J. F. BIEGELAAR.

EAVES-TROUGH.

No. 186,529. Patented Jan. 23, 1877.

FIG. 1.

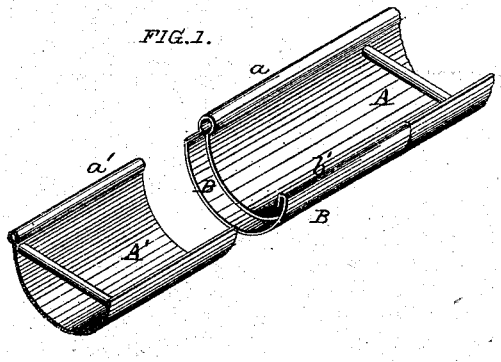
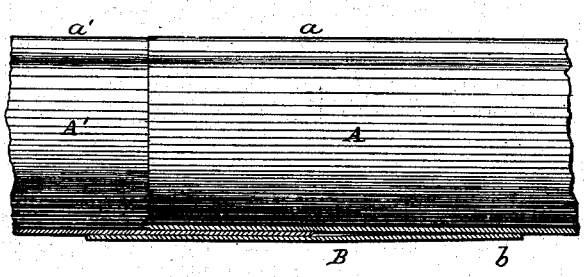


FIG. 2.



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JOHN F. BIEGELAAR, OF ST. LOUIS, MISSOURI.

IMPROVEMENT IN EAVES-TROUGHS.

Specification forming part of Letters Patent No. **186,529**, dated January 23, 1877; application filed October 27, 1876.

To all whom it may concern:

Be it known that I, JOHN F. BIEGELAAR, of the city and county of St. Louis, and State of Missouri, have invented a certain new and useful Improvement in Slip-Joints for Eaves-Troughs, of which the following is full, clear, and exact description, reference being had to the accompanying drawings, making part of this specification.

The purpose of my invention is to provide a joint for metallic eaves-troughs which, while it allows the endwise extension and contraction of the trough, (resulting from changes of temperature,) will remain water-tight.

To accomplish this one end of each section of the pipe (excepting one of the end sections) is made double, and open at the outer end, to form a pocket for the reception of the end of the next section, which fits so closely therein as to make a water-tight joint.

In the drawings, Figure 1 is a perspective view of my invention. Fig. 2 is an enlarged longitudinal section through the bottom of the trough.

A is the end of one section of a semicircular eaves-trough. B is a strip of metal lapped around the outside of this end, and tightly soldered to the same at the inner edge *b*. The upper edge *a* is rolled outward over one of the upper edges of B, and the other edge *b'* of the strip B is turned inward over the other edge of the part A, as shown. A' is the end of the next section of the trough, and this end is inserted between the parts A and B, as shown, and fits so closely therein as to form a water-tight slip-joint, said joint possessing greater lateral strength to the rest of the trough, and yet allowing endwise extension and contraction of the trough, resulting from changes of temperature. The roll *a'* of the end A' fits in the roll *a*, increasing the transverse strength of the joint.

I claim as my invention—

The slip-joint for eaves-troughs herein described, formed by lapping round the outside of the end A the strip of metal B, soldered to the inner edge of A at *b*, thus forming a double or pocket-shaped end, within which the single end A' of the next section fits, and forms a water-tight joint capable of endwise extension and contraction on change of temperature, substantially as set forth.

JOHN F. BIEGELAAR.

Witnesses:

SAML. KNIGHT,

ROBERT BURNS.