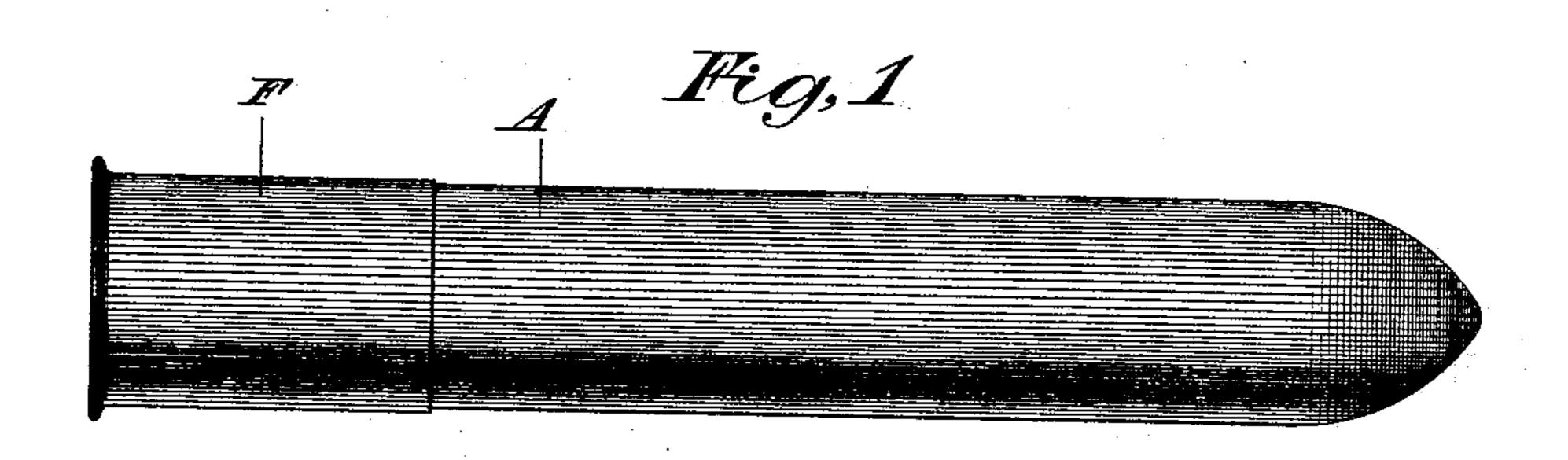
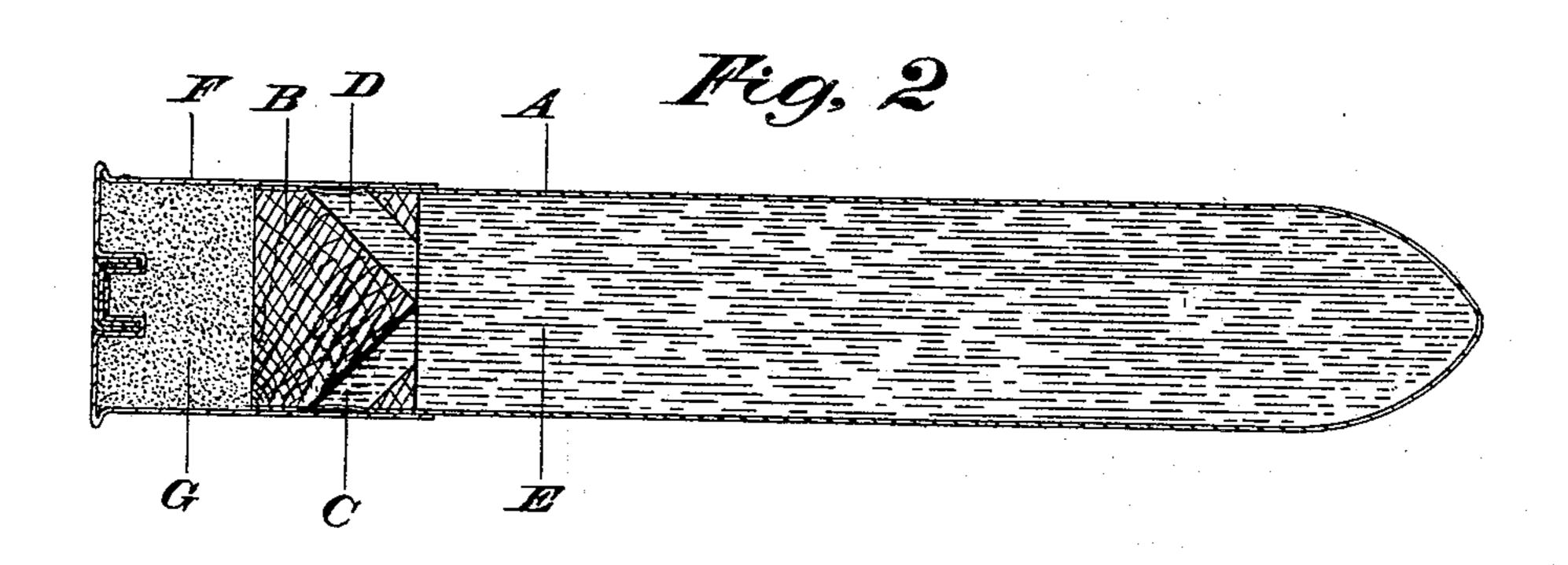
(No Model.)

## A. H. WALKER. SEA OILING CARTRIDGE.

No. 409,886.

Patented Aug. 27, 1889.





Witnesses, C. E. Buchtair. Harry R. Williams.

Freeerstor Whit & Maken

## United States Patent Office.

ALBERT H. WALKER, OF HARTFORD, CONNECTICUT.

## SEA-OILING CARTRIDGE.

SPECIFICATION forming part of Letters Patent No. 409,886, dated August 27, 1889.

Application filed April 17, 1888. Serial No. 270,942. (No model.)

To all whom it may concern:

Be it known that I, Albert H. Walker, of Hartford, Connecticut, have invented a new and useful Sea-Oiling Cartridge, of which the following description and claims constitute the specification, and which is illustrated by the accompanying sheet of drawings.

This cartridge contains a projectile which contains oil, and which projectile is open near its rearward end, except when that end is covered by the forward part of the outer shell of the cartridge.

Figure 1 of the drawings is an exterior view of this cartridge. Fig. 2 is a central longitudinal section of the cartridge of Fig. 1.

The letter A indicates the shell of the projectile.

The letter B indicates the base of the projectile, which base is preferably a cylindrical block of wood or paper, having less specific gravity than oil, and is preferably driven entirely and firmly into the rearward end of the shell A. One or more rearward openings C and D pass from the oil-chamber E to the rearward exterior of the projectile, and preferably pass diagonally through both the shell A and the base-block B.

The cartridge-shell F, containing the powder-chamber G, is constructed in all respects like well-known cartridge-shells of warfare. While the projectile is held in the cartridge-shell the forward part of that shell hermetically closes the outward ends of the openings C and D; but when the projectile leaves the

gun-barrel those openings are uncovered and 35 remain so thereafter.

I claim as my invention—

1. A sea-oiling cartridge consisting of a projectile containing oil and having one or more unobstructed rearward circumferential open-40 ings from the interior to the exterior thereof, combined with a cartridge-shell containing powder and having the rearward end of the projectile inclosed and hermetically sealed by the forward part of the cylindrical walls 45 of the cartridge-shell, all substantially as described.

2. A sea-oiling cartridge consisting of the shell A, provided with the block B and one or more unobstructed rearward circumferential openings C and D, and the oil-chamber E, in combination with the cartridge-shell F, provided with the powder-chamber G and closing the outward ends of those circumferential openings, all substantially as described. 55

3. The combination of a shell containing oil and having one or more unobstructed rearward circumferential openings from the interior to the exterior thereof, with a shell covering those openings, but adapted to be held 60 back, and thus to uncover them, when the oil-shell is forced forward, all substantially as described.

Hartford, Connecticut, April 16, 1888.
ALBERT H. WALKER.

·
-

Witnesses:

HARRY R. WILLIAMS, HEMAN A. TYLER.