W. C. HINMAN.
Ball-Trap.

No. 221,306. Patented Nov. 4, 1879.

Fig. 1.

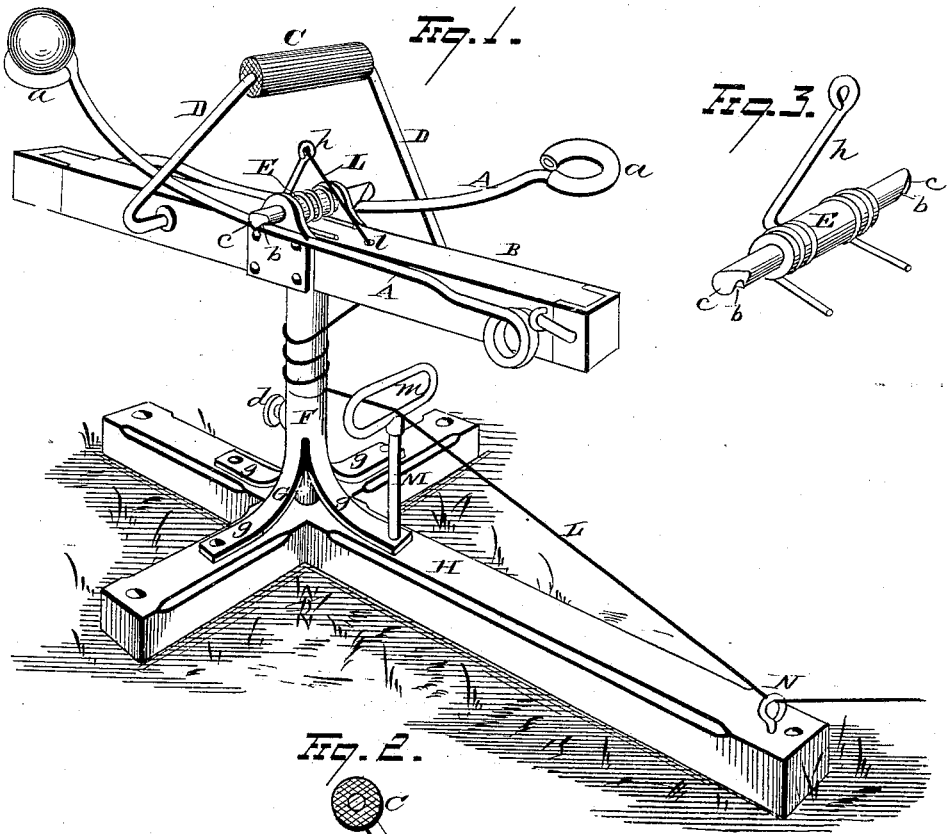
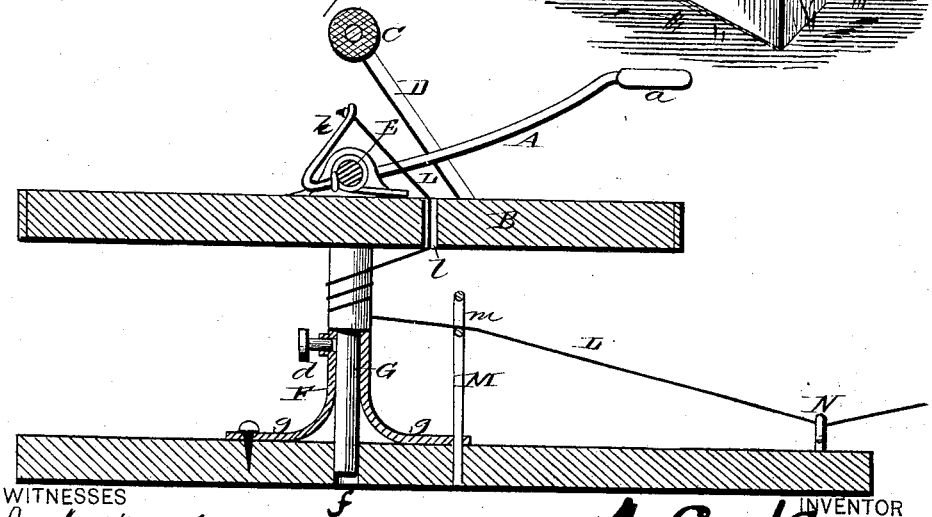


Fig. 3.

Fig. 2.



WITNESSES
E. J. Nottingham
A. W. Bright

INVENTOR
H. C. Hinman
By Seggett & Seggett
ATTORNEY

UNITED STATES PATENT OFFICE.

WILLIAM C. HINMAN, OF LEAVENWORTH, KANSAS.

IMPROVEMENT IN BALL-TRAPS.

Specification forming part of Letters Patent No. **221,306**, dated November 4, 1879; application filed April 19, 1879.

To all whom it may concern:

Be it known that I, WILLIAM C. HINMAN, of Leavenworth, in the county of Leavenworth and State of Kansas, have invented certain new and useful Improvements in Ball-Traps; 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 pertains to make and use it, reference being had to the accompanying drawings, which form part of this specification.

My invention relates more especially to that class of ball-traps well known as glass-ball traps, and is designed to provide a construction which combines the essential elements of and may be used as a stationary or a rotary, a double or a single, trap.

The advantage of such a device is readily apparent, inasmuch as the same may be used for double or single shooting, and have the balls discharged from one or both of the cups while in revolution or not, as desired.

Referring to the drawings, Figure 1 is a view in perspective of the invention. Fig. 2 is a view in longitudinal vertical section of the same. Fig. 3 represents the rotary trigger in detail.

The two independent springs A, which are each provided with a ball-cup, *a*, and which will hereinafter be referred to as the "cup-springs," are secured one at each extremity of the main shaft B. These springs pass from the ends of the shaft at which they are respectively secured to the opposite ends thereof, and pass beneath the buffer C, against which they have bearing when released from the trigger.

The cups are provided with rubber tubing or its equivalent, to prevent the glass balls from breaking.

The buffer consists of a rubber cylinder sleeved on a metallic cross-bar and supported by standards D, which incline in opposite diagonal direction therefrom, the construction being such that when the springs have bearing against the buffer, the inclined standards which respectively are nearest the cup-springs shall be practically at right angles to the same, and thus the standards are adapted to resist the force of the springs.

The horizontal rotary trigger E has each extremity formed with a transverse peripheral groove, *b*, adapted to receive the cup-spring, and also with the inclined end *c*. As the trigger is rotated said groove is also moved from out of engagement with its cup-spring, and the latter is brought into lateral bearing against the inclined end of the trigger, from which it slides off and is released entirely from said trigger.

It is evident that by placing one or both of the cup-springs in engagement with the trigger the trap may be operated for single or double shooting.

To operate the trap in rotary movement or as fixed against such rotation, the set-screw *d* in the tubular standard F is manipulated, as is apparent, said screw being adapted to have end bearing against the rotary spindle G, which passes down through said standard and is stepped at *f*.

The curved legs *g* of the standard project downwardly and outwardly, and are fastened, respectively, to the four angular portions of the base-support H, which latter is made in the form of a cross.

The cord L passes from its connection with the trigger-lever *h* through the hole *l* made in the main shaft, thence through the horizontal loop *m* formed on the upper extremity of the guide-standard M, and finally through guide N, said guides being secured to the long leg of the cross.

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

1. In a ball-trap, the combination, with the horizontal rotary trigger, of the two cup-springs secured on opposite sides, and engaging, respectively, with the extremities of said trigger, substantially as set forth.

2. In a ball-trap, the combination, with the rotary horizontal trigger, of the two cup-springs, secured to the shaft on opposite sides of the trigger, said trigger having its extremities respectively formed with a transverse peripheral groove and an inclined end, substantially as set forth.

3. In a ball-trap, the combination of the two cup-springs, the horizontal rotary trigger,

whose extremities engage therewith, substantially as described, the spring coiled about the trigger, and the upwardly-projecting trigger-lever, substantially as set forth.

4. In a ball-trap, the combination, with the two cup-springs, of the buffer, beneath which the springs pass from opposite sides, said buffer being supported on standards which incline, respectively, in opposite diagonal line therefrom, substantially as set forth.

In testimony that I claim the foregoing I have hereunto set my hand this 4th day of April, 1879.

WILLIAM C. HINMAN.

Witnesses:

FRANK T. LYNCH,

J. P. DOUGLASS.