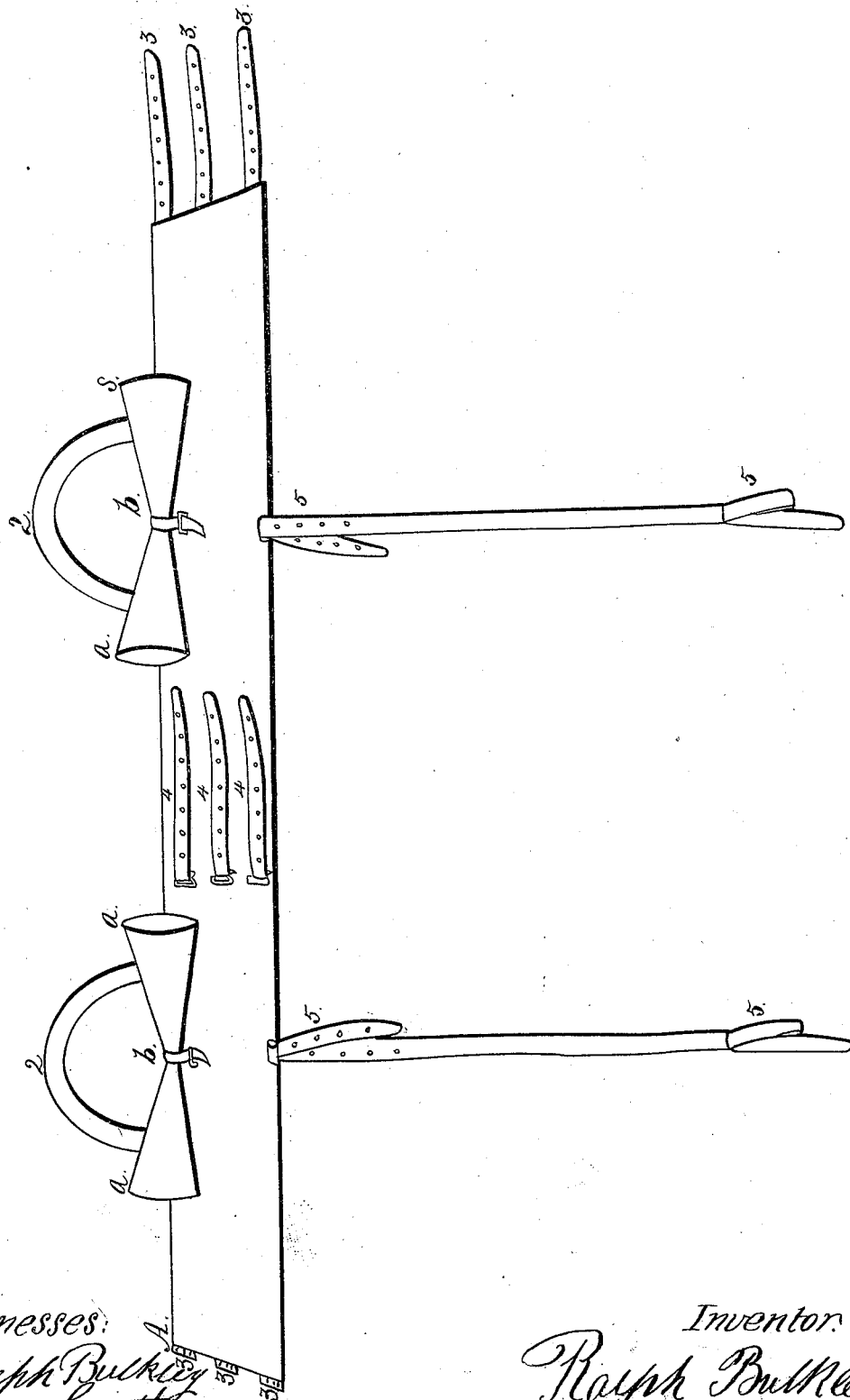


R. Bulkley *Life Preserver.*

N^o 1595. Patented May 8, 1840.



Witnesses:
Joseph Bulkley
Exra Smith.

Inventor:
Ralph Bulkley.

UNITED STATES PATENT OFFICE.

RALPH BULKLEY, OF NEW YORK, N. Y.

LIFE-PRESERVER.

Specification of Letters Patent No. 1,595, dated May 8, 1840.

To all whom it may concern:

Be it known that I, RALPH BULKLEY, of the city of New York, State of New York, have invented a new and Improved Mode of
5 Protection to Persons Exposed in Water, called "the New York Patent Metallic Life-Protector," and do hereby declare that the following is a full and exact description.

My invention consists in providing per-
10 sons individually exposed in water with metallic floats, so applied under their arms as to sustain and preserve the person properly balanced in the water.

To enable others skilled in the art to
15 make and use my invention I will proceed to describe its construction and operation, to wit.

The floats are to be made of thin sheet metal in a tubular or other shape, hollow
20 and air tight, the dimensions of the same to depend upon the extent of buoyancy required, and the shape depending partly on convenience of towage in places in which they are to be carried and partly on con-
25 venience of securing them to the person for use.

In regard to its operation I will describe one or a pair of supposed suitable dimen-
30 sions for a grown person, to wit: For application under the arms of a person to consist of two tubes about two feet in length and about six inches in diameter at the ends, tapering from the two ends to the center to about one and a half or two inches in di-
35 ameter, as shown at letter *a* in the accompanying drawing. This smallest part is that which is placed under the arms, secured by a strap as shown at letter *b* in the drawing. The floats are to be secured to the per-

son by means of a belt or jacket, as shown 40 at letter A, containing shoulder louns as shown at Fig. 2. Straps and buckles for securing it in front of the person, as shown at Fig. 3. Straps and buckles for tightening or loosening it in the back, as shown at Fig. 45 4. Foot pieces with straps extending upward, secured by buckles as shown at Fig. 5, for giving relief to the feet, as also a relief of a portion of the pressure from the arms. 50

The advantage of floats of this or nearly similar form, consists in their extending in front and rear forming in addition to their buoyancy a lever purchase or bearing upon the water, to prevent the person from cant- 55 ing in the water, the smaller part being under the arms, operating as a pivot on which the extreme ends move upon the ruffled surface of the water.

The sheet metal of which the floats are 60 composed, particularly when consisting of tin, may be coated with japan, paint or other substance impervious to water, in order to prevent corrosion or imperfections to which thin sheet metal is liable. And the 65 above improvement as herein described is believed to differ from all other improvements in use.

What I claim as my invention and desire to secure by Letters Patent, is— 70

The combination of the air-tight tubes with the belt in the manner and for the purpose described.

RALPH BULKLEY.

Witnesses:

JOSEPH BULKLEY,
EZRA SMITH.