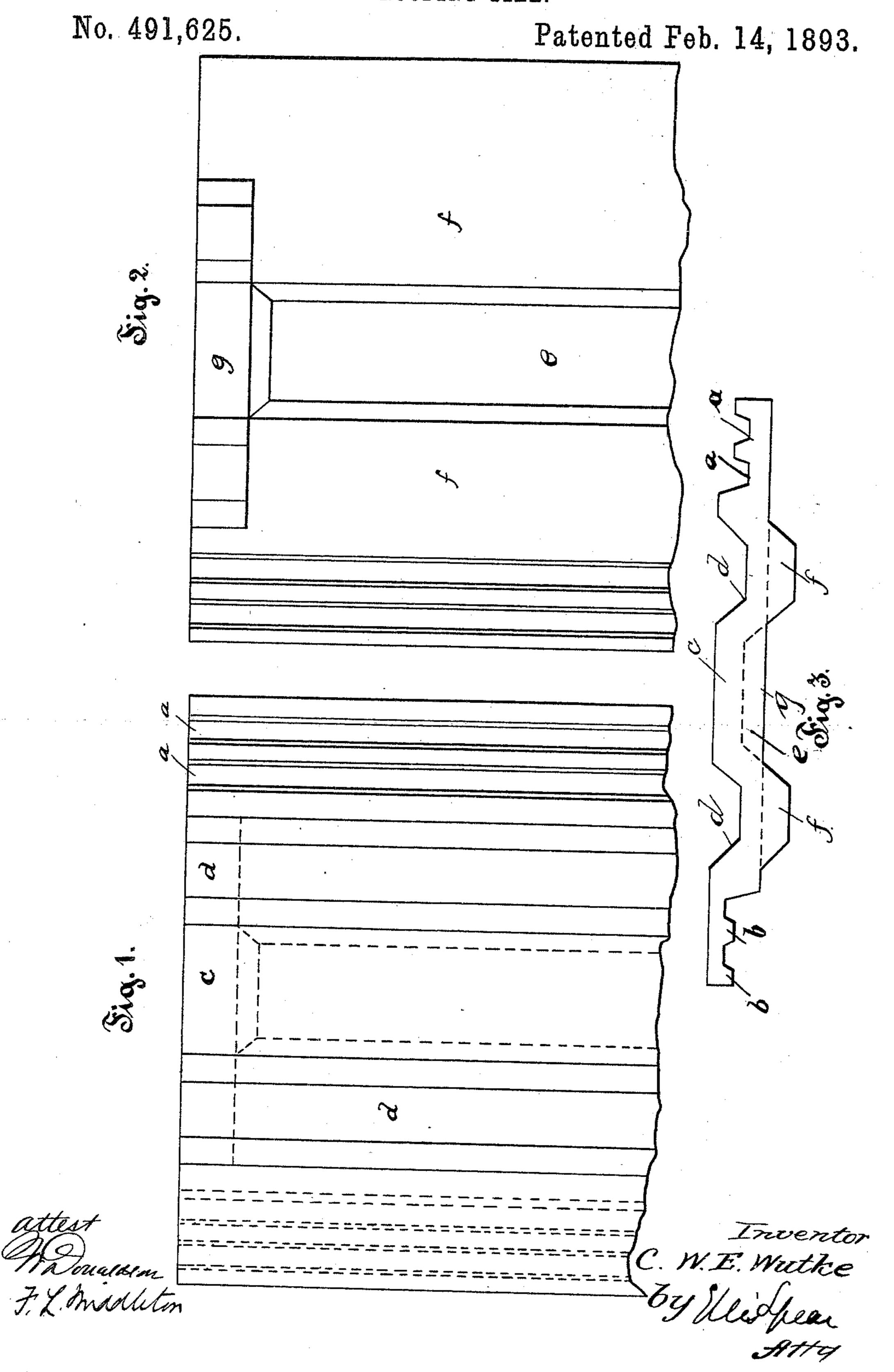
C. W. E. WUTKE.
ROOFING TILE.



## United States Patent Office.

CARL WILHELM EMIL WUTKE, OF GERMERSDORF, GERMANY.

## ROOFING-TILE.

SPECIFICATION forming part of Letters Patent No. 491,625, dated February 14, 1893.

Application filed May 24, 1892. Serial No. 434, 220. (No specimens.)

To all whom it may concern:

Be it known that I, CARL WILHELM EMIL WUTKE, a subject of the Emperor of Germany, residing at Germersdorf, in Prussia, Germany, have invented certain new and useful Improvements in Tiles, of which the following is a specification.

The object of the present invention is to provide an improved roofing tile formed of cement, artificial stone, or any other ceramic material which shall be perfectly water tight, and secure against the action of the weather.

In the accompanying drawings:—Figure 1, is a plan view of the upper face of the tile.

15 Fig. 2, is a similar view of the under face,

and Fig. 3, is an end view. The tile is provided with two parallel grooves a, extending along the upper surface near one longitudinal edge, while the 20 other longitudinal edge is formed with ribs b, adapted to enter the grooves a, of the adjacent tile. The central portion of the tile is raised, as at c, and the two depressions d, d, are also formed, one on each side of the ele-25 vated portion c. In order to maintain the material of the tile of nearly the same thickness, except where ribs or the like occur, a depression is formed in the under surface of the tile, corresponding in shape to the elevated por-30 tion c, and the two elevated portions f, f, are formed, one on each side of the depres-

sion e, the under side of the tile being nearly a reversal of the upper surface of the tile. A strengthening rib g, is formed extending across the depression e, near each end of the 35 tile.

This tile is designed to be produced in the usual manner upon a planing table, the under side being shaped by a die, while the upper side is formed by a planing iron mounted preferably in a slide. When in position the ribs b, register with the grooves a, and form a roofing impervious to water and secure against the action of frost.

A tile formed with a longitudinally raised central portion and depressions on each side thereof, a depression in the under surface with raised portions on each side thereof, and strengthening ribs at each end extending 50 across said depression and connecting the raised portions, grooves upon the upper surface near one edge, and ribs upon the under surface, near the other edge, substantially as described.

In witness whereof I have hereunto set my hand in presence of two witnesses.

• CARL WILHELM EMIL WUTKE.

Witnesses:

PAUL FISCHER,
PAUL BRINKMANN.