(No Model.)

D. G WEEMS.

Oyster Float.

No. 237,351. **Patented Feb. 1, 1881.**

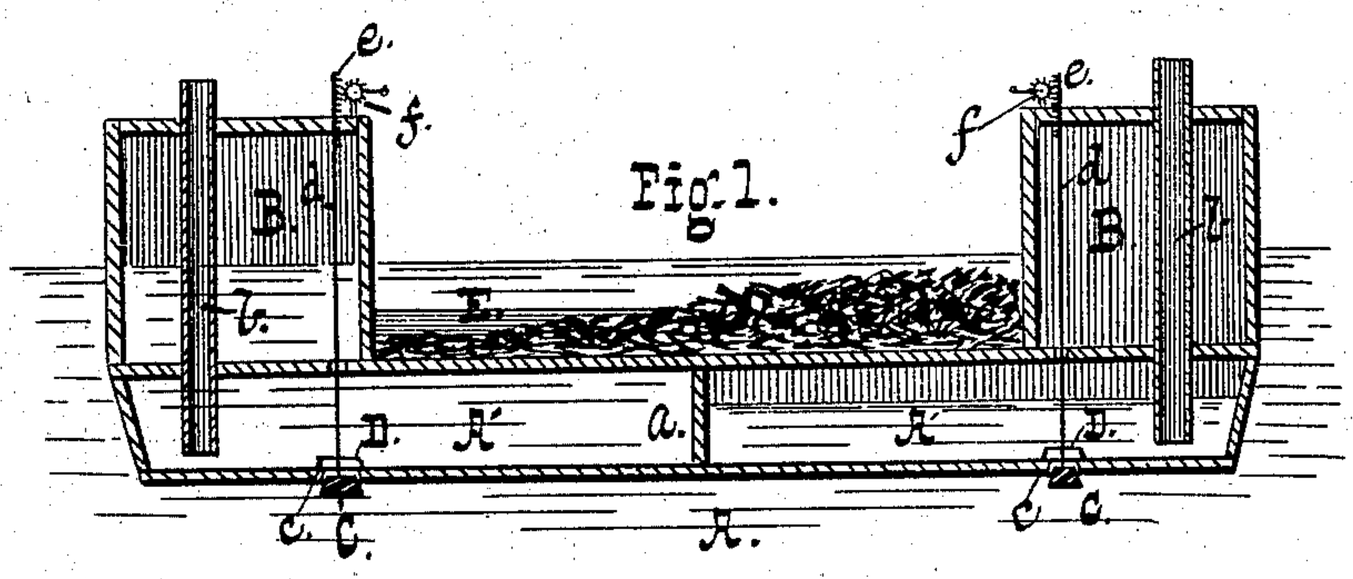
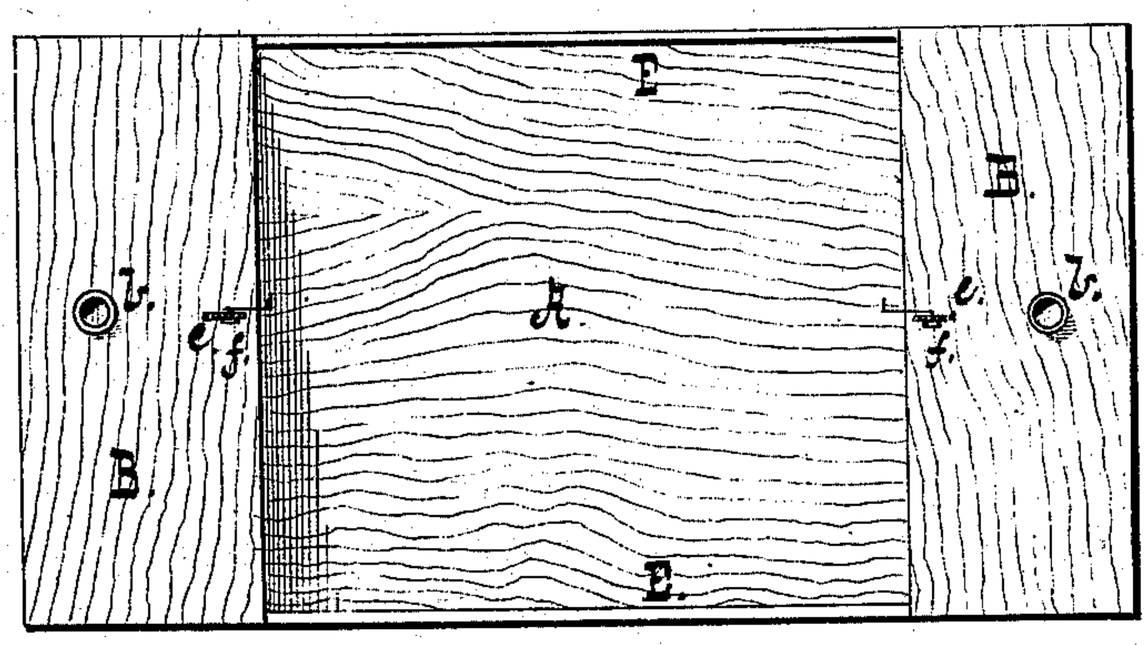


Fig. 1.

Fig. 2.



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UNITED STATES PATENT OFFICE.

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OYSTER-FLOAT.

SPECIFICATION forming part of Letters Patent No. 237,351, dated February 1, 1881.

Application filed December 7, 1880. (No model.)

To all whom it may concern:

Be it known that I, DAVID G. WEEMS, of Baltimore city, State of Maryland, have invented certain new and useful Improvements in Oyster-Floats; and I hereby declare the same to be fully, clearly, and exactly described as follows, reference being had to the accompanying drawings, in which—

Figure 1 is a central vertical sectional view of a device embodying my present invention, and Fig. 2 is a plan view of the same.

My invention has reference to what are technically known as "oyster-floats," consisting, essentially, of submersible scows or floats provided with means for raising them at will.

Heretofore devices of this kind have generally been constructed in the form of rectangular flat-bottomed scows having water-inlet valves and pumps, or, in lieu thereof, a series of pontons and mechanism for raising them with reference to the scow. In either case the device is open to the objection that, as the load of oysters is a deck-load, considerable handling is necessary in the matter of trimming the craft to prevent her from capsizing in deep water.

The object of my invention is to construct an oyster-float in such manner that the requisite trimming is readily and expeditiously accomplished by the addition to, or removal from, the hold of a quantity of water ballast, and by raising the metacenter of the craft by providing her with a pair or more of stationary air-chambers above the normal water-line when light, but partly below it when the craft is laden.

An important feature of my invention consists in the fact that an ordinary scow may be readily and cheaply converted into an improved oyster-float of my design.

In the accompanying drawings, A is a scow or float, by preference rectangular in horizontal section, and subdivided transversely (and, if desired, longitudinally also) into compartments A′ by a partition, *a*. At either end (and, if desired, at either side) is an air-chamber, B, having a pipe, *b*, leading to the bottom of the hold. Openings *c* are formed in the bottom of the scow A, in which fit plugs or valves C, having elastic washers, the openings *c* being, by preference, bushed with metal. Rods *d* serve to lower or raise the valves C through the medium of racks *e* and cranked pinions *f*, and pass through guides D, as shown. E is the freeboard, of any convenient height.

In practice, the scow is laden with a deck-load of oysters, and is then towed to the fattening-grounds, where the scow is caused to sink to a point deep enough to submerge the oysters, this being effected by opening the valves C.

The tanks or chambers B are made of sufficient capacity to float the craft with the oysters submerged, as shown in the drawings, Fig. 1, and any preponderance of weight near one end of the scow is compensated for by simply letting a greater quantity of water into the farther compartment than into that nearer the main bulk of cargo.

When the operation of fattening is complete the compartments are pumped out by means of ordinary pistons, which are operated in the pipes *b*, and the scow is towed away.

The peculiar feature of my invention consists in making the scow in separate compartments, admitting of the craft being maintained truly horizontal, whether floating in deep water or partially submerged, or resting with one side or end on the bottom. Obviously each compartment, be they two or more in number, must be provided with means for letting in and discharging water.

What I claim is—

1. An oyster-float consisting of a scow having freeboard E, and internal partition subdividing it into compartments, the said compartments being provided with pipes arranged to extend to the surface when the scow is submerged, and means for discharging water.

2. In combination with the subdivided scow having free-board, the air-chambers B, pipes *b*, and means for discharging and admitting of the entrance of water, as set forth.

3. In combination with the scow, subdivided as described, and having free-board E, the valved openings *c*, rods *d*, and operating mechanism, as set forth.

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