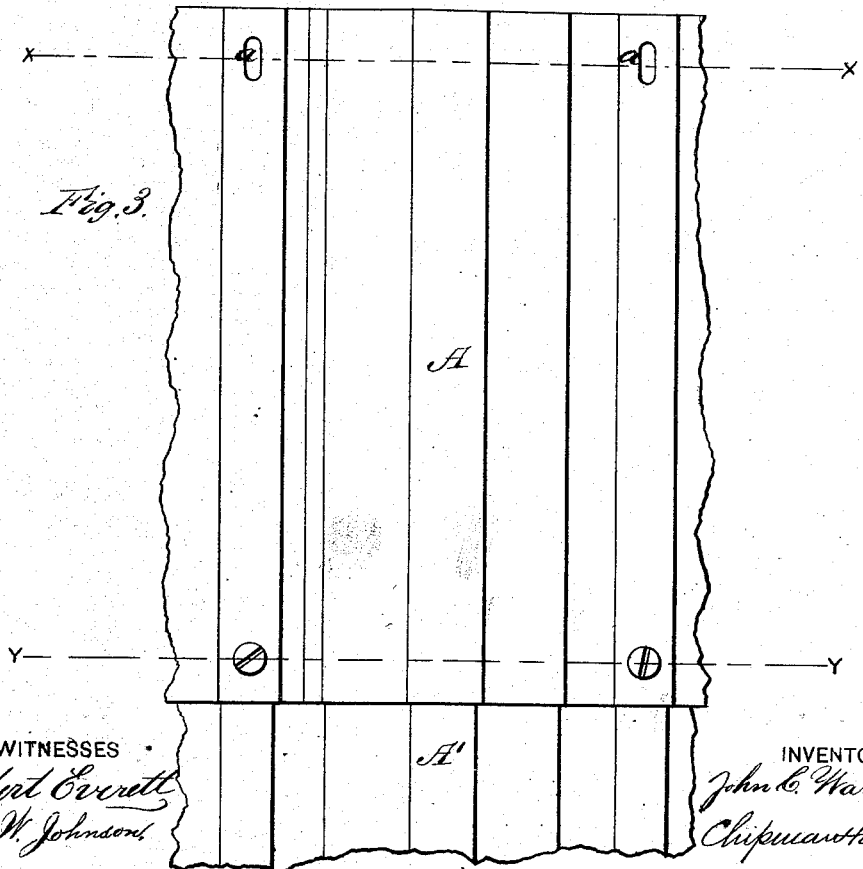
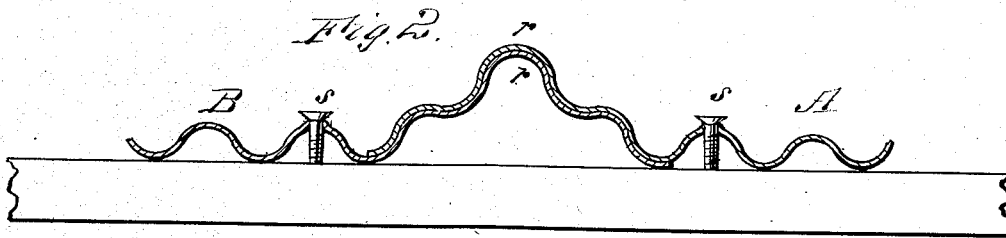
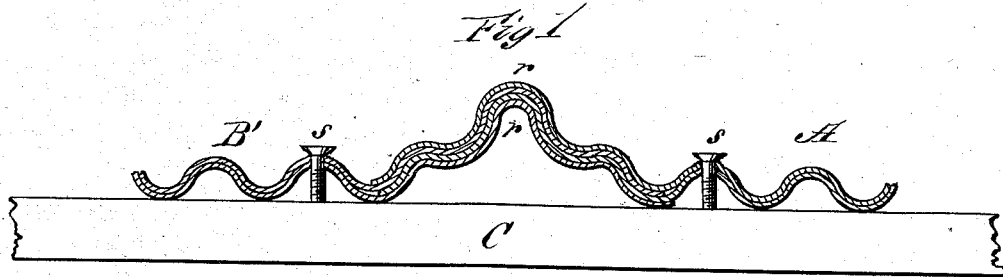


J. C. WANDS.  
Metallic-Roof.

No. 162,722.

Patented April 27, 1875.



WITNESSES  
*Robert Everett*  
*Eng. W. Johnson*

INVENTOR  
*John C. Wands*  
*Chipman & Osmer*

ATTORNEYS

# UNITED STATES PATENT OFFICE.

JOHN C. WANDS, OF NASHVILLE, TENNESSEE.

## IMPROVEMENT IN METALLIC ROOFS.

Specification forming part of Letters Patent No. **162,722**, dated April 27, 1875; application filed January 19, 1875.

*To all whom it may concern:*

Be it known that I, JOHN C. WANDS, of Nashville, in the county of Davidson and State of Tennessee, have invented a new and valuable Improvement in Roofs; and I do hereby declare that the following is a full, clear, and exact description of the construction and operation of the same, reference being had to the annexed drawings, making a part of this specification, and to the letters and figures of reference marked thereon.

Figures 1 and 2 of the drawings are representations of sections of my roofing, and Fig. 3 is a plan view of the same.

This invention has relation to improvements in corrugated sheet-metal roofing for houses; and the novelty consists in a raised corrugated rib formed at each lateral edge of the said plates, which ribs are adapted to fit snugly the one upon the other as the plates are successively placed in position side by side in laying the roofing, whereby water is prevented from being blown under and over the joint of the said plates, as will be fully understood from the annexed description.

In the annexed drawings, A A' designate, respectively, the upper and lower sheets, and B B', respectively, the upper and lower sheets of a sectional corrugated metallic roofing, the two latter being side by side with the two former sheets, in connection with which I propose to exemplify and show both the construction and application as well as the usefulness of my improvements in this class of roofing. The upper edges of each of the plates A A' and B B' are provided with slots *a*, cut in the length of the corrugations, and their lower edges with preferably circular perforations corresponding in number and in relative position with the said slots, so that when the plates are placed in position, the upper ones overlapping the lower, the slots and perforations shall register with each other, and permit a screw,

or nail, or bolt, *s*, to be passed through them into a rafter or beam, *C*.

In sectional corrugated roofs heretofore constructed it has been a cause of no infrequent complaint that when a strong side wind accompanied with rain prevails water is blown under and over the lateral joint of plates A B, falling thence upon the ceiling, and greatly disfiguring the same, or when no ceiling is used, as in depots or storehouses, into the body of buildings. This defect is remedied in my improved roofing in the following manner, to wit:

Each lateral edge of the plates is provided with an angular corrugated rib, *r*, raised a suitable distance above the highest point of the corrugations in the body of the same, which ribs are of corresponding size, of equal height, and are provided with an equal number of longitudinal corrugations, so that when a second sheet is arranged beside one previously laid its corrugated rib shall fit snugly over that of the first plate, presenting the appearance shown in Fig. 2. By this means whatever rain is forced up under the edge will be received into the channel *c*, where it will be entirely protected from the blast, and will then run down the incline, and be discharged into a gutter or fall to the ground.

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

The raised corrugated ribs *r* at the lateral edges of corrugated plates, constituting a roof, combined, arranged, and constructed substantially as specified.

In testimony that I claim the above I have hereunto subscribed my name in the presence of two witnesses.

JOHN CLARK WANDS.

Witnesses:

M. RIORDAN,  
HENRY F. WOLFE.