(No Model.) 2 Sheets—Sheet 1

A. HENRY.

LIFE BOAT.

No. 602,684. Patented Apr. 19, 1898.

Fig. 1

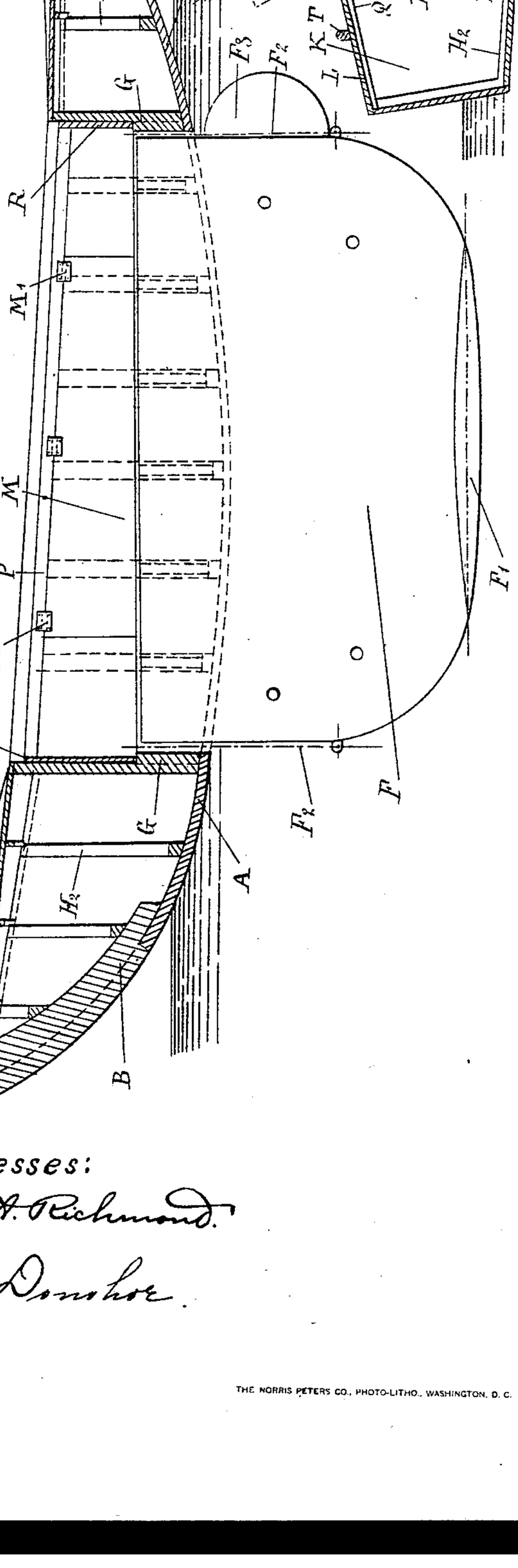

Fig. 2

Witnesses:
Jas. A. Richmond.
A. L. Donohoe.

Inventor:
Albert Henry
by G. Dittmar
Attorney

(No Model.) 2 Sheets—Sheet 2.

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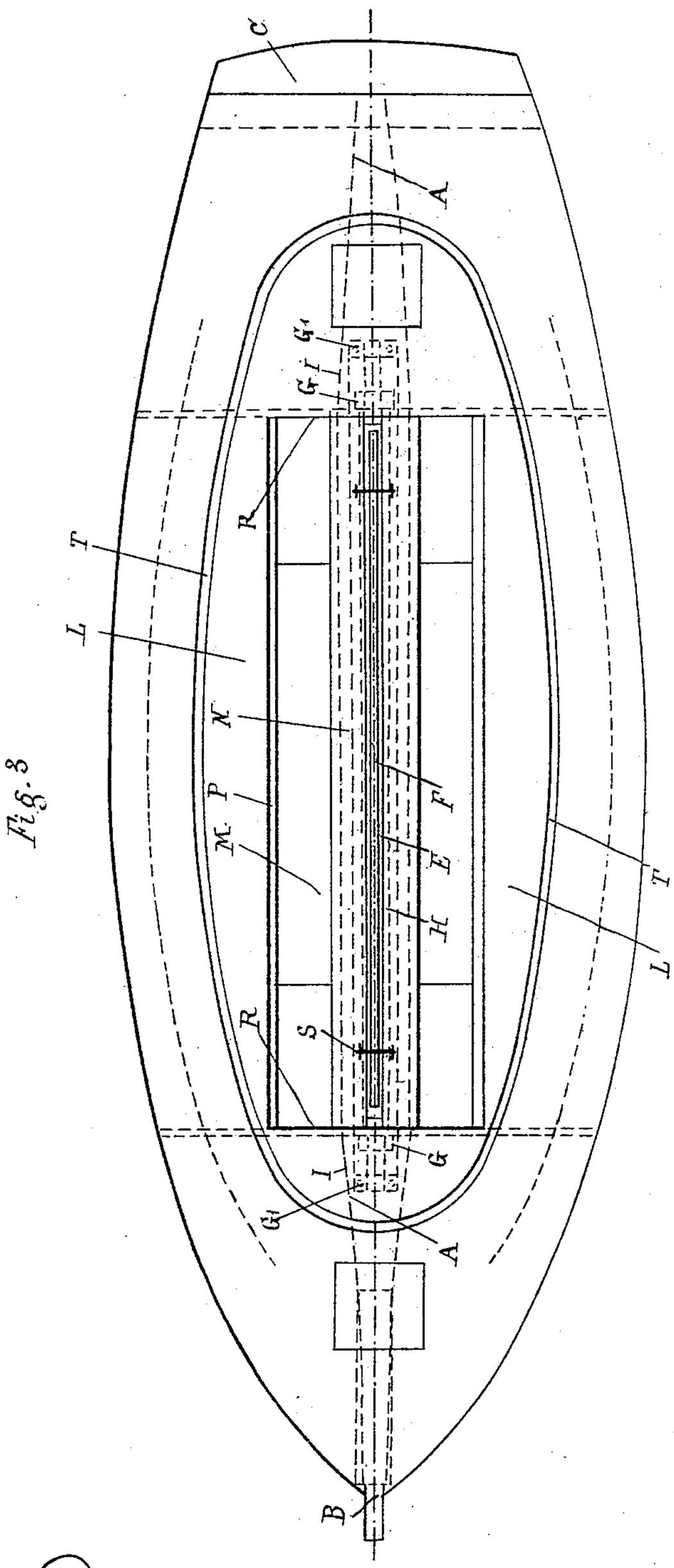

Fig. 3.

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Inventor:
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UNITED STATES PATENT OFFICE.

ALBERT HENRY, OF ROCHEFORT, FRANCE.

LIFE-BOAT.

SPECIFICATION forming part of Letters Patent No. 602,684, dated April 19, 1898.

Application filed October 8, 1897. Serial No. 654,591. (No model.)

To all whom it may concern:

Be it known that I, ALBERT HENRY, a citizen of the French Republic, residing at Rochefort-sur-Mer, France, have invented certain new and useful Improvements in Life-Boats; and I do hereby 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.

The present invention relates to a boat which, by reason of its peculiar construction, is absolutely proof against being upset or of being submerged. This boat frees itself quickly of all water no matter how much be thrown inside, and this is effected by a chamber having an opening or well for a centerboard. Thus the water being in communication with the surface on which the boat floats will always sink down to the same level. The space in which persons using the boat take their seats is formed by the walls of two air-tight compartments placed at either side of the centerboard. When a heavy sea washes over the boat, the level of the water inside and outside of the same is soon established and the boat tends to rise up by virture of the ascending power transmitted from the air-tight compartments, into which the water cannot penetrate.

The boat is made proof against upsetting by means of a centerboard, which is movable in its casing and which by means of its weight and its draft holds the pressure of the wind on the sails in equilibrium. The resistance of the centerboard against any displacement in a direction at right angles to the course of the boat, aided by the resistance which the water-tight compartments offer against sinking, causes the boat to right itself when the wind tends to careen it. The use of the inner open space with the well for the centerboard is principally of advantage for small craft, as pleasure-boats, fishing-skiffs, lifeboats, &c.

In the construction flat-bottom boats are preferable, having only a small draft in the water, such as a sharpee, which is usually employed for pleasure-boats. In the accompanying drawings one of these latter boats is represented as provided with an open space and a guide-opening for the centerboard.

Figure 1 is a longitudinal section through a boat. Fig. 2 is a cross-section. Fig. 3 is a plan view.

The bottom A is formed by a board of medium thickness, which is connected in front to the stem B and in the rear to a heel C. A slot D is formed in the bottom having a rectangular shape, and the walls of the well for the centerboard F form, with the bottom, a tight joint. The well is of sufficient width to allow the water to pass at each side of the centerboard F. The cross-walls of the slot are formed by two studs or posts G, secured to the bottom and running up to the deck, which they carry. On each side of the studs G an offset is formed, upon which the side walls H of the well are secured. Besides, these latter are steadied by corner-pieces H′, which are secured to the rib-timbers H^2 of the boat. The side walls H run down through the opening D in the bottom A, being flush with the under side of the bottom, where straps of iron I are employed to cover the joint and to make it water-tight. These iron straps have their ends sunk into the bottom, so as to be flush with the same, and cross-ties G connect the ends, so as to form a rigid frame. Thus the bottom is protected against splitting should it receive violent concussions by grounding, &c.

The water-tight compartments K are provided on either side of the well and are formed on one side by the boarding of bottom and side of the boat and the side walls H of the well and on the top by a deck L and the sides M of the open space. Said sides M are connected to the bottom N, rising on the top of the well and being supported by the side walls H and brackets N′, secured to the corner-pieces H′. The bottom N of the open space is provided with flanges N^2, affording a secure bearing and support for the sides M. The latter are preferably made in plates connected by hinges M′ to a strip P on the beams Q of the deck, so that the sides M may be turned to afford access to the interior of the water-tight compartments.

The cross-partitions R of the compartment K take up the whole width of the boat and support the compartments completely over the spaces fore and aft. Openings may be provided in these cross-partitions to give access to the compartments in the front and rear.

The centerboard F is formed by a plate of sheet metal having sufficient weight and surface to counterbalance the pressure of the wind on the sails. If necessary, this plate can be provided at its lower edge with a cigar-shaped body F′, of lead or other metal, made in two parts and riveted or bolted to the sheet-metal plate. If bolted on the same, it is easy to remove the centerboard completely. When riveted together, it can be raised until the part F′ touches the bottom A of the boat. The centerboard can be handled by means of two flexible cables or ropes F^2, one at each end, which may be turned up by means of a windlass or otherwise. To prevent the centerboard from being displaced, it is supported on the top of the well by means of two cross-pieces S, secured in strong rings projecting from the bottom N. The centerboard can be made in one or several parts, and its shape may vary according to the kind of boat for which it is employed.

The rudder F^3 is preferably secured to the centerboard, but in such a manner that it can be swung around against it in order to allow the removal of the centerboard from the well.

The deck L may be rounded to facilitate the flowing off of the water, and it may be provided with a rail T to give it the aspect of an ordinary pleasure-boat. Benches may be provided in the open space, or the deck may be provided with seats for the accommodation of passengers.

Having thus described my invention, I claim—

A boat of the class described, having a well for a centerboard in communication with an open space inclosed by water-tight compartments on each side of the well, adapted to allow the water falling into the open space to run out through the well, in combination with a centerboard having at the bottom a weight formed by a metallic body in the shape of a cigar and having a rudder suitably hinged at its end, said rudder adapted to close against the side of the centerboard and to allow of the withdrawal of the latter substantially as described.

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

ALBERT HENRY.

Witnesses:

O. CAILLEAUD,

AD. A. MCCULL.