

W. DALE.
Covers for Openings in Sidewalks &c.

112428

PATENTED MAR 7 1871

Fig. I

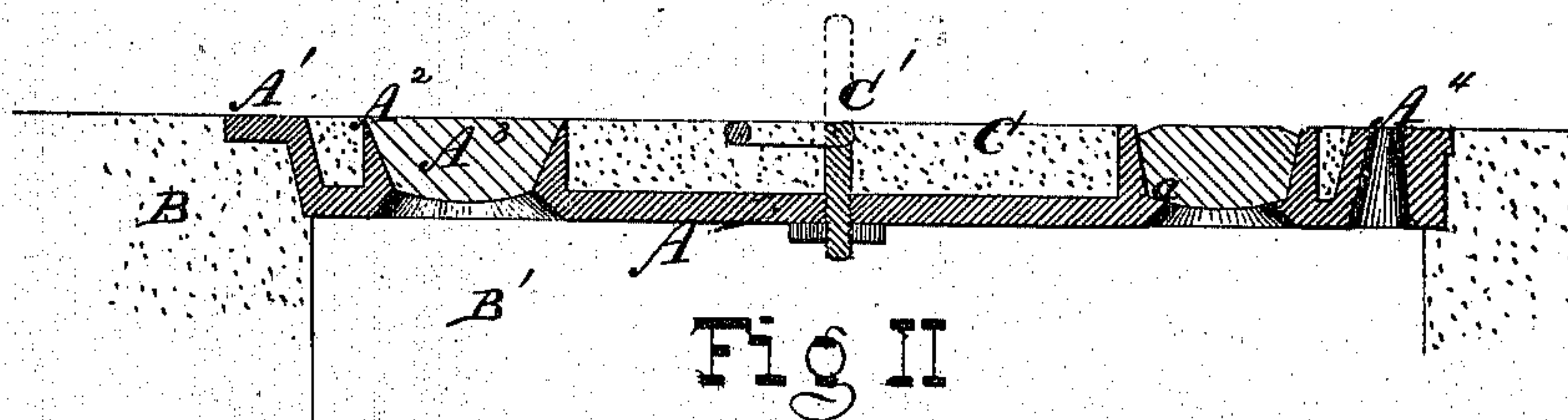
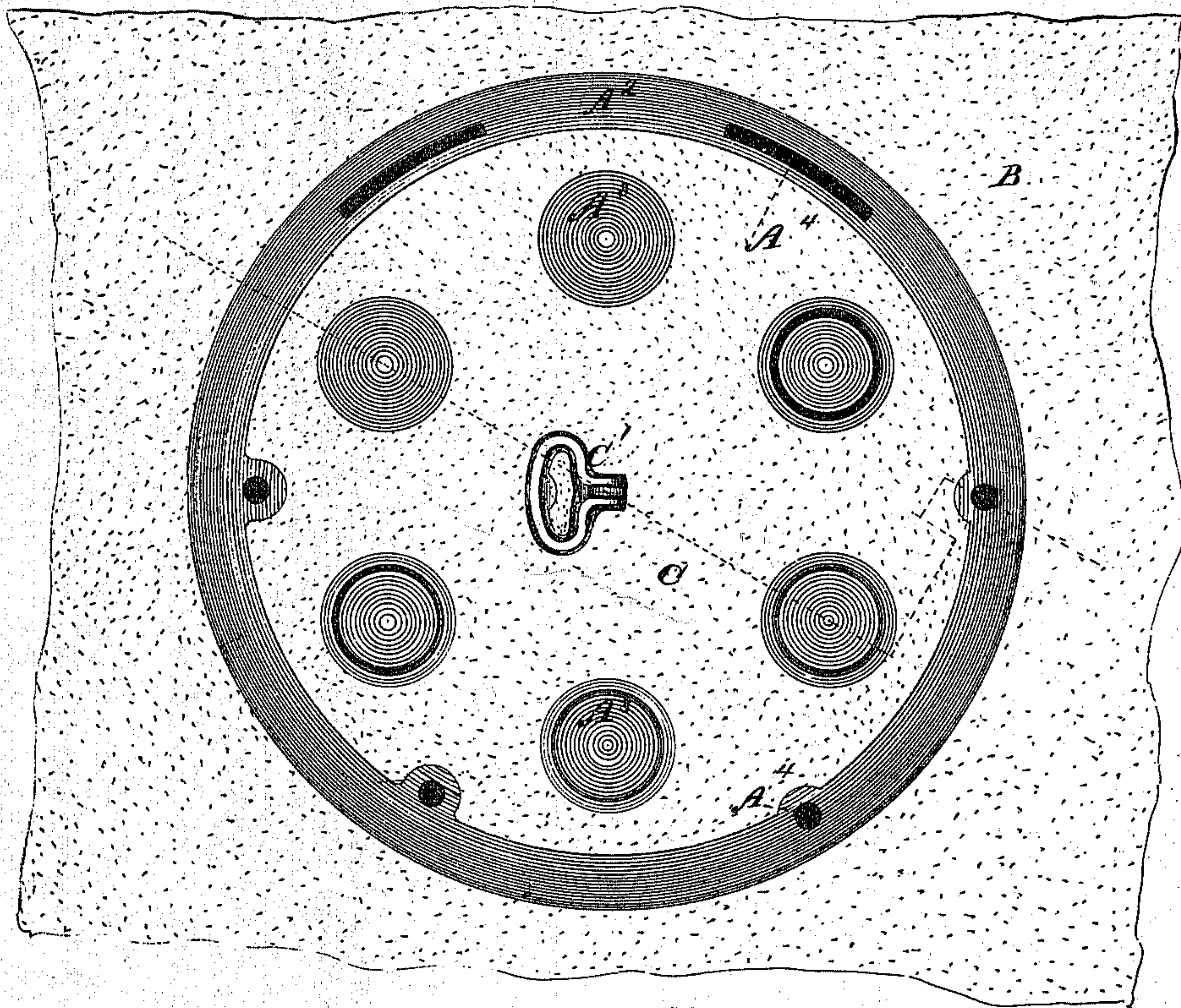


Fig II

ATTEST

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IMPROVEMENT IN COVERS FOR OPENINGS IN SIDEWALKS.

Specification forming part of Letters Patent No. 112,428, dated March 7, 1871.

To all whom it may concern:

Be it known that I, WILLIAM DALE, of the city and county of New York, and State of New York, have invented a certain Improvement in Covers for Openings in Sidewalks; and I do hereby declare that the following is a full, clear, and exact description thereof, reference being had to the annexed drawings, making part of this specification, in which—

Figure 1 is a plan view of my improved vault-cover. Fig. 2 is a vertical section on line *x x* of Fig. 1.

The same letters are used in both figures in the designation of identical parts.

This invention relates to vault-covers; and the improvement consists, first, in producing as a new article of manufacture a vault-cover composed of a metallic dish having bull's-eyes for the admission of light into the cellar or vault below, and a wooden block or other non-slippery material for filling the cavities in the dish around the bull's-eyes; and, secondly, in constructing the dish with slots or perforations around its edge for ventilating purposes.

To enable those skilled in the art to make and use my invention, I will proceed to describe its construction and operation.

In the annexed drawings, A represents the metallic dish, which may be made of the circular form shown or any other form to adapt it to that of the opening which it is designed to cover. It rests, by a horizontal flange, A', around its top, upon a shelf or seat formed in the pavement B surrounding the opening B', and may be fastened from below by any suitable mechanism. It is set into the pavement so that its upper surface is flush with the latter. The bottom of the dish is constructed with a series of openings surrounded by upwardly-projecting flanges A², with annular shoulders *a*. These openings are covered by thick pieces of glass or bull's-eyes A³, which rest upon the shoulders *a*, and are secured in the annular flanges in any suitable manner, their upper surfaces being flush with the edges of the flanges

A' and A². The space of the cavity in the dish not occupied by the bull's-eyes and their surrounding flanges is filled by a non slippery material. When convenient it may be filled with a material like that of which the pavement is composed. In most cases, however, I prefer to use a block of wood of the size of the cavity, with holes bored through for the reception of the bull's-eyes. This block of wood C is fastened to the dish by means of a ring-bolt, C', and nut, in the manner shown, said ring-bolt serving also as a handle, by which the cover may be lifted off of its seat to uncover the opening. When not in use the ring of the bolt is turned down into a gutter in the wooden block, so that the cover may present an unbroken upper surface flush with the pavement. Several slots or holes, A⁴, are formed in the dish around or near its outer edge, outside of the wooden block, sufficiently small to prevent the rain from entering through them to any objectionable extent, yet sufficiently large to afford a means of ventilation for the cellar or vault below. These openings may be made flaring from top to bottom, as shown in Fig. 2.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. The combination of the metallic dish A, A', bull's-eyes A³, and wooden block C, or other non-slippery material, used as a filling for the cavity of the dish between and around the bull's-eyes, substantially as set forth.

2. In combination with the vault-cover, composed of the parts A A' C, the openings A⁴, near the periphery of the dish A and surrounding the non-slippery filling C, substantially as and for the purpose set forth.

In testimony whereof I have signed my name to this specification in the presence of two subscribing witnesses.

WILLIAM DALE.

Witnesses:

C. H. MACHIN,
WM. F. LETT.