

M. L. ROSS.

AUTOMATIC CIGAR LIGHTER.

No. 190,450.

Patented May 8, 1877.

Fig. 1.

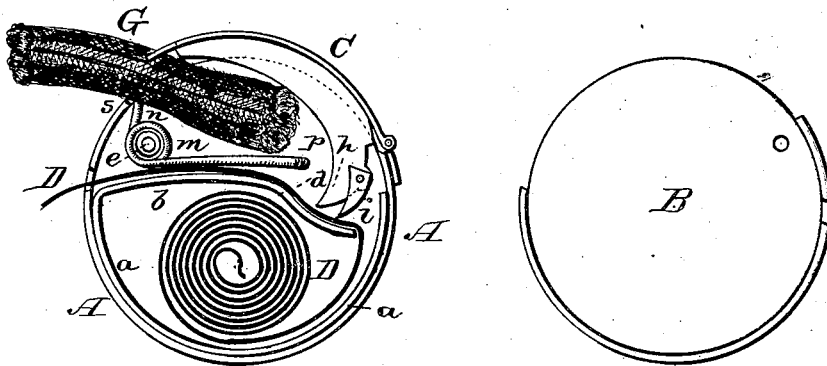


Fig. 2.

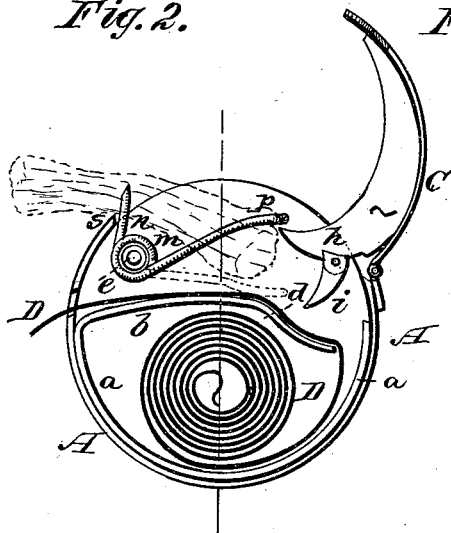
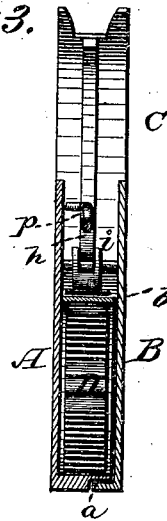


Fig. 3.



Witnesses:

P. Salatenich
Frank Duff

Inventor:

Morse L. Ross.

Per *C. N. Watson & Co.* Attorneys.

UNITED STATES PATENT OFFICE.

MONROE L. ROSS, OF NEW YORK, N. Y.

IMPROVEMENT IN AUTOMATIC CIGAR-LIGHTERS.

Specification forming part of Letters Patent No. 190,450, dated May 8, 1877; application filed April 19, 1877.

To all whom it may concern:

Be it known that I, MONROE L. ROSS, of New York, in the county of New York, and State of New York, have invented certain new and useful Improvements in Automatic Cigar-Lighter; 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 which it appertains to make and use the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification:

The nature of my invention consists in the construction and arrangement of a cigar-lighting apparatus, as will be hereinafter more fully set forth.

In the annexed drawing, which fully illustrates my invention, Figure 1 is an interior view with the cap to one side. Fig. 2 is a similar view with the hinged plate raised. Fig. 3 is a central section of the same.

A represents a circular case of any suitable dimensions provided with a cap, B, fitting over a flange, *a*, on the case. A part of this flange, *a*, is turned inward into the case forming a partition, *b*, the end of which is bent or curved, substantially as shown, and forms a shoulder, at *d*. The rims of the case A, and cap B, are cut away opposite the partition nearly the entire distance of the opening formed in the flange *a* by the bending inward of said partition *b*.

Over the opening thus made in the rim of the case is hinged a curved plate, C, on the under side of which near the hinged or inner end is formed a tooth or projection, *h*, and on the back of this tooth is pivoted a dog or pawl, *i*, the upper end of which is slotted and straddles the tooth *h*, and a pin or rivet passing through them connects the two. The back of the tooth *h*, and the slot in the dog *i* are constructed to form a shoulder, which will prevent the dog from turning backward beyond a certain point.

At the other end of the opening in the rim of the case is a stud or pin, *e*, on which is placed a coil-spring, *m*. One end of this spring forms a point, *n*, which passes out through the opening, and bears against a

shoulder, *s*, while the other end of the spring forms an arm, *p*, that lies on the partition *b*, as shown.

D represents a roll of percussion-tape placed within the case A, and the end of said tape is passed over the partition *b*, between it and the arm *p*, and out through a slot in the rim of the cap. G represents a fuse placed above the partition *b*, and passing out through an opening in the end of the hinged plate C.

By opening the hinged plate C, the tooth *h* will raise the arm *p*, and at the same time, the dog *i* will advance the percussion-tape D a suitable distance, so that when the tooth *h* clears the arm *p*, and said arm is, by means of the spring *m*, brought forcibly down upon the tape against the shoulder *d*, the cap is exploded and the fuse ignited. Then by closing the plate C the fire in the fuse is extinguished.

It will be seen that the point *n* enters the fuse, and holds the same, preventing it from falling off. The tape-advancing dog *i* may be made stationary on the hook *h*, but I prefer to pivot the same as described, because then in closing the plate C there will be no liability of it pulling back the tape, which might be the case if made stationary.

In this application, I make no claim to the following subject-matter: In a pocket lighting device an adjustable tinder and an adjustable percussion-tape; an igniting box or case, having a hammer capable of operation from the exterior; a wick duct or tube; means for feeding and exploding a pellet by the action of the hammer, and a wick-feeder; a portable lighter, consisting of a box or case constructed with a curved and closed tinder-strip channel-way surrounding a central chamber for containing a fulminate-tape, and provided with a passage common to both, through which the tinder-strip and fulminate-tape are brought together for co-operation.

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

1. In a cigar-lighting apparatus, the coiled spring *m*, having one end forming the fuse-holding point *u*, and the other end the cap-exploding arm *p*, substantially as herein set forth.

2. The combination of the case A B with interior partition *b*, plate C with hook *h* and dog *i*, the spring *m* with point *n* and arm *p*, the percussion-tape D, and fuse G, all substantially as and for the purposes herein set forth.

In testimony that I claim the foregoing as

my own I affix my signature in presence of two witnesses.

MONROE LEE ROSS.

Witnesses:

ARNOLD L'EPLATTENIER,
HENRY H. TRENOR.