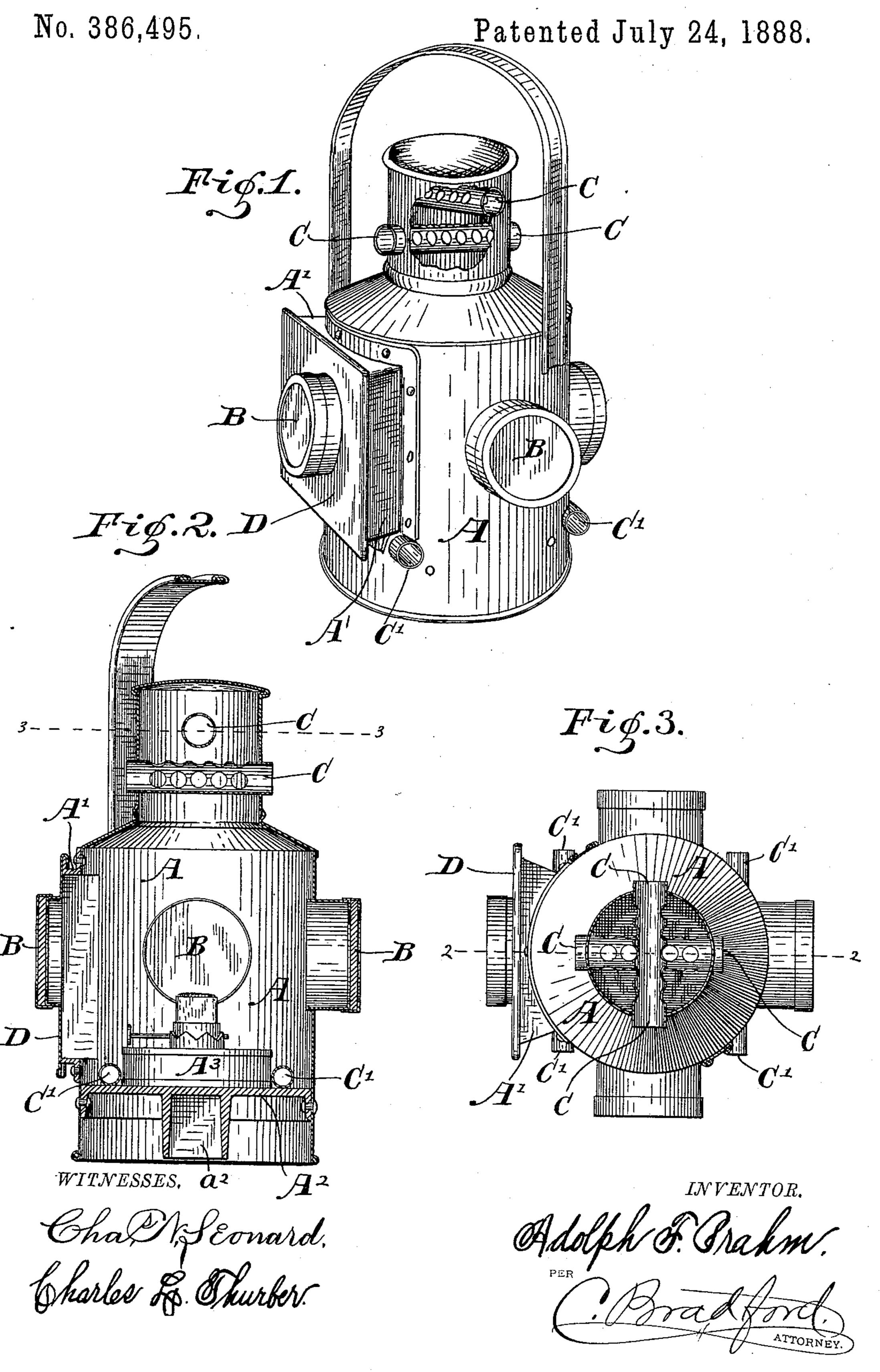
## A. F. PRAHM.

SIGNAL LAMP.



# UNITED STATES PATENT OFFICE.

#### ADOLPH F. PRAHM, OF INDIANAPOLIS, INDIANA.

#### SIGNAL-LAMP.

### SPECIFICATION forming part of Letters Patent No. 386,495, dated July 24, 1888.

Application filed August 1, 1887. Serial No. 245,846. (No model.)

To all whom it may concern:

Be it known that I, ADOLPH F. PRAHM, of the city of Indianapolis, county of Marion, and State of Indiana, have invented certain new 5 and useful Improvements in Signal-Lamps, of which the following is a specification.

The object of my invention is to provide efficient ventilation for signal-lamps, such as switch-lamps, carriage lamps, head-lights,&c., 10 or, indeed, almost any outdoor lamp; and it principally consists in providing horizontal tubes extending through portions of the lampcasing, which are in turn provided with holes for the passage of the air. By this means not 15 only is sufficient ventilation provided, but blasts of air on the flame of the lamp caused by wind are wholly excluded, while the ends of the tubes being open a convenient and effective means of cleaning them by the use of a 20 small brush provided for the purpose may be always at hand.

Referring to the accompanying drawings, which are made a part hereof, and on which similar letters of reference indicate similar 25 parts, Figure 1 is a perspective view of a lamp embodying my said invention, a portion of the casing being broken away to illustrate the invention more perfectly; Fig. 2, a tranverse vertical section of the lamp, and Fig. 3 a hori-30 zontal sectional view looking downwardly from the dotted line 3 3 in Fig. 2.

In said drawings, the portions marked A represent the casing of the lamp; B, the glasses to the lamp used in signaling; C C', the venti-35 lating-tubes, and D the door to the lamp.

The casing A is in general form not dissimilar to lamps already in use, being preferably a sheet-metal cylindrical casing with a reduced top, as shown. Holes are formed therein to 40 receive the ventilating tubes. Upon one side is attached a casting, A', having flanges to receive the door. The bottom is preferably formed of another easting, A2, which not only supports that portion of the lamp A3, which 45 contains the illuminating fluid, but is also provided with a socket,  $a^2$ , by which it may be secured upon the standard of the switch, or to whatever it is to be attached.

The glasses B, for switch-lamp purposes, are 50 preferably, as shown, and as usual, four in number, two of which are white and two red, as will be readily understood by those familiar with such matters. They are located in opposite sides of the lamp-casing, as usual, and I

as shown, the two of a corresponding color fac- 55 ing each other.

> The ventilating-tubes C extend in both directions through the reduced top of the lampcasing, and are provided inside said casing with numerous orifices, through which the hot 60 air from the interior of the lamp will escape. As they run in both directions, and as they are of equal diameter throughout, wind, when it enters them, will pass directly through without affecting the blaze of the lamp, and when 65 the openings get clogged with soot, as is frequently the case, a small cylindrical brush can be passed through them, and they can thus be cleaned quickly and effectually. Corresponding tubes, C', pass through the lower part of 7c the lamp structure, and are similarly provided with holes for the admission of air to the lamp, all as will be readily understood.

> The door D to the lamp is a plain slide-door formed of sheet metal, having flanges which 75 engage with the flanges on the casting A' on one side of the lamp. Its center contains one of the glasses B. A sliding door having flanges which engage with slots or grooves is much superior for this purpose to a door hung on 80 hinges, as the latter frequently works loose and admits the wind or storm, which impairs or extinguishes the light, while a door formed as shown is always, when closed, perfectly tight, preventing any such result.

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

1. The combination, with a lantern-body, of ventilator-tubes arranged horizontally within 90 said body, said tubes being open at their ends to the outer air and having perforated walls, substantially as set forth.

2. The combination, in a lantern, with the casing thereof, of ventilator-tubes arranged 95 horizontally within said casing, a part of which cross the others, the ends of said tubes being open to the outer air and their walls being perforated, substantially as described, and for the purposes specified.

In witness whereof I have hereunto set my hand and seal, at Indianapolis, Indiana, this 27th day of July, A. D. 1887.

ADOLPH F. PRAHM. [L. s.]

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In presence of— C. Bradford, WM. GARSTANY.