

(No Model.)

C. W. RENEAR.
CATAPULT FOR PROPELLING BOOMERANGS.

No. 510,936.

Patented Dec. 19, 1893.

Fig. 1.

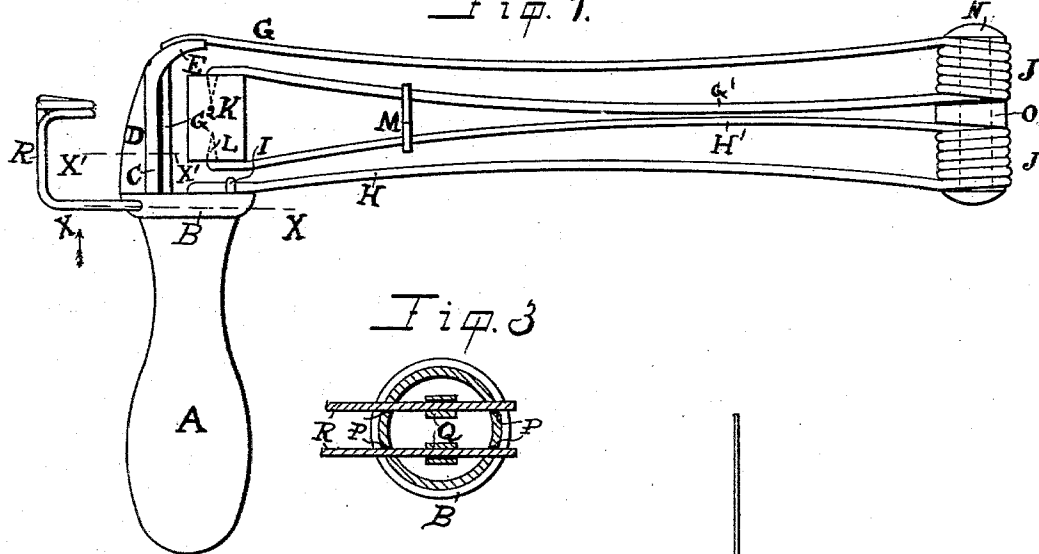


Fig. 3.

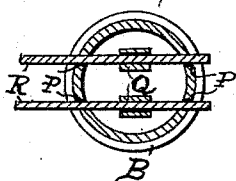


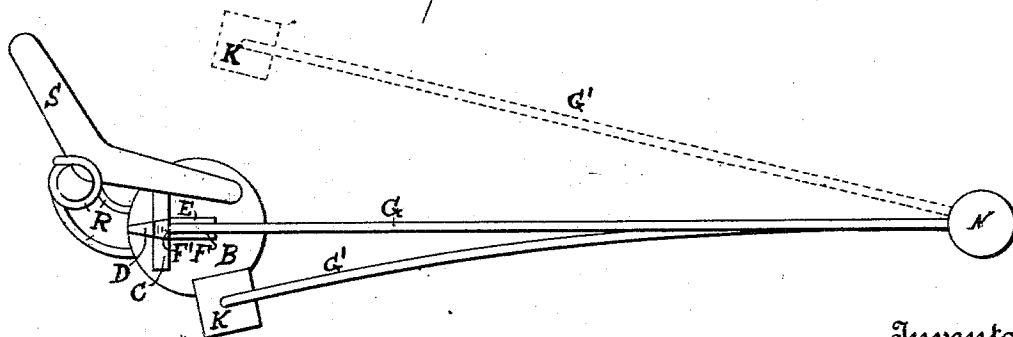
Fig. 4.



Fig. 5.



Fig. 2.



Witnesses

Wm. H. Haynes.
James T. Summerville

Inventor

Charles W. Renear

By Joshua B. Webster
Attorney

UNITED STATES PATENT OFFICE.

CHARLES W. RENEAR, OF STOCKTON, CALIFORNIA.

CATAPULT FOR PROPELLING BOOMERANGS.

SPECIFICATION forming part of Letters Patent No. 510,936, dated December 19, 1893.

Application filed March 11, 1893. Serial No. 465,622. (No model.)

To all whom it may concern:

Be it known that I, CHARLES W. RENEAR, a citizen of the United States, residing at Stockton, in the county of San Joaquin and State of California, have invented certain new and useful Improvements in Toys for Propelling Boomerangs; and I do 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, reference being had to the accompanying drawings, and to the letters of reference marked thereon, which form a part of this specification.

My invention relates to improvements in boomerang throwers or catapults; and its novelty will be fully understood from the following description and claims when taken in connection with the annexed drawings, in which—

Figure 1 is a side elevation of my improved boomerang thrower. Fig. 2 is a top view of the same with the boomerang in position for discharging, showing it in position before discharging the boomerang, the dotted lines indicating the position of the mechanism and boomerang after discharge. Fig. 3 is a detail sectional view through line X X Fig. 1. Fig. 4 is a detail sectional view of the bracket C through line X' X' Fig. 1. Fig. 5 is a side view of the boomerang.

In the drawings, similar letters of reference indicate corresponding parts throughout the several views, referring to which—

A, indicates an ordinary wooden handle, secured to a head B, preferably of cast iron, which is provided with a bracket or brace C, having a projection E, which projection is provided with a groove F and with a hole F', for the purpose of admitting and supporting a horizontal wire G, provided with a vertical arm G², which is suitably secured to the bottom of the head B. A wire H, parallel with the wire G, is secured to the top of the head B, by any suitable means, but preferably by means of a staple I as shown. The wires G, and H, extend outwardly in a plane approximately at right angles to that of the handle A, and they merge at their outer ends into coil springs J, which in turn merge into the forwardly or inwardly extending arms or wires G', H'. These arms or wires carry a

striker cube K, of rubber or similar material at their inner ends; the connection of said cube being effected by forming the ends of the wires into angular barbs as L, and providing a band as M, adapted to embrace and slide upon the wires so as to force the barbs L, into the cube and securely hold the same. By this construction it will be seen that the cube K, is securely held against casual displacement, and yet may be readily removed and replaced at pleasure of the person using the device.

The springs J, are held in position by means of a bolt or rivet N, and are kept at a suitable distance from one another by means of a washer O, located between the contiguous parts of the springs J. The head B, on either side, is provided with holes P for the purpose as will be shown.

Q, are lugs, provided with holes or guides, suitably situated in an irregular line with and between the holes P, into which holes and lugs P and Q, are inserted the ends of a wire holder R, provided with a spring-jaw, which is adapted to hold my improved boomerang, S, in any desired horizontal position. By this construction it will be readily perceived that the boomerang holder R, may be adjusted with respect to the path traversed by the striker K, so as to give the boomerang different flights.

The boomerang S, is made of aluminum, and is therefore very light and strong, and not liable to cause any accident should it strike any frail object in its flight. A flat bar of metal may be substituted for the wires G and H if desired.

The mode of operating my improved boomerang thrower, is as follows: The handle A, is grasped by the left hand of the person using the same, who with his right hand, grasps the cube K, and draws it back, as shown in Fig. 2, and holds it in such position by placing the thumb of the left hand between said cube and the bracket C. With the right hand, the boomerang is placed in position, as shown in Fig. 2. The cube is then grasped with the thumb and index finger of the right hand, and is drawn back a distance relative to the desired flight of the boomerang, and is then released and springing forward, strikes the boomerang and

propels the same through the air, to a certain point, at which it will turn and fly back to near the point from whence it started.

The dotted lines in Fig. 2, show the position of the boomerang, cube K and wire G, immediately after the release of the striking cube.

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

1. In a boomerang thrower or catapult, the combination with a handle, and a holder R, connected with the handle and having a spring adapted to clamp and hold the boomerang; of a spring actuated arm connected with the handle and disposed in a plane at right angles thereto; the said arm being provided with a striker adapted to engage the boomerang, substantially as and for the purpose set forth.

2. In a boomerang thrower or catapult, the combination with a handle, and a spring actuated throwing arm connected with said handle; of a device for holding the boomerang in a position to be struck by the spring actuated arm; the said holding device being ad-

justably connected with the handle so as to permit the boomerang to be placed in various positions with respect to the path traversed by the spring actuated arm, substantially as and for the purpose set forth.

3. In a boomerang thrower or catapult, the combination with a handle, and a device connected with the handle and adapted to hold the boomerang in a position to be struck; of the wires G, H, connected at their inner ends with the handle, the coiled springs J, formed at the outer ends of the wires G, H, the wires G', H', extending from the coiled springs J, toward the handle and having angular barbs at their inner ends adapted to engage and hold a striking piece, the said striking piece, and a clamping band embracing the wires G', H', and adapted to slide upon the same, substantially as specified.

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

CHARLES W. RENEAR.

Witnesses:

JOSHUA B. WEBSTER,
JAMES T. SUMMERVILLE.