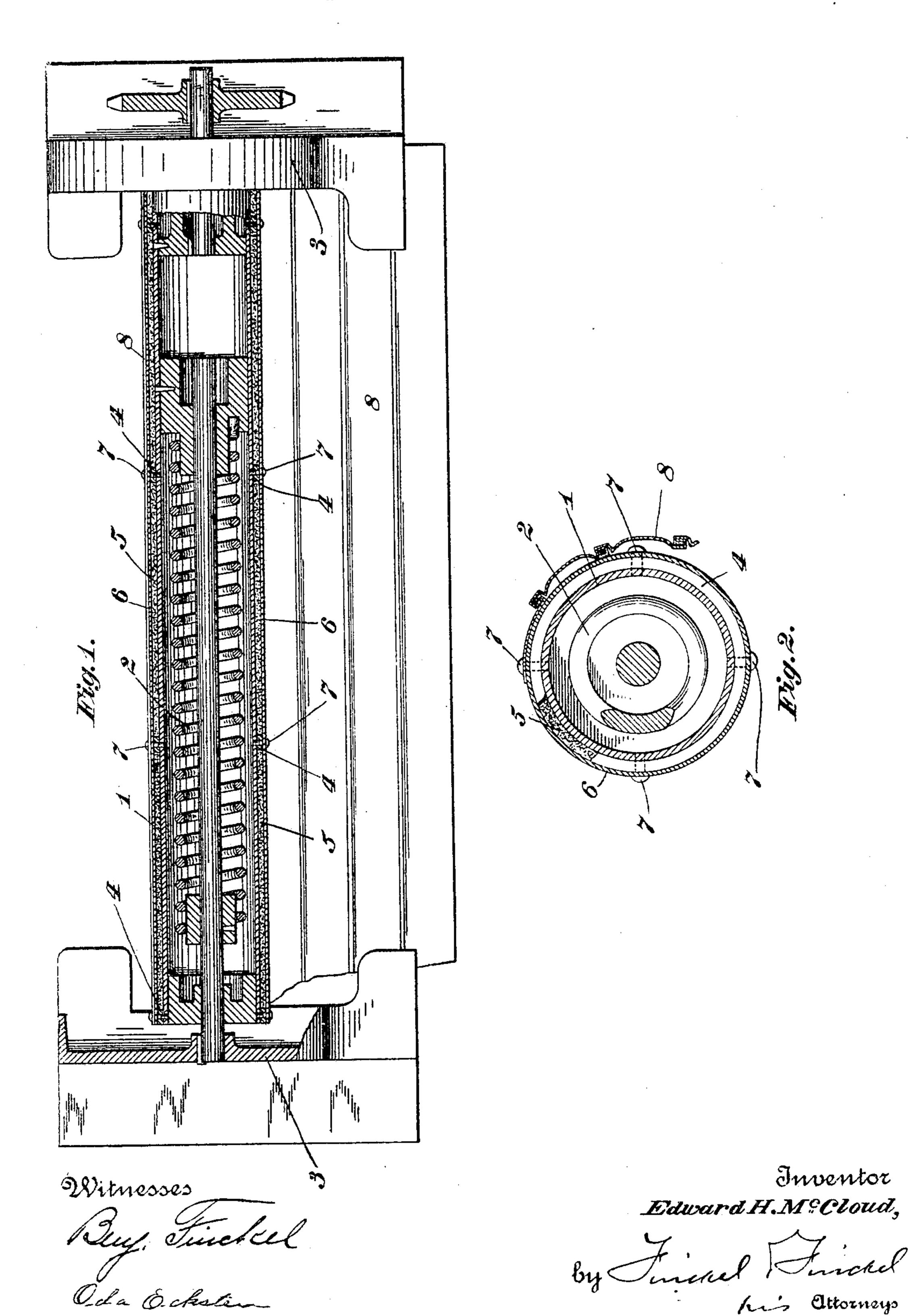
E. H. McCLOUD. ROLLER FOR FIRE RESISTING CURTAINS. APPLICATION FILED JAN. 31, 1905.



ANDREW B. GRAHAM CO., PHOTO-LITHOGRAPHERS, WASHINGT IN L. C.

UNITED STATES PATENT OFFICE.

EDWARD H. McCLOUD, OF COLUMBUS, OHIO, ASSIGNOR TO THE KINNEAR MANUFACTURING COMPANY, OF COLUMBUS, OHIO, A CORPORATION OF WEST VIRGINIA.

ROLLER FOR FIRE-RESISTING CURTAINS.

No. 799,075.

Specification of Letters Patent.

Patented Sept. 12, 1905.

Application filed January 31, 1905. Serial No. 243,545.

To all whom it may concern:

Be it known that I, EDWARD H. McCLOUD, a citizen of the United States, residing at Columbus, in the county of Franklin and State of Ohio, have invented certain new and useful Improvements in Rollers for Fire-Resisting Curtains; 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.

The springs employed in spring-rollers for fireproof curtains are of course of tempered steel. In case of fire such springs may be subjected to such a high heat as to destroy their temper, and thus render them unfit to perform their proper function. If a spring be thus rendered incapable of performing its function, it may become impracticable for an occupant of a building to lift the curtain to effect his escape or for a fireman to gain access to the seat of a fire. It is important, therefore, that some provision be made to protect the spring against heat sufficient to affect its temper.

The object of the present invention, therefore, is to provide such means; and the invention consists in the construction hereinafter described and claimed.

In the accompanying drawings, illustrating an embodiment of the invention, Figure 1 is a sectional view longitudinally of the roller, but with parts, in full, illustrating an embodiment of the invention. Fig. 2 is a cross-section of the roller on a larger scale.

In the views, 1 designates the inner drum or cylinder of the roller, containing a spring 2, of tempered steel. The roller is shown to be supported in brackets 3, as is customary 40 with the type of roller shown. On the exterior of the inner drum 1 are placed at suitable intervals removable flat rings 4, and between the rings are fillings 5 of asbestos or other fire-resisting material or material that 45 poorly conducts heat. Surrounding the rings and inclosing the filling is an outer cylinder or drum 6, of sheet-steel, which is secured to the rings by means of screws 7. The screws 7 can pass through the rings 4 and engage the 50 inner drum, or the rings 4 can be first secured to the inner drum and the outer drum secured.

to the rings by separate screws or other suitable means.

8 designates a metallic curtain secured in a suitable manner to the outer drum. The cur- 55 tain can be fastened to the outer drum by some of the same screws that secure the drum to the rings.

It will be observed that the outer drum and rings secure the filling in position on the inner 60 drum and that a firm support for the outer drum is provided.

Some changes can be made without departing from the scope of the invention.

What I claim, and desire to secure by Let- 65 ters Patent, is—

1. In a roller for fire-resisting curtains, the combination with the inner drum and spring therein, of rings projectingly supported on the exterior of said inner drum, a filling of fire-70 resisting or non-heat-conducting material between said rings, and an outer drum inclosing the filling material.

2. In a roller for fire-resisting curtains, the combination with the inner drum, and spring 75 therein, of rings projectingly supported on the exterior of said inner drum, a filling of fire-resisting or non-heat-conducting material between said rings, and an outer drum inclosing the filling material and supported by said 80 rings.

3. In a roller for fire-resisting curtains, the combination with the inner drum and spring therein, of movable rings supported on the exterior of said inner drum, a filling of fire-resisting or non-heat-conducting material between said rings, an outer drum inclosing the filling material, and means for securing the rings and the outer drum to the inner drum.

4. In a roller for fire-resisting curtains, the 90 combination with the inner drum and spring therein, of supports projecting from the exterior of said drum, a filling of fire-resisting or non-heat-conducting material between said supports and an outer drum secured on said 95 supports.

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

EDWARD H. McCLOUD

Witnesses:

N. R. Peters, Benj. Finckel.