No. 814,441. PATENTED MAR. 6, 1906.

H. C. GRADWOHL.

FLOOR DRAIN AND TRAP.

APPLICATION FILED JAN. 14, 1905.

Fig. I.

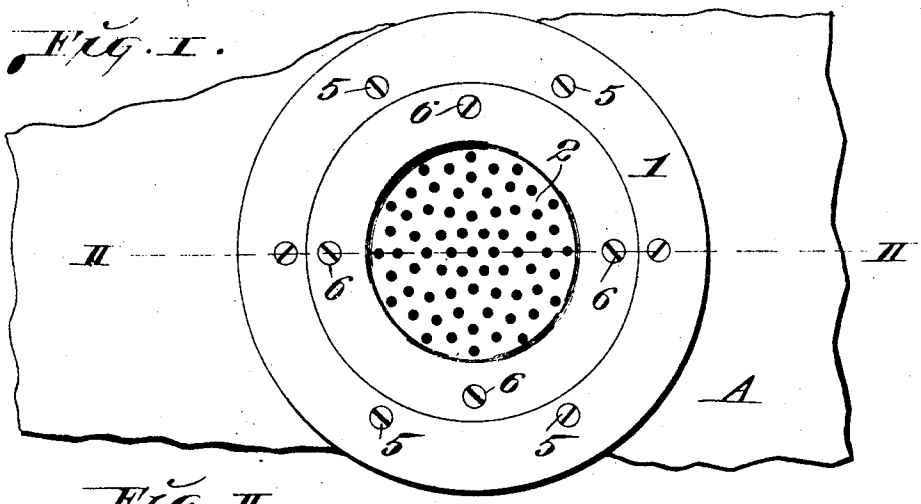


Fig. II.

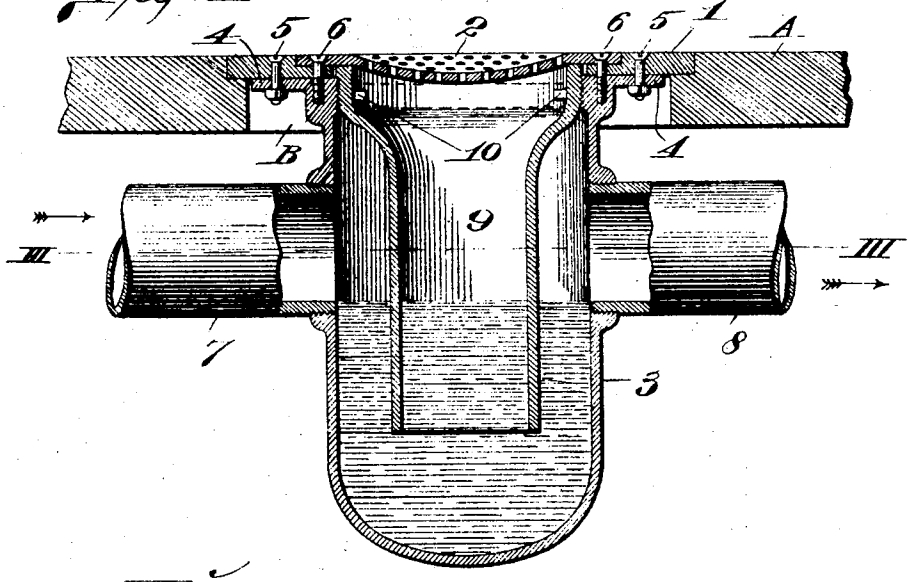
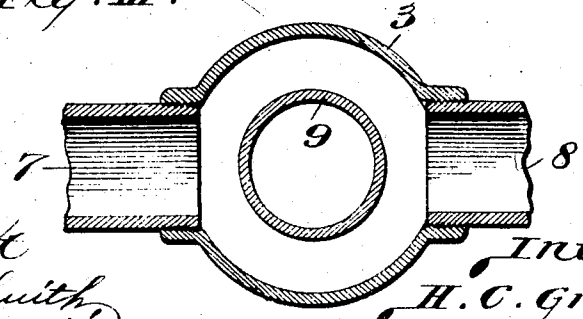


Fig. III.



Attest

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FLOOR DRAIN AND TRAP.

No. 814,441. Specification of Letters Patent. Patented March 6, 1906.

Application filed January 14, 1905. Serial No. 241,107.

To all whom it may concern:

Be it known that I, HARRY C. GRADWOHL, a citizen of the United States, residing in the city of St. Louis, in the State of Missouri, have invented certain new and useful Improvements in Floor Drains and Traps, of which the following is a full, clear, and exact description, reference being had to the accompanying drawings, forming part of this specification.

My invention relates to a floor-drain trap that is adapted to be seated in the floor of the building to receive a constant supply of water from urinals, lavatories, or other appliances that are constantly in use and to which flow of water is constantly supplied.

The object of the invention is to provide for the maintenance in the trap of a sufficient quantity of water at all times to prevent the escape of fumes from the trap.

Figure I is a top or plan view of my trap. Fig. II is a vertical longitudinal section taken on line II II, Fig. I. Fig. III is a cross-section taken on line III III, Fig. II.

A designates a floor from which my trap is suspended and in which is an opening B, in which the upper part of the trap is seated.

1 designates a supporting-ring that is set into the floor so that its top surface is flush with the top surface of the floor. The ring 1 is recessed, and in its recess is positioned a strainer 2.

3 designates the basin of the trap, which is provided at its upper end with an annular flange 4, through the medium of which the basin is detachably and removably hung from the supporting-ring 1 by hanger-bolts 5, that extend through the supporting ring and flange. The strainer 2 is detachably connected to the basin 3 by screws 6.

7 is a delivery-pipe connected to the trap-basin, and 8 is an outlet-pipe, also connected with said basin.

9 designates a seal-tube mounted within the basin 3 and having an open lower end that extends to a lower level within the basin than that of the points of attachment of the delivery and outlet pipes. The upper end of this seal-tube is located immediately beneath the strainer 2 and is externally screw-threaded and detachably secured to the basin 3 by the engagement of its screw-threaded portion with internal screw-threads at the upper end of said basin. For the purpose of providing for the ready introduction and removal of the seal-tube when the strainer 2 is detached from the trap I use lugs 10, integral with the seal-tube and extending inwardly therefrom and to which a spanner-bar may be fitted, as indicated by dotted lines, Fig. II. When such a spanner-bar is applied to the lugs, the seal-tube may be readily unscrewed by twisting action in order that the tube may be lifted from the basin.

I claim as my invention—

In a floor-drain trap, the combination of a supporting-ring having an annular recess therein, a strainer seated in the recess of the ring, a basin having a screw-threaded upper part and provided with an annular flange detachably secured to the ring, inlet and outlet pipes connected to said basin, and a seal-tube having a screw-threaded upper end engaging with the screw-threads on the upper part of the basin and having its lower end open and extending downwardly in said basin beyond said pipes; said seal-tubes being provided with spanner-receiving lugs.

HARRY C. GRADWOHL.

In presence of—

E. S. KNIGHT,

M. P. SMITH.