No. 805,526. PATENTED NOV. 28, 1905.

A. M. BULLOCK.

SWIMMING APPLIANCE.

APPLICATION FILED FEB. 21, 1905.

Fig. 1.

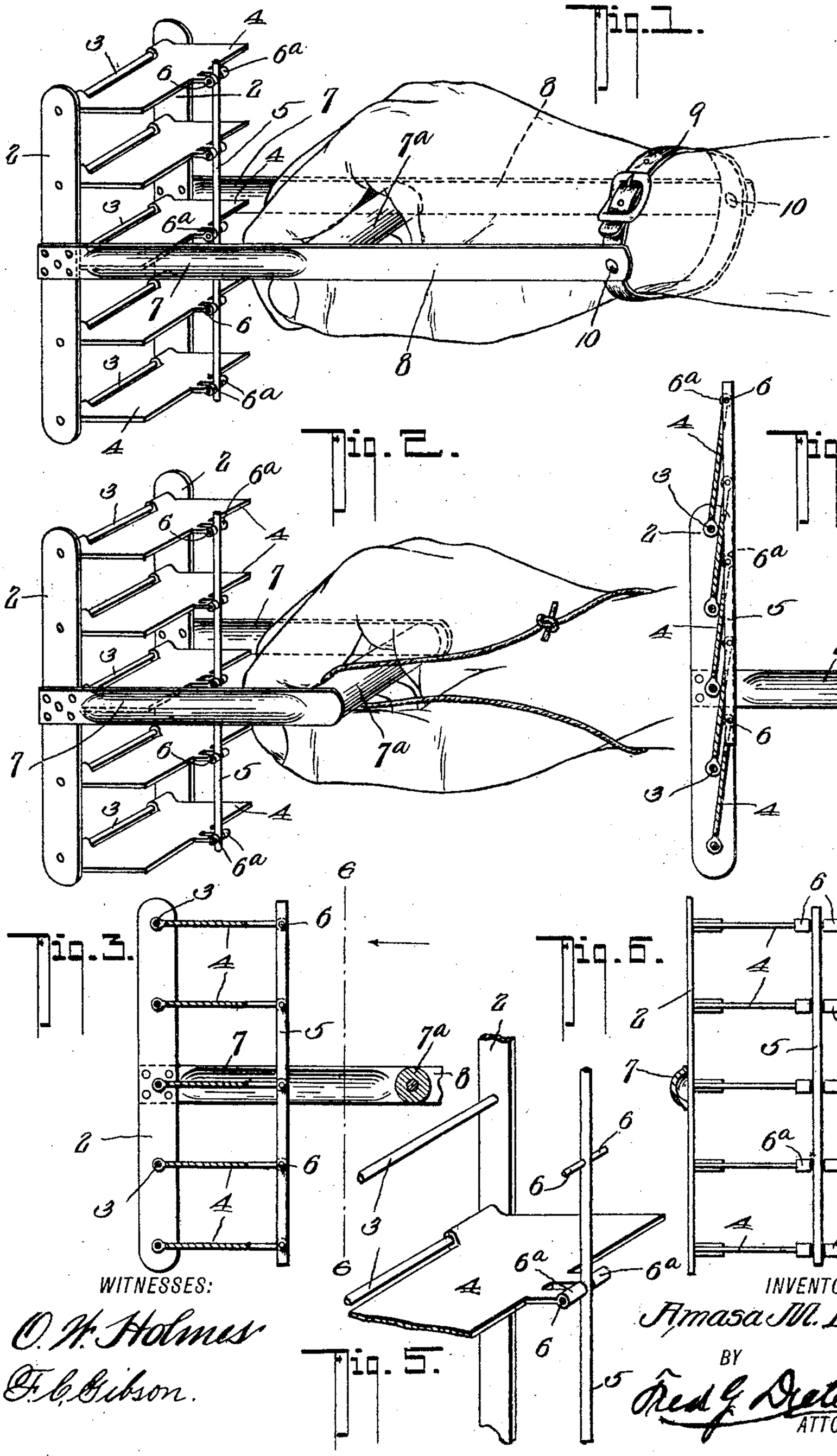

Fig. 2.

Fig. 4.

Fig. 3.

Fig. 5.

Fig. 6.

WITNESSES:

O. W. Holmes

F. C. Gibson.

INVENTOR

Amasa M. Bullock

BY

Fred G. Dieterich

ATTORNEY

UNITED STATES PATENT OFFICE.

AMASA M. BULLOCK, OF VANCOUVER, CANADA.

SWIMMING APPLIANCE.

No. 805,526. Specification of Letters Patent. Patented Nov. 28, 1905.

Original application filed October 18, 1904, Serial No. 228,965. Divided and this application filed February 21, 1905. Serial No. 246,719.

To all whom it may concern:

Be it known that I, AMASA M. BULLOCK, residing at Vancouver, in the Province of British Columbia and Dominion of Canada, have invented a new and Improved Swimming Appliance, of which the following is a specification.

This invention is in the nature of a simple, economically-constructed, and easily-manipulated means, applicable to the body of a swimmer to facilitate his progress and maintain his staying power in the water.

This application, which is a division of my copending application, Serial No. 228,965, filed October 18, 1904, more especially seeks to provide a means of the character stated particularly designed for being used by or being attached to the arms of the swimmer, and it comprehends the peculiar construction and arrangement of parts hereinafter described, pointed out in the appended claims, and illustrated in the accompanying drawings, in which—

Figure 1 is a perspective view of my invention, showing the manner of firmly attaching it to the forearm of the swimmer. Fig. 2 is a similar view of a slightly-modified arrangement of the said invention, hereinafter especially referred to. Fig. 3 is a vertical longitudinal section of my invention. Fig. 4 is a similar view showing the vane folded up. Fig. 5 is a detail view of a portion of one of the vanes and its connection with the frame and the link-rod, and Fig. 6 is a transverse section on the line 6 6 of Fig. 3 looking in the direction of the arrow.

In the present construction of my invention, as generally set out in my copending application before referred to, the appliance is especially arranged to be used by the hands of the swimmer, and in its preferred form, as shown in Fig. 1, it comprises an open rectangular framework essentially composed of the two side members 2 2, held separated, as desired, by the distance or cross rods 3, riveted or otherwise secured to the side members 2 2 and also forming the hinge-pin to which the vanes 4 4 are pivotally connected, the connection being such to allow the said vanes to swing up or down. The free ends of the several vanes 4 are pivotally connected to a light wire rod 5 by the small cross-pins 6 6, (see Fig. 5,) that engage ears 6^a 6^a on the vane edges and the rod, as shown, and the said pivotal connection of the vane with the rod 5 is such that the rod or stem 5 will not interfere with the movement of the vanes in either the up or down direction in assuming the closed position.

At about the middle of the side members 2 is fixedly attached a handle composed of the parallel side members 7 7 and the tubular cross or handle bar 7^a, that joins the members 7 7, said bar 7^a being made tubular, so as to impart sufficient buoyancy to sustain the weight of the appliance when immersed. In the preferred form the side members 7 7 are extended rearwardly beyond the handle 7^a to form guards or braces 8 8 to straddle the wrist or forearm, and to the ends of the braces 8 8 is secured by the pins 10 a strap 9, adapted to take around and be firmly secured to the forearm, as clearly indicated in Fig. 1.

In Fig. 2 I have shown the braces or guards omitted, and in that form the appliance may be attached to the wrist by a thong or cord, as shown.

By reason of the vanes 4 4 being disposed horizontally and arranged to swing in either direction their weight will tend to close them and as they turn freely the user, when swimming on his back, can use the appliance equally as well as when in the other position.

From the foregoing, taken in connection with the accompanying drawings, the manner in which my device is used and its advantages are believed to be apparent.

In using the form shown in Fig. 2 the handle 7^a is merely grasped with the vane-frame projecting in front, and the arms are thrown forward for the stroke with a slight outward curve and then drawn back with a full-length stroke of the arm past the body, the handle being allowed to slip in the hand during the stroke. Where the handle-frame is provided with the backward extension, the frame being secured to the forearm, the arms are merely thrust forward and drawn directly back as far as the chest, with which movement, although the stroke is limited, a more effective use is made of the powerful arm and shoulder muscles.

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

1. A swimming device, which comprises a rectangular frame, a series of vanes pivotally secured in the said frame, disposed transversely thereof and adapted to swing in either direction to close against each other, and a handle-frame projected rearwardly from and

secured to the rectangular frame for the purposes specified.

2. A swimming device comprising an open frame, a series of light vanes hinged therein and extended across the open frame, and opening to one side and a handle secured to the frame and extended therefrom in the direction to which the vanes open, as set forth.

3. As a swimming device; a rectangular open frame having a series of parallel hinged vanes across it closing approximately onto the edge plane of the frame, a handle-frame secured to the open framework and having a backward extension beyond the handle, and means for attaching the backwardly-extended portion to the forearm of a swimmer.

4. As a swimming device; a rectangular open frame having a series of parallel hinged vanes across it, the width of each vane being greater than the distance between the hinges, a buoyant handle-frame secured to the open framework the side members of which handle-frame extend beyond the handle from the frame, and a strap pivotally connected to the ends of such extensions and adapted to encircle the forearm.

5. As a swimming device; an open rectangular frame having a series of light hinged vanes across it opening to one side, and a handle secured to the frame on the side toward which the vanes open.

6. A swimming device comprising an open rectangular frame, a series of light vanes hinged at one edge therefrom in said frame to close flatwise against each other, a rod connecting the free edge of said vanes to permit the vanes moving to either side of the horizontal, and means extending rearwardly from said frame for being attached to the arm of the swimmer, said means having a portion to be grasped by the hand of the swimmer.

7. A swimming device comprising an open frame, a series of light vanes hinged therein and extending across the frame, said vanes opening to one side, a rod connecting the free edge of said vanes so that the vanes move in unison to either side of the horizontal, and a handle secured to the frame and extending therefrom in a direction at approximately right angles to the plane of the closed vanes.

AMASA M. BULLOCK.

Witnesses:

ROWLAND BRITTAIN,

FREDA QUINN.