

J. T. Evens' R.R. Safety Stove.

PATENTED JUL 18 1871

117059

Fig. 1.

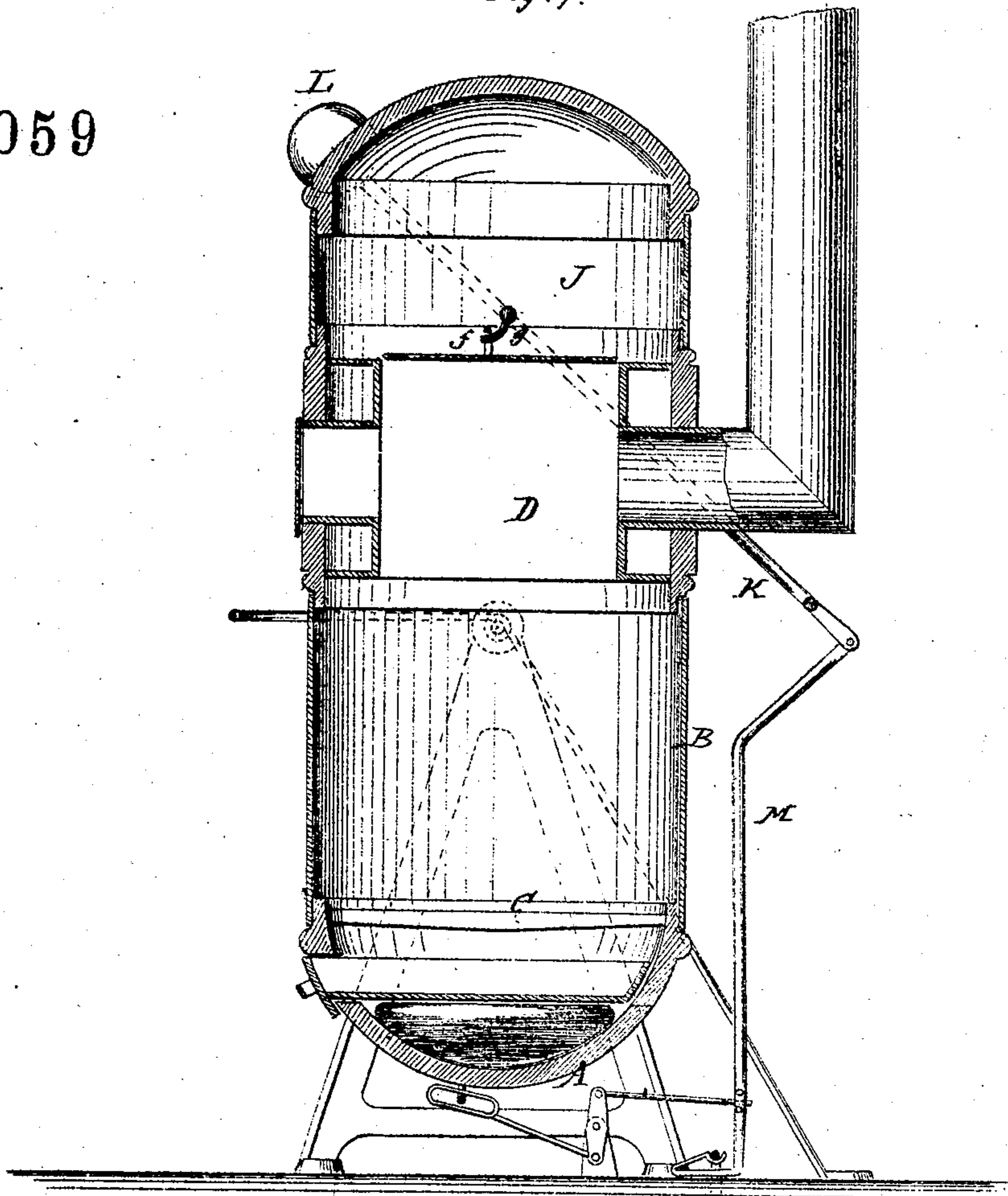
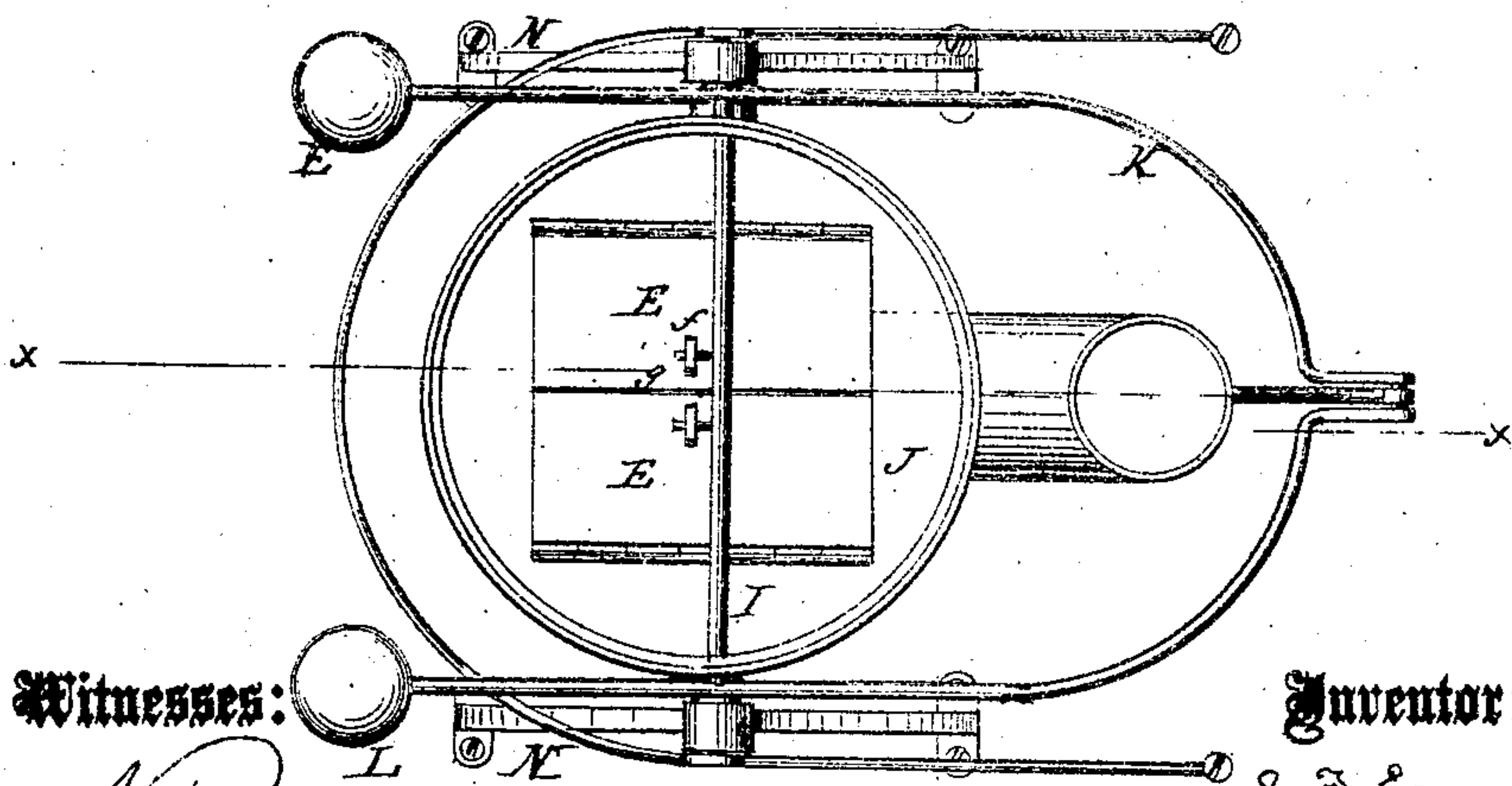


Fig. 2.



Witnesses:

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UNITED STATES PATENT OFFICE.

JULIEN T. EVENS, OF ST. LOUIS, MISSOURI, ASSIGNOR TO HIMSELF, WILLIAM H. MEYER, AND ADOLPH REDERER, OF SAME PLACE.

IMPROVEMENT IN RAILROAD-CAR STOVES.

Specification forming part of Letters Patent No. 117,059, dated July 18, 1871.

To all whom it may concern:

Be it known that I, JULIEN T. EVENS, of St. Louis, in the county of St. Louis and State of Missouri, have invented a new and useful Improvement in Railroad Safety-Stoves; and I do hereby declare that the following is a full, clear, and exact description thereof, which will enable others skilled in the art to make and use the same, reference being had to the accompanying drawing forming part of this specification.

The object of this invention is to furnish for rail-cars a stove which will be safe in cases of collision or accident to the train; and it consists in a stove provided with a weighted bottom, and with a combustion-chamber above the fire-box, and also with a chamber at the top for containing material for extinguishing the fire in case of accident, such material being automatically released, as will be hereinafter more fully described.

In the accompanying drawing, Figure 1 represents a vertical section of the stove taken on the line *xx* of Fig. 2. Fig. 2 is a top view of the stove with the cap off.

Similar letters of reference indicate corresponding parts.

A is the weighted bottom. B is the fire-box. C is the grate. D is the combustion-chamber directly above the fire-box. E E are doors near the top of this chamber, which are arranged to drop downward when released, and thus discharge onto the fire any extinguishing material which may be contained above them. Each of these doors has a staple, *f*, and they are held up in a horizontal position by means of these staples, which engage with hooks *g* on the horizontal shaft I, which shaft passes entirely through the upper chamber J. To the projecting ends of this shaft the weighted frame K is attached. This

frame is in the form of a bail, to the ends of which the weights L L are attached, and with the bow of which the rod M is connected. This rod is so connected by a spring-hook with the weighted bottom A that when the latter is by any means displaced the spring-hook is released from the floor, and, being greatly overbalanced by the balls L L, the rod flies up as the weights or balls drop down. This revolves the shaft I, which draws the hooks *g* from the staples *f*, when the doors E E drop and allow any extinguishing material to drop from the chamber J and extinguish the fire.

The arrangement for connecting the rod M with the bottom of the stove is seen in Fig. 1; but I do not confine myself to this particular mode, as I am aware that it may be done by means of other mechanism.

This stove is supported by two stands, N N, on trunnions, so that when thrown from an upright position, as it would be in case of a serious accident, the fire would be instantly extinguished.

With this improved safety-stove the horrible roasting of helpless passengers from the upsetting of car-stoves, the accounts of which have from time to time shocked the public, will be impossible.

Having thus described my invention, I claim as new and desire to secure by Letters Patent—

The weighted bottom A, fire-box C, combustion-chamber D, upper chamber J, doors E E, shaft I, weighted frame K, and rod M, arranged to operate substantially as and for the purposes described.

JULIEN T. EVENS.

Witnesses:

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