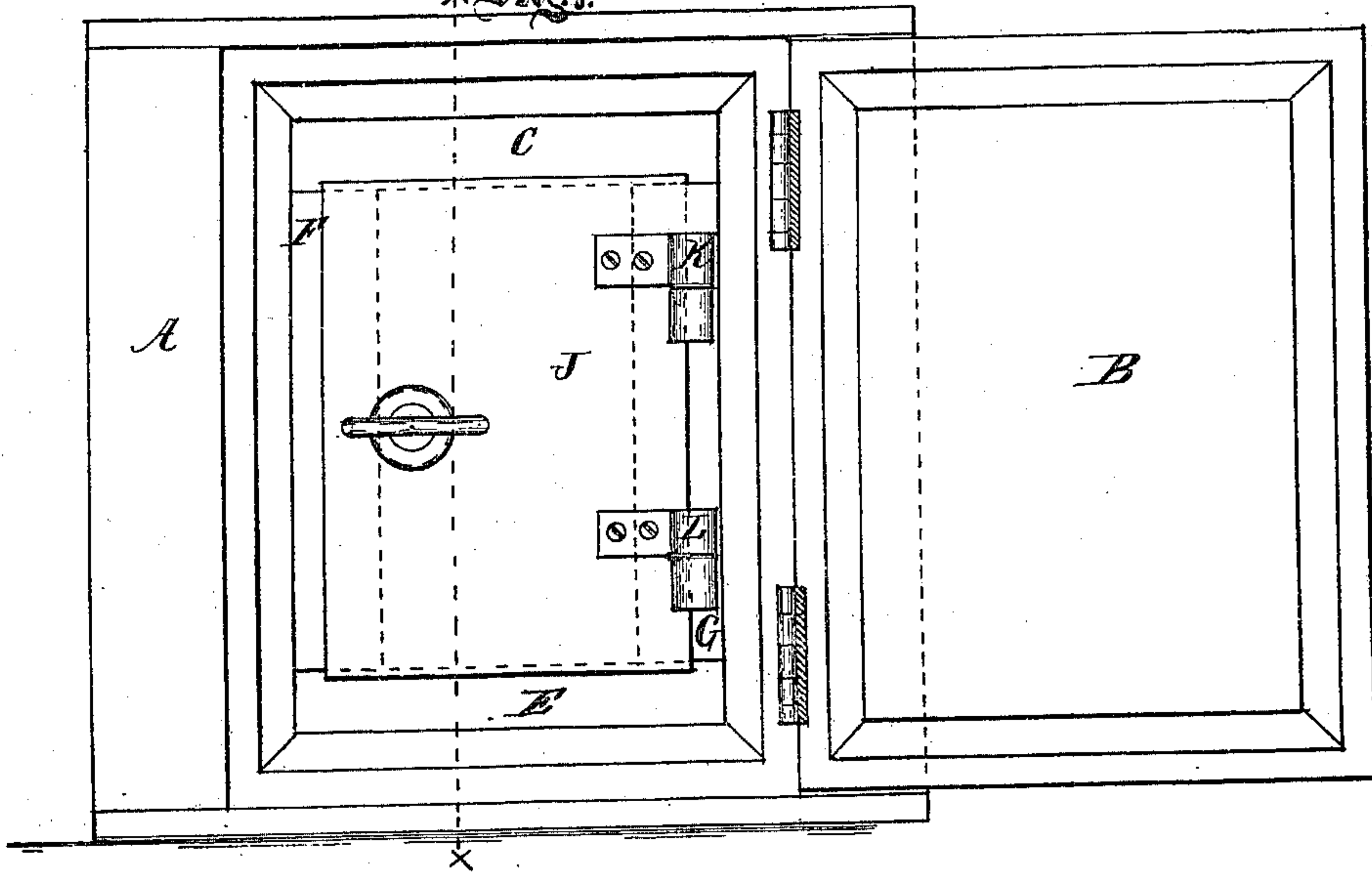
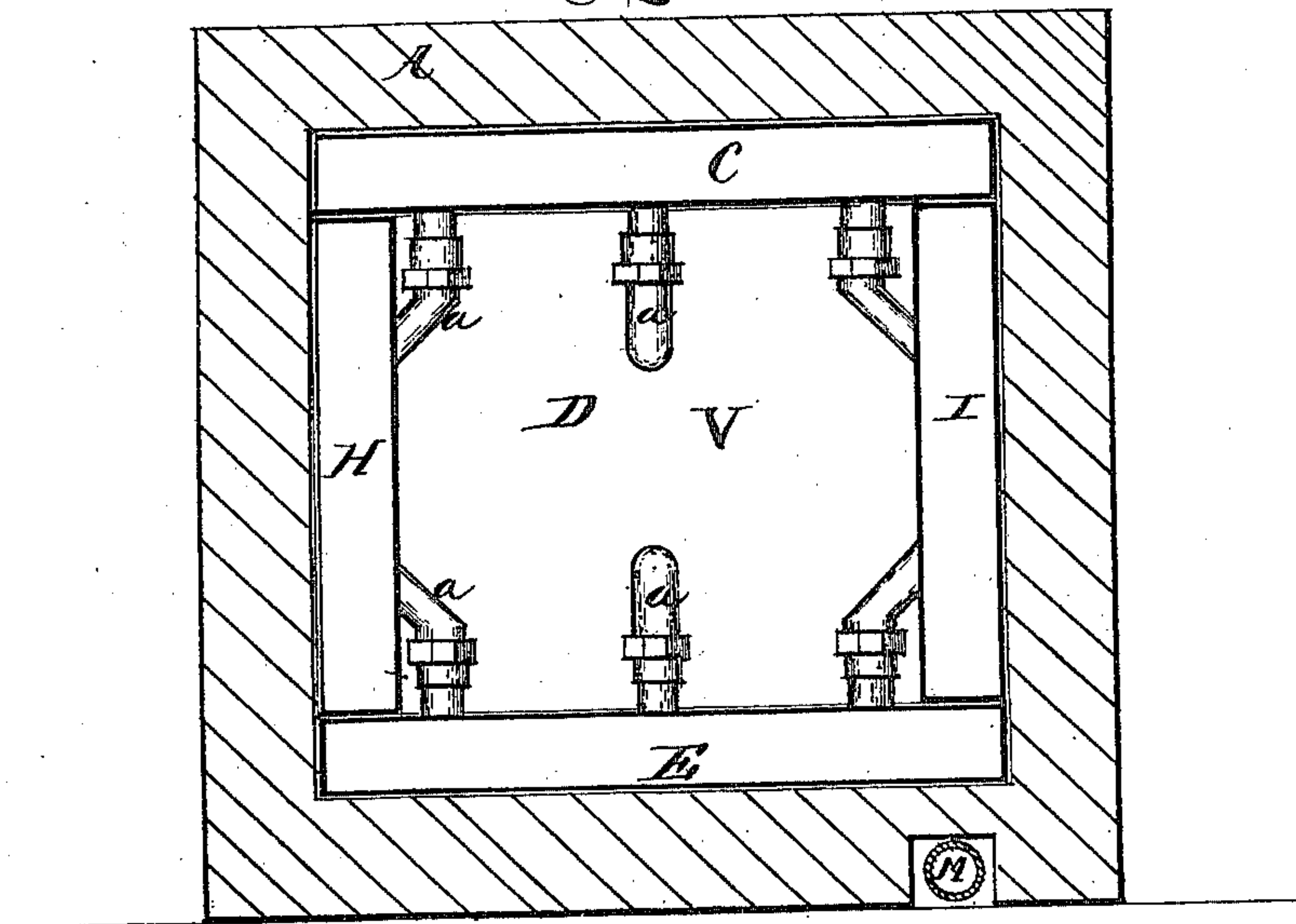


Fig. 2.



Witnesses:  
Richard Gerner  
Franklin Barrell

Inventor:  
J. W. Warner  
For Henry Gerner

J. W. WARNER.  
Fire-Proof Vaults.

No. 134,575.

Patented Jan. 7, 1873.

Fig. 3.

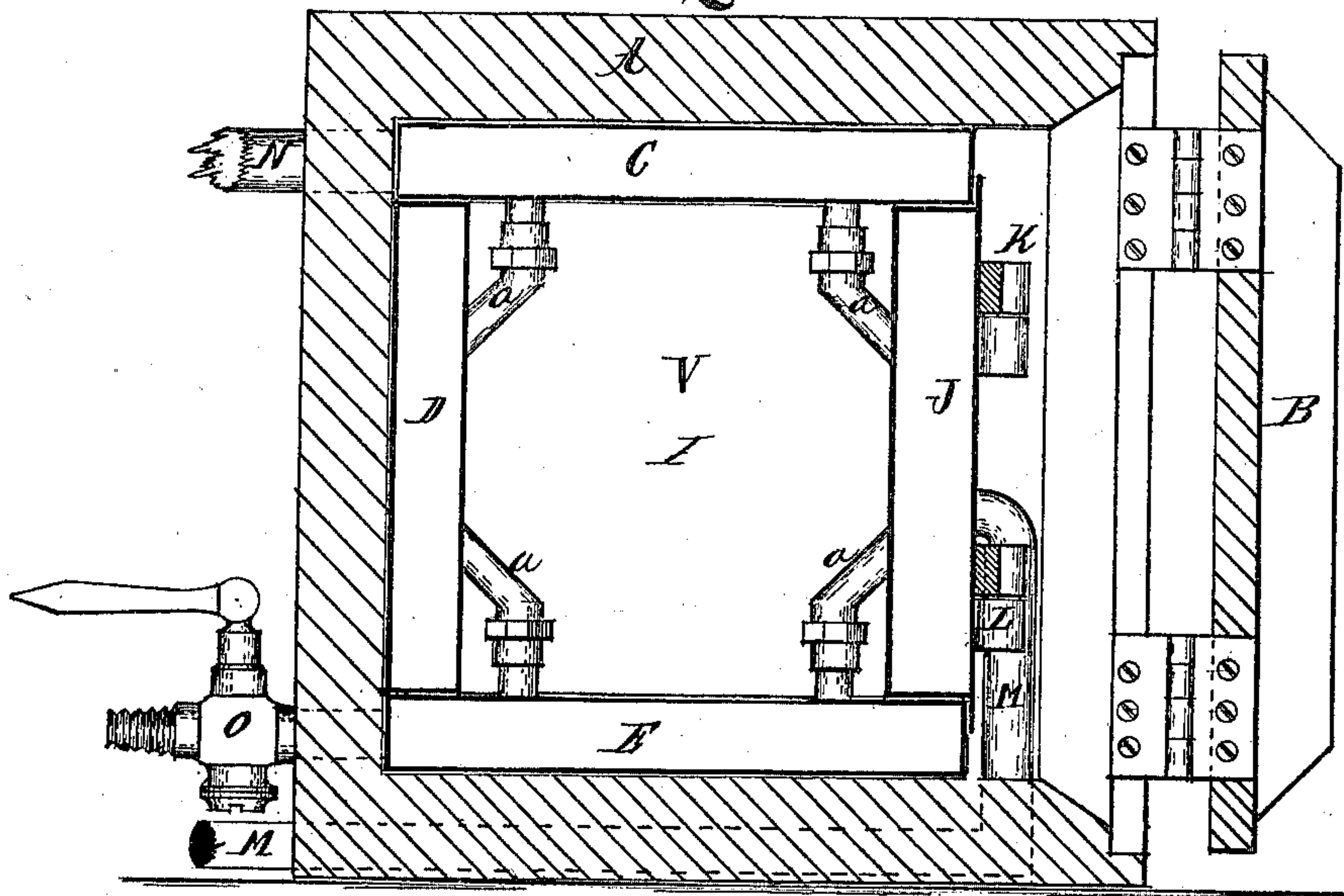


Fig. 4.

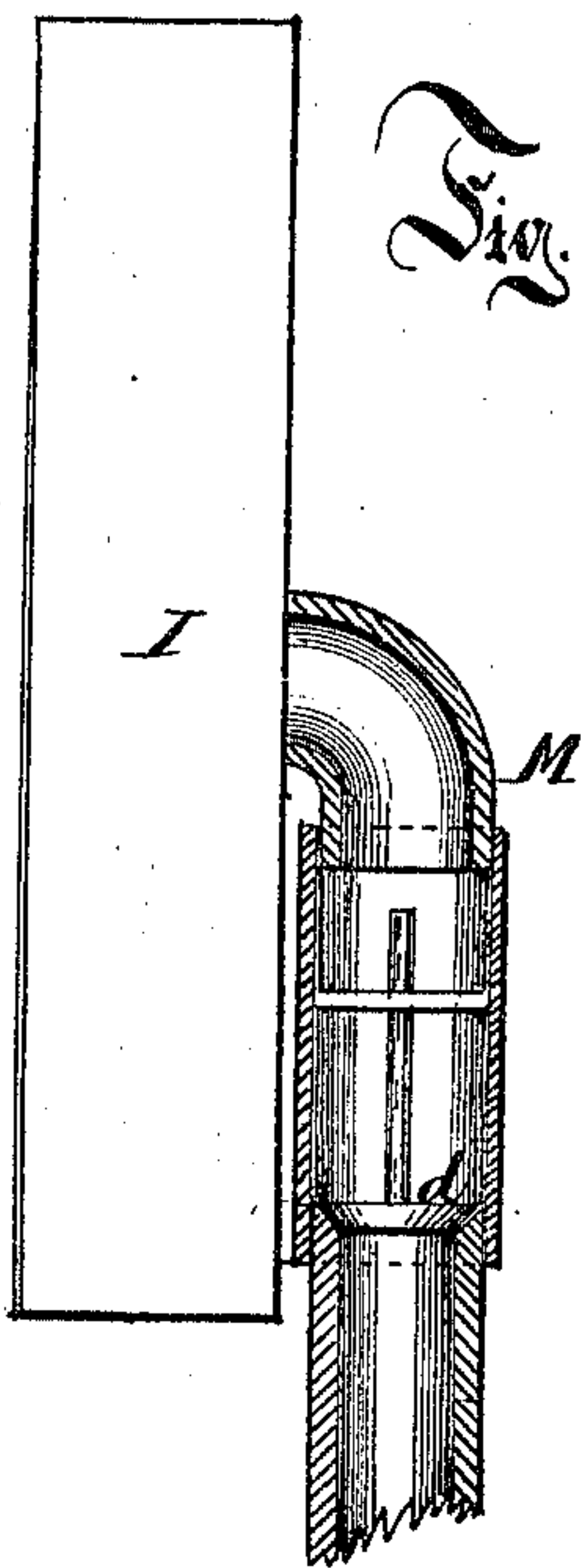
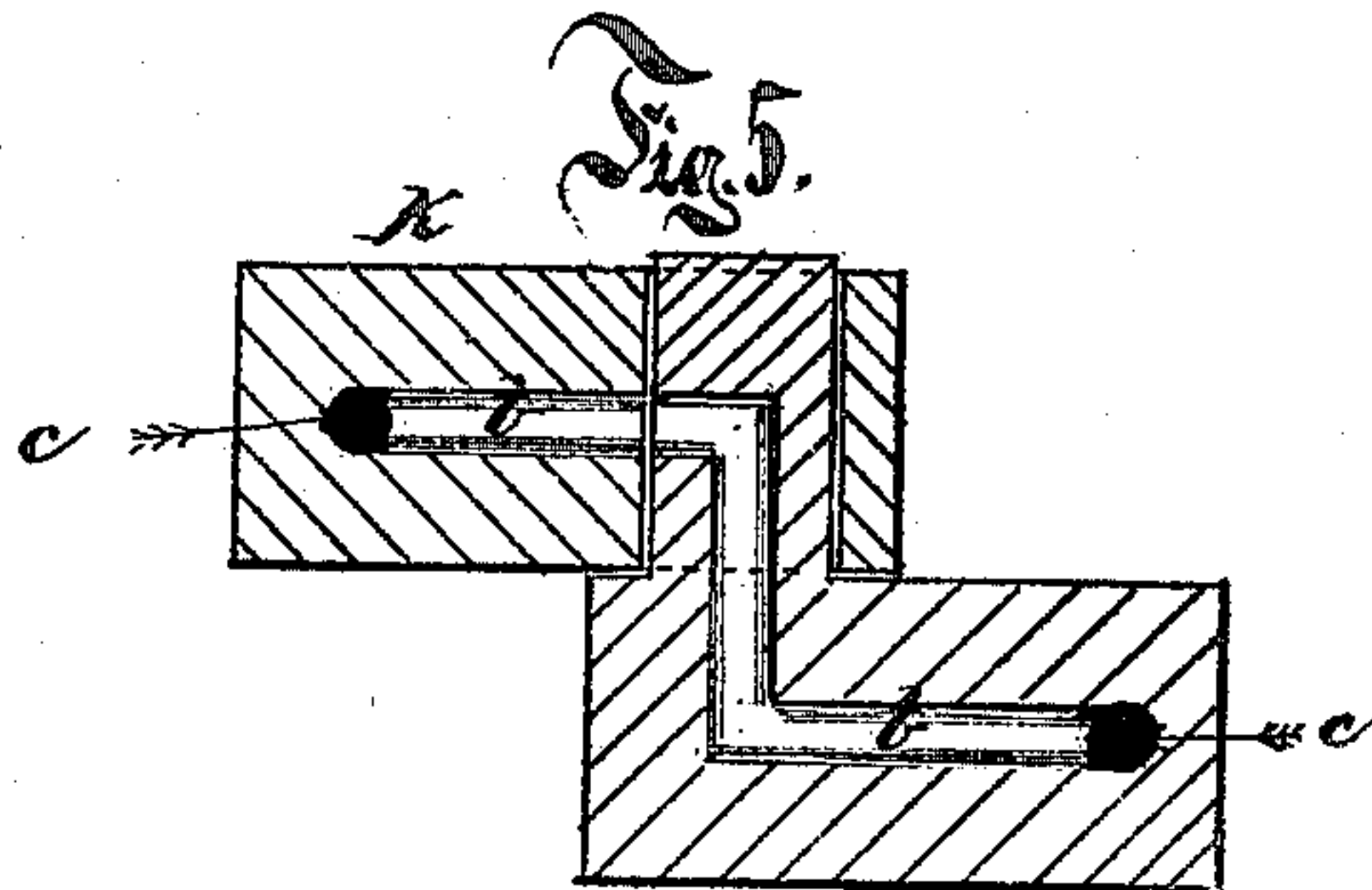


Fig. 5.



Witnesses:  
Richard Gerner  
Franklin Barrell.

Inventor:  
Judson W. Warner  
Per Henry Gerner  
Att'y



# UNITED STATES PATENT OFFICE.

JUDSON W. WARNER, OF ONEIDA, NEW YORK.

## IMPROVEMENT IN FIRE-PROOF VAULTS.

Specification forming part of Letters Patent No. 134,575, dated January 7, 1873.

*To all whom it may concern:*

Be it known that I, JUDSON W. WARNER, of Oneida, Madison county, State of New York, have invented certain Improvements in Fire-Proof Vaults, of which the following is a specification:

My invention relates to further increasing the safety of fire-proof vaults by lining the inside of such with independent metallic water-compartments communicating with each other, and also with a pipe supplying water from a tank or the Croton into the said compartments, having an exit-pipe at the top or highest point, by which the water is permitted freely to escape.

The so-called fire-proof vaults have proved themselves to be inefficient security against heavy fires, which generally crack the walls or heat them through to such a degree that the valuables and contents in the interior are destroyed.

For the purpose of preventing such disasters I use the ordinarily-constructed outer vault-casing and an inner vault composed of hollow chambers, with water-pipes leading from one chamber to the other, the door of said inner vault forming one of the hollow chambers, and having its hinges so constructed as to convey the water through them, and at the same time allow the door to be removed from the vault without disturbing the pipes or the passage of the water in the remaining chambers; and in order to describe my invention more fully I refer to the accompanying drawing forming a part of this specification.

Figure I, Sheet 1, is a front view of a combined fire-proof vault embodying my invention, showing the door of the outer vault open. Fig. II, Sheet 1, is a vertical cut section of the same. Fig. III, Sheet 2, is a vertical cut section through line *xx*, Fig. I. Fig. IV, Sheet 2, is a detached sectional view of the inlet-pipe. Fig. V, Sheet 2, is a detached sectional view of one of the door-hinges of the inner vault.

A is the outer vault; B, the door for the outer vault. C, D, E, F, G, H, and I are seven separate and independent compartments formed of metal plates riveted or otherwise securely fastened together, and placed in such a position to each other that they

form a complete inner vault inside the vault A, all connected together by pipes *a a*. Admittance to this inner vault V is obtained through the door J, which is formed of metal plates in the same manner as the other compartments, and hanging on the hinges K and L, which are made hollow and provided with grooves *b* and holes *c*. A pipe, M, with a check-valve, *d*, screwed into one of the compartments, by preference at the bottom or lower part, communicating with any convenient water-supply, will admit a free flow of water into and through all the compartments C, D, E, F, G, H, and I, and also into the door J, which again escapes through the pipe N, which by preference is placed in the top of the upper compartment C and leads into a sewer or other such escape channel.

In case the water should cease to flow through the pipe M, the check-valve *d* closes and prevents the water in the compartments and the door from running back.

O is a cock for the purpose of letting the water out of the compartments in case of repair or for other such purposes.

In case of a heavy fire heating the outer vault A to a considerable degree, or causing the same to crack, the water flowing through the compartments and door of the inner vault V will become heated, but just as fast carry away the heat communicated to the compartments and the door; and as in no case, by any degree of heat, the temperature can be raised to over 212°, as long as the exit-pipe has the same diameter as the inlet-pipe, it follows that the contents of such a vault cannot be destroyed even by the most intense heat.

I am aware that it is not new to introduce water between the walls of a safe.

Having thus fully described my invention, I desire to claim—

In combination with a vault composed of hollow chambers and connecting water-pipes, substantially as described, the detachable door J provided with hollow slip-joint hinges K L, all constructed substantially as set forth.

JUDSON W. WARNER.

Witnesses:

RICHARD GERNER,  
FRANKLIN BARRITT.