

No. 708,593.

Patented Sept. 9, 1902.

P. F. SCHWEMLE & J. W. CASE.
LIGHTING AND HEATING DEVICE FOR VEHICLES.

(Application filed Feb. 15, 1902.)

(No Model.)

Fig. 1.

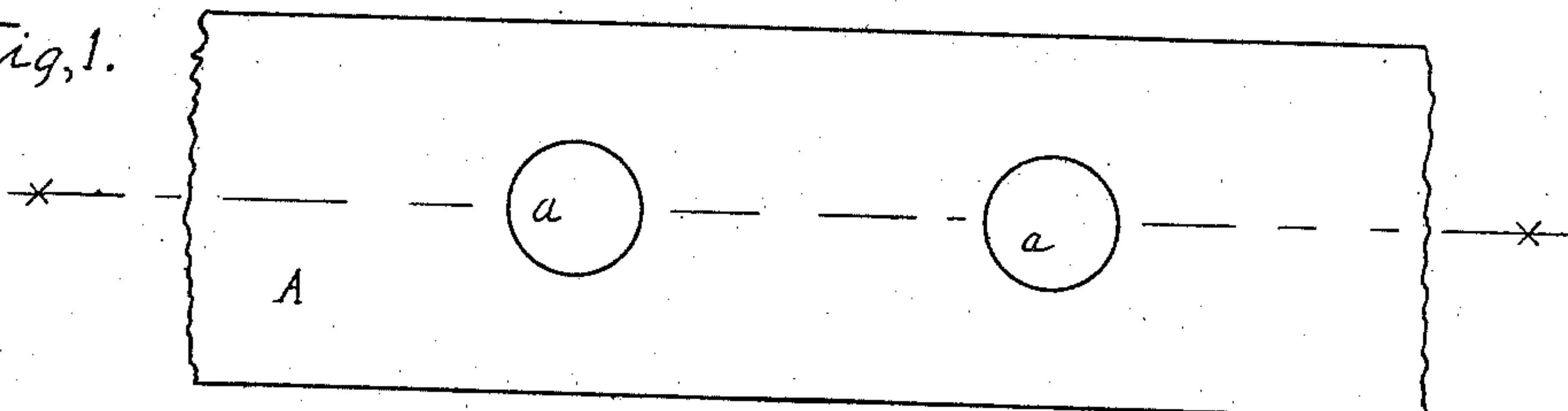


Fig. 2.

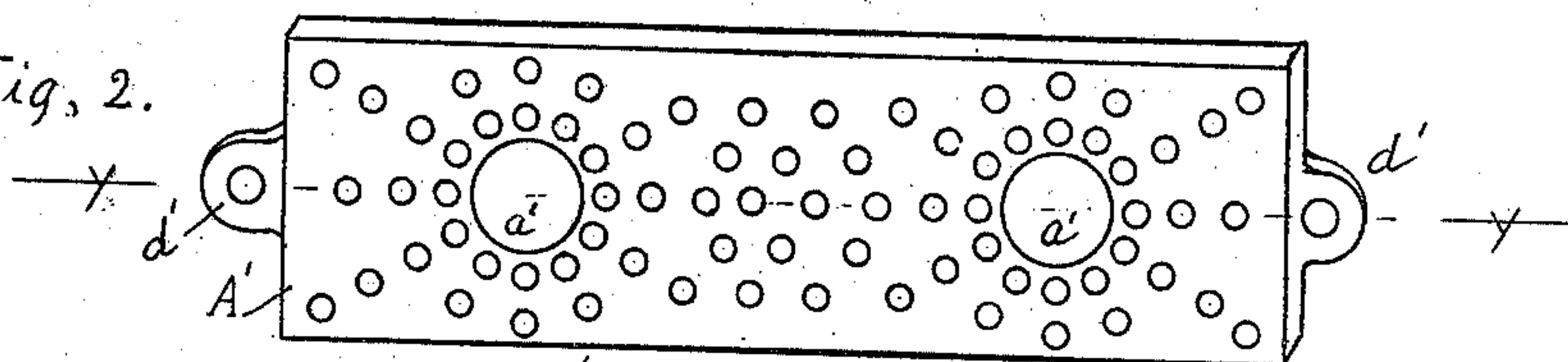


Fig. 3.

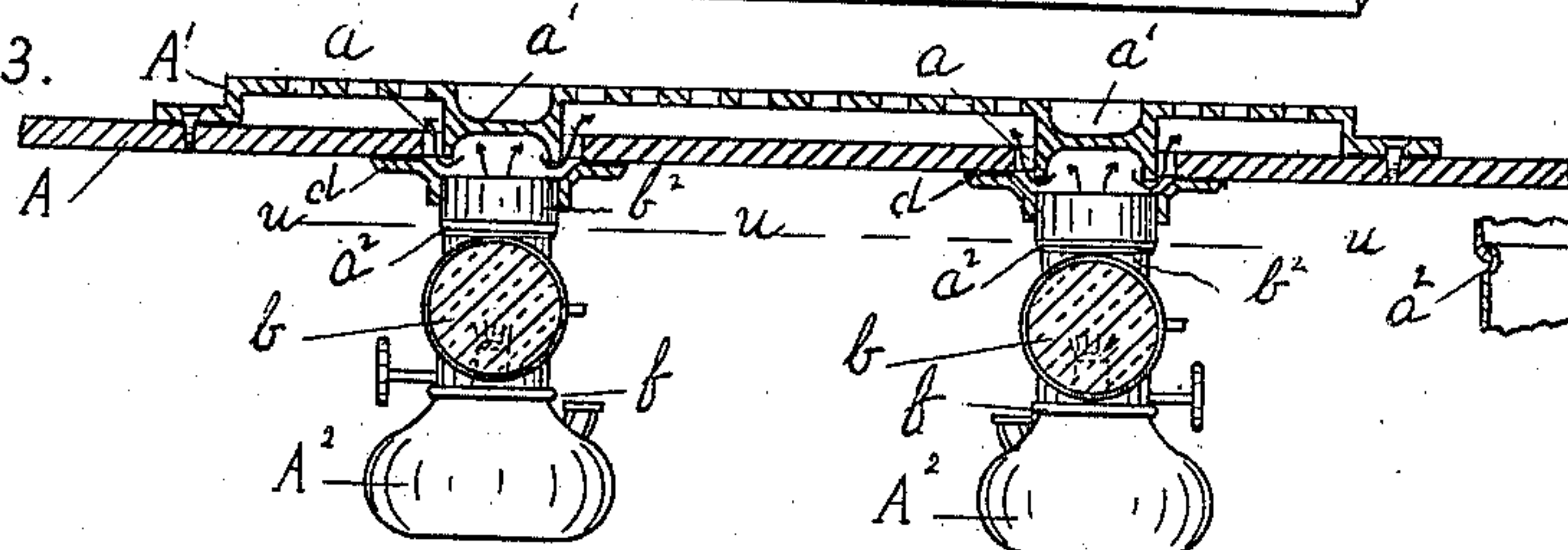


Fig. 4.

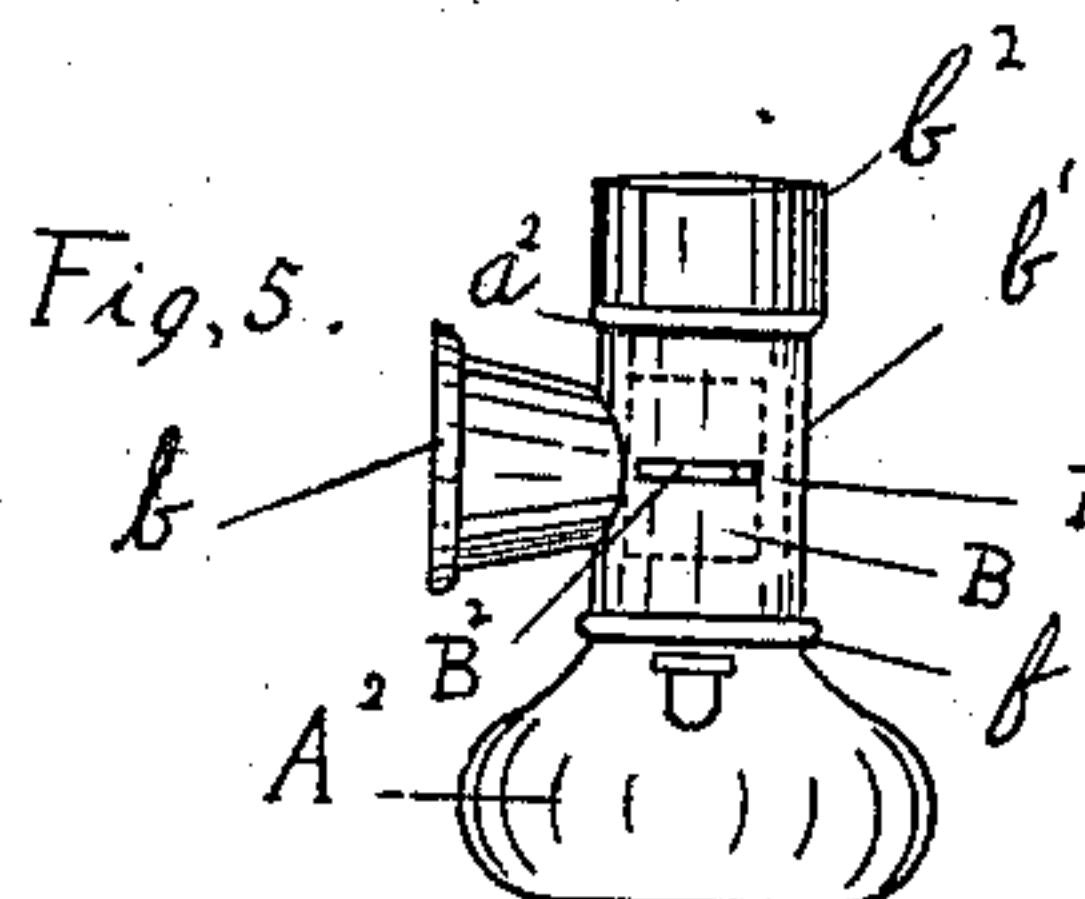
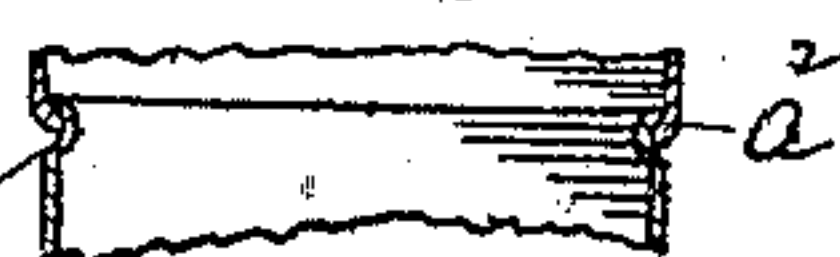
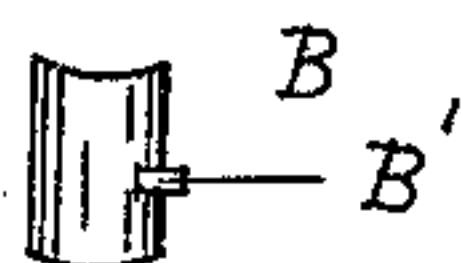


Fig. 6.



WITNESSES:

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PHILIPP F. SCHWEMLE AND JOHN W. CASE, OF JACKSON, MICHIGAN.

LIGHTING AND HEATING DEVICE FOR VEHICLES.

SPECIFICATION forming part of Letters Patent No. 708,593, dated September 9, 1902.

Application filed February 15, 1902. Serial No. 94,245. (No model.)

To all whom it may concern:

Be it known that we, PHILIPP F. SCHWEMLE and JOHN W. CASE, citizens of the United States, residing at Jackson, in the county of Jackson and State of Michigan, have invented a new and useful Improvement in Lighting and Heating Devices for Vehicles, of which the following is a specification.

Our invention relates to improvements in a lighting and heating device for vehicles in which the heat generated from a lamp containing oil or other fuel acts in conjunction with a heater; and the objects of our improvements are, first, to provide an adjustable rotating lamp; second, to provide a heater for the feet, and, third, to connect the lamp to the heater. We attain these objects by the mechanism illustrated and shown in the accompanying drawings, in which—

Figure 1 is a vertical fragmentary section of the floor of a vehicle. Fig. 2 is a vertical top elevation of a perforated heater. Fig. 3 is a longitudinal sectional elevation of the shell of the heater on lines $y y$, Fig. 2, and also a longitudinal sectional elevation of the floor of a vehicle on lines $x x$, Fig. 1. It also presents to view the lamps attached to the under side of the floor by supporting-rings, which are also shown in section. Fig. 4 is an enlarged fragmentary sectional elevation of the walls of the lamp on lines $u u$, Fig. 3, bringing to view the loose joint fashioned in the walls thereof. Fig. 5 is a lamp, showing a slot cut in the surrounding chimney for the free movement of a handle attached to a slide shown in the interior by dotted lines. A reflector is also represented by dotted lines. Fig. 6 is a slide adapted to shut off the light from the bull's-eye.

Similar letters refer to similar parts throughout the several views.

The fragmentary section A represents a portion of the floor of a vehicle, which is generally constructed of boards. Through these boards at any convenient place near to one's feet are cut the circular openings $a a$. These said openings are somewhat larger than the concaved cup-shaped radiators $a' a'$, so as to allow the larger portion of the heat from the lamps $A^2 A^2$ to escape through the said openings and underneath the perforated shell of

the heater A' . The lamps $A^2 A^2$ are supplied with a circular chimney b^2 , constructed with interlocking ends $a^3 a^3$, forming a loose joint. The top of said chimney is riveted to a circular flanged collar d . The openings in the base of said collar are of an area to correspond with the circular openings $a a$. The said lamps are also provided with a bull's-eye b and a reflector b' . (Shown in Fig. 5 by dotted lines.) The said chimney is also provided with a slide B and knob or handle B' . This said slide is arranged in the interior of the chimney, so that by pushing the knob which projects outwardly through the slot B^2 the said slide shuts off the light of the lamp from escaping through the bull's-eye. The lamps are placed centrally underneath the openings $a a$ and fastened firmly to the floor of the vehicle by means of screws through the flanged collar d . By the arrangement of the chimney as above described the bull's-eye can be turned in any desired direction to facilitate travel during the night, while during the day-time the light can be shut off from the same. The radiators $a' a'$ are placed centrally in the openings $a a$ and are confined therein by means of the lugs $d' d'$, through which a screw can be inserted into the floor of the vehicle. The heat from the lamps passes upwardly in the direction of the arrows, impinges against the walls of the radiators, is deflected in the direction of the arrows, passes upwardly outside the walls of the radiators through the openings $a a$ and into the perforated heater A, there to be utilized in giving warmth to the feet of the travelers. In the drawings two lamps and two radiators are shown, for the reason that generally two persons occupy a seat while traveling in a vehicle, and by the arrangement of two lamps and two radiators placed in the floor of the vehicle contiguous to the feet of said persons each one would receive the full benefit of the heat from the heater. It is obvious that in narrow-seated vehicles fashioned for one person a heater constructed with one radiator and requiring one lamp could be used with equal facility. The body of the lamp A^2 is detachably joined to the chimney b^2 at f by a screw-thread, spring, or any other well-known means.

Having described our invention, what we claim, and wish to secure by Letters Patent, is—

1. In a heating and lighting device for vehicles, the combination with a heater, adapted to be placed over an opening in the floor of a vehicle, of a lamp-chimney provided with a loose revoluble joint, the upper end of said chimney communicating with said opening, so that heat derived from a lamp communicating with the lower end of said chimney shall pass through the said opening and into said heater, substantially as described.

2. In a lighting and heating device for vehicles, the combination with a heater provided with a radiator, and adapted to be placed over an opening in the floor of a vehicle, of a lamp-chimney provided with a loose revoluble joint, the upper end of said chimney adapted to be placed contiguous to said radiator while the lower end of said chimney is adapted to support a lamp, substantially as described.

3. In a lighting and heating device for vehicles, the combination with a heater provided with a radiator and adapted to be placed over an opening in the floor of a vehicle, a lamp-chimney provided with a loose revoluble joint, the upper end of said chimney adapted to be placed contiguous to said opening so that the heat derived from a lamp

attached to the lower end of said chimney shall pass through said opening and into said heater, of a bull's-eye arranged in the lower half of said chimney and an adjustable slide, B, arranged in the interior of the chimney and adapted to shut off the light from the bull's-eye, substantially as described.

4. In a lighting and heating device for vehicles, the combination with the floor of a vehicle provided with an opening through said floor, a heater provided with a radiator placed over said opening, a lamp-chimney provided with a loose revoluble joint, the upper end of said chimney placed contiguous to said opening so that the heat from a lamp attached to the lower end of said chimney shall pass through said opening and into said heater, the lower part of said chimney provided with a bull's-eye, a slide arranged in the chimney to shut off the bull's-eye, and a reflector arranged in the chimney opposite the bull's-eye, substantially as described.

In testimony whereof we have signed our names to this specification in the presence of two subscribing witnesses.

PHILIPP F. SCHWEMLE.
JOHN W. CASE.

Witnesses:

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