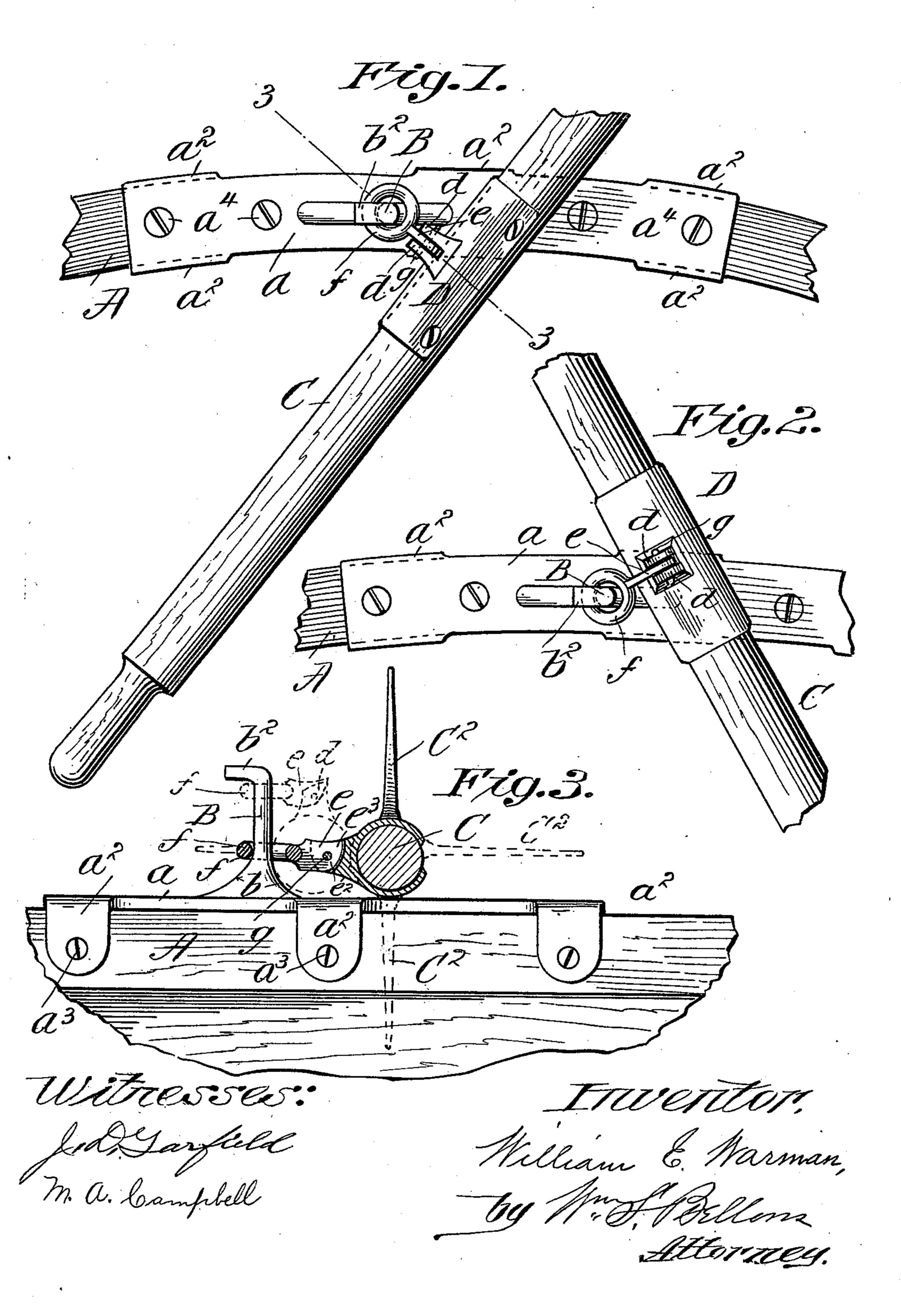
W. E. WARMAN. OAR LOCK.

(Application filed Oct. 27, 1899.)

(No Model.)



United States Patent Office.

WILLIAM E. WARMAN, OF WESTFIELD, MASSACHUSETTS, ASSIGNOR OF ONE-HALF TO JAMES B. ATWATER AND JOHN BOYLE.

OAR-LOCK.

SPECIFICATION forming part of Letters Patent No. 652,728, dated June 26, 1900.

Application filed October 27, 1899. Serial No. 734,923. (No model.)

To all whom it may concern:

Be it known that I, WILLIAM E. WARMAN, a citizen of the United States of America, and a resident of Westfield, in the county of Hamp-5 den and State of Massachusetts, have invented certain new and useful Improvements in Oar-Locks, of which the following is a full, clear,

and exact description.

This invention relates to a novel construc-10 tion of oar-lock, one object of which is to provide an oar-lock which is of a simple, practical, desirable, and acceptable construction and which will be engaged with an appliance or abutment provided on the rail of the boat, 15 which will render the displacement of the oar from its working engagement with such abutment impossible in the ordinary action of rowing, but which will, however, permit the disconnection of the oar purposely, as desired; 20 and another object is to freely permit in rowing the feathering action of the oar on the recovery and to prevent on the working stroke of the oar any tendency of the latter to so turn as to result in "catching a crab," as a 25 buckling of the oar by engagement with the water in its movement after the working stroke is termed.

The invention consists in an oar-lock constructed as hereinafter described, in conjunc-30 tion with the accompanying drawings, and set

forth in the claims.

In the drawings, Figure 1 is a plan view of a portion of the rail of a boat and of the handle end of the oar, both parts being equipped 35 with the appliances or devices which constitute the oar-lock, the oar being shown as in its position in readiness to make a rowing stroke. Fig. 2 is a view similar to Fig. 1, but showing the oar as in its position at the end 40 of the rowing stroke and partially turned axially or feathered, in readiness for the recovery or regaining the position in readiness to make a new stroke. Fig. 3 is an elevation as seen at the inner side of the rail of the boat, 45 showing the upstanding abutment thereon and showing the oar and the equipments thereof which constitute the oar-lock in cross-section as taken on the line 3 3, Fig.1. This view also indicates by dotted lines the 50 changed position of the novel parts and the oar when the latter is feathered.

Similar characters of reference indicate cor-

responding parts in all of the views.

In the drawings, A represents the rail or gunwale of a boat, secured on the upper edge 55 of which is the plate or bushing-piece a, having depending ear-lugs a^2 extending down on opposite sides of the rail and secured thereto by the screws a^3 , screws a^4 also passing down through the top of said plate into the rail, 60 and said plate provided with the upstanding abutment or post B, which from at about its bottom is tapered upwardly, as indicated at b, and this abutment-post at its top is provided with the angularly-turned shoulder or 65 lug member b^2 .

C represents the oar, of which in Fig. 1 the blade is not shown, the blade being, however, indicated by C2 in Fig. 3. The oar, at its portion which works at the rail of the boat, is 70 provided with the clip or encircling metallic collar D, which is secured thereto by screws, rivets, or any other suitable fastening and which is provided with the ear-lugs $d \bar{d}$, entering between and pivoted in which is the 75 flat shank or tongue e, which is formed as a part of the ring or eye f, which is adapted to be engaged with the post B, as may readily be done by holding the oar above the post, with the eye in a pendent position, and mov- 80 ing the oar bodily, so that the eye passes along the said member b^2 , and then turning the oar into its normal position in readiness for rowing, so that the eye may encircle the vertical part of the post.

g represents the pivot connecting the shank e for a swinging movement in the earpieces. The inner end portion of the shank e, at one side of the pivot, is rounded, as indicated at e^2 in Fig. 3, while the inner portion of the 90 shank, opposite the rounded portion, is constructed in the form of an extended toe or shoulder. This formation permits the turning of the oar about a quarter of a rotation in one direction for feathering, but prevents 95 the oar being turned opposite to the feather-

ing direction at all times. With the handle end of the oar swung aft in readiness for the stroke and the blade being vertical, as indicated in Fig. 1 and in the 100 full lines in Fig. 2, the rowing stroke may be performed in the customary manner. As the

oar reaches the end of the stroke the oar-lock will by its construction impart a natural tendency to turn the oar in the feathering direction, which tendency is in part occasioned by 5 the rising of the eye f to the position indicated in dotted lines in Fig. 3. The rising movement of the eye will usually transpire because there is a leverage action exerted on the portion of the oar next outside of the articulated parts comprised in this oar-lock by reason of the contact of this portion of the oar, which is downwardly inclined into the water, against the outer edge of the gunwale.

The oars may be left in their engagement 15 with the oar-locks when a person in the boat may not wish to row without liability of their becoming lost or getting afloat, although when desired the oars may be readily displaced from their engagements with the abutment-20 posts by operations the reverse of those stated for effecting the engagements.

While the present improved oar-lock is designed for general use by oarsmen, the same will be found of unusual advantage for use

25 by novices.

Persons unskilled in rowing will, it is believed, more readily acquire an even, steady, and good rowing stroke than would be the case were they to use the ordinary oar-lock.

I am aware that it is not new to articulate an oar to an abutment or fixed appliance at the edge of the rail, and such I do not claim; but, Having thus described my invention, what

I claim, and desire to secure by Letters Pat-

35 ent, is-

upstanding abutment member B to be provided rigidly on the rail of the boat, of a clip or appliance to be provided on the oar, hav-40 ing, pivotally connected thereto, an eyeformed member the eye of which loosely encircles and engages said upstanding abutment.

2. In an oar-lock, the combination with the 45 abutment-post B having the angularly-turned

upper end portion b^2 , of a part to be secured to the oar comprising an ear lug or lugs, and an eye having an extension, pivotally connected to the ear-lugs, and said eye being adapted to loosely encircle and engage said 50 upstanding abutment.

3. In an oar-lock, the combination with a part to be secured to the oar comprising an ear lug or lugs, and an eye having an extension pivotally connected to the lug, of a part 55 to be secured to the rail of the boat with which

said eye may be engaged.

4. In an oar-lock, the combination with the oar, of the clip having the ear-lugs, the eye having the flat shank which is pivotally con- 60 nected within said ear-lugs and which has its inner end portion e^8 at one side of the pivot extended to constitute a limiting-abutment, substantially as and for the purpose set forth.

5. In an oar-lock, the combination with the 65 plate a having the depending portions $a^2 a^2$ to be fitted over and about, and to be secured to the rail of the boat, and provided with the upstanding rigid post b having the angular upper end lug, of a clip to be secured on the 70 oar having pivotally connected thereto an eyeformed member which by the eye thereof has a loose encircling engagement about said post, substantially as described.

6. The boat-rail having secured thereon the 75 plate a provided with the upstanding post b having the angularly-turned lug b2 at its upper end, of the oar provided with the metallic clip D having the ear-lugs d d, and the ring-eye f having a flat shank extension e piv- 80 1. In an oar-lock, the combination with an | oted in said ear-lugs and having one inner corner thereof rounded and the other extended to constitute the limiting-abutment e^2 , all

substantially as described.

Signed by me at Westfield, Massachusetts, 85 this 19th day of October, 1899.

WILLIAM E. WARMAN.

Witnesses:

HENRY FULLER, OLIVE C. TOWLE.