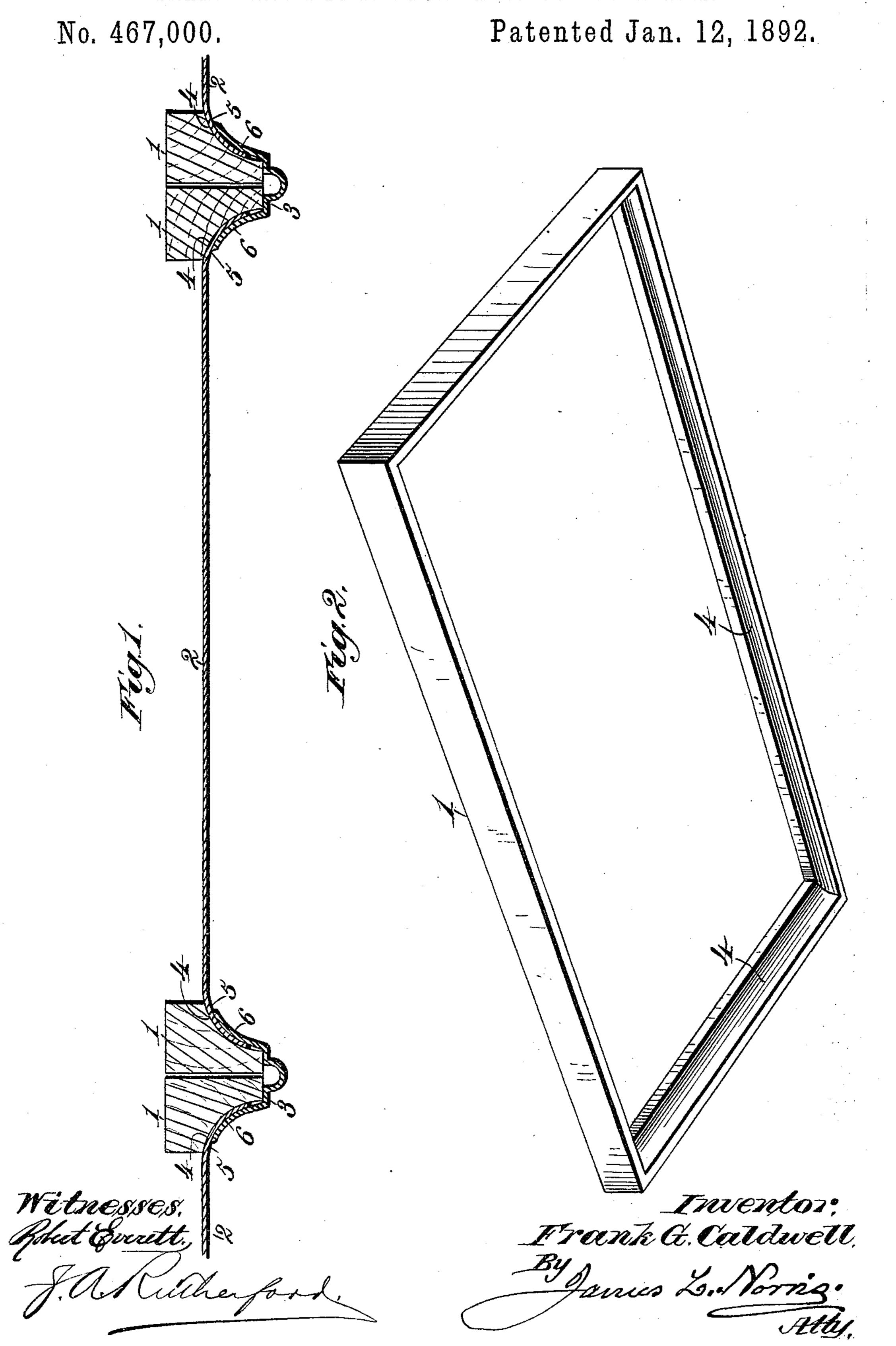
F. G. CALDWELL.

SHEET METAL PANEL FOR CEILINGS AND WALLS.



United States Patent Office.

FRANK G. CALDWELL, OF WHEELING, WEST VIRGINIA.

SHEET-METAL PANEL FOR CEILINGS AND WALLS.

SPECIFICATION forming part of Letters Patent No. 467,000, dated January 12, 1892.

Application filed August 20, 1891. Serial No. 403, 185. (No model.)

To all whom it may concern:

Be it known that I, FRANK G. CALDWELL, a citizen of the United States, residing at Wheeling, in the county of Ohio and State of West Virginia, have invented new and useful Improvements in Sheet-Metal Panels for Ceilings and Walls, of which the following is a specification.

In constructing sheet-metal paneling for to ceilings and walls it is usual to attach the edges of metallic sheets to the side and end rails or bars of rectangular or similar shaped frames, and after securing such panels in position the adjacent rails or bars of the frames 15 are covered with flanged caps of metal to conceal the same and provide a continuous metallic surface, which is suitably decorated to complete a ceiling or wall having projecting moldings. It is frequently difficult to obtain 20 perfect joints between the edges of the metallic caps and the metallic sheets of the panels, and therefore the completed ceiling or wall discloses unsightly seams or cracks, more especially after the ceiling has been in use a 25 short time.

The objects of my invention are to avoid the objections stated and to provide novel flat paneling wherein the molding-caps form close joints with and are practically continuations of the metallic sheets, whereby more perfect, satisfactory, attractive, and crackless ceilings are obtained than with prior constructions.

To accomplish these objects my invention consists in panels composed of frames having concaved or beveled inner edges, to which are attached the curved or flanged edges of inset metallic sheets, and metallic molding-caps having flaring flanges conforming to and overlapping the curved or flanged edges of the sheets of two contiguous or adjacent panels in such manner that the caps cover the wooden frames and also the edges of the metallic sheets, and practically constitute continuations of such sheets for producing paneled ceilings with moldings which avoid open seams or cracks between the edges of the caps and metallic sheets.

The invention is illustrated in the accom-

50 panying drawings, in which-

Figure 1 is a sectional view of one panel and portions of two adjacent panels, and Fig.

2 is a detail perspective view of one of the wooden frames.

In order to enable those skilled in the art 55 to make and use my invention, I will now describe the same in detail, referring to the drawings, wherein—

The numerals 1 indicate the rails or bars of a rectangular or similar shaped wooden frame, 60 2 the metallic sheet, which may or may not be corrugated, and 3 the metallic molding-cap. The inner edges of the rails or bars are constructed with concaved or curvilinear beveled seats 4 to receive the curved or flanged 65 edges 5 of the metallic sheet 2. In practice the metallic sheets are stamped, pressed, or struck up with the curved or flanged edges 5 to fit upon the curved or beveled seats 4, so that a metallic sheet has the appearance of 70 being set into the wooden frame.

In constructing a ceiling or wall a series of panels are properly secured in position, so that the rails or bars of one wooden frame are adjacent or contiguous to the adjacent or 75 contiguous rails or bars of other frames. The adjacent or contiguous rails or bars of the frames are covered and concealed by metallic molding-caps 3, each of which is formed with flaring side flanges 6, conforming to and over-80 lapping the curved flanges 5 of the metallic sheets 2. By this construction the wooden frames are concealed and the edges of the metallic sheets are covered by the molding-caps, while the flaring flanges of the caps practi- 85 cally constitute continuations of the metallic sheets for the purpose of entirely avoiding the presence of unsightly seams, spaces, or cracks in the completed ceiling or wall, thereby providing a more perfect and attractive 90 structure than is possible with the ordinary construction, where the edges of metallic sheets are nailed to the rear surface of wooden frames.and U-shaped metallic molding-caps are employed to cover the rails or bars of the 95

I am aware that the flanged edges of metallic stile - moldings have been applied to wooden strips and the edges of metallic sheets made to overlap the flanged edges of the stile- 100 moldings; but such construction is not claimed by me, and, moreover, does not constitute my invention.

frames.

By my arrangement of parts the metallic

sheets can be secured to the rectangular frames to constitute a complete panel, and subsequently such panels can be separately applied and adjusted as occasion demands and the 5 metallic molding caps placed and adjusted in position to cover the wooden frames and overlap the edges of the metallic sheets. These features are important for the purpose of enabling the panels to be manufactured as com-10 plete articles and shipped to the purchaser, so that it is only essential to apply the panels and fix the molding-caps in position, whereby the construction of paneled ceilings is materially facilitated and the cost thereof con-15 siderably reduced.

Having thus described my invention, what

I claim is—

1. The combination of a series of panels, each composed of a wooden frame having con-20 caved or beveled inner edges on which are seated the curved or flanged edges of an inset metallic sheet, and metallic molding-caps hav-

ing flaring flanges conforming to and overlapping the curved or flanged edges of the sheets of two contiguous or adjacent panels, 25 whereby the flanges of the caps cover the wooden frames and conceal the edges of the sheets to practically constitute continuations of the latter, substantially as and for the purpose described.

2. A panel for metallic ceilings, consisting of a wooden frame having concaved or beveled inner edges, and an inset metallic sheet provided with curved or flanged edges which are seated upon the concaved or beveled in- 35 ner edges of the frame, substantially as de-

scribed.

In testimony whereof I have hereunto set my hand and affixed my seal in presence of two subscribing witnesses.

FRANK G. CALDWELL. [L. s.]

Witnesses:

J. C. MOORE,

B. FISHER.