

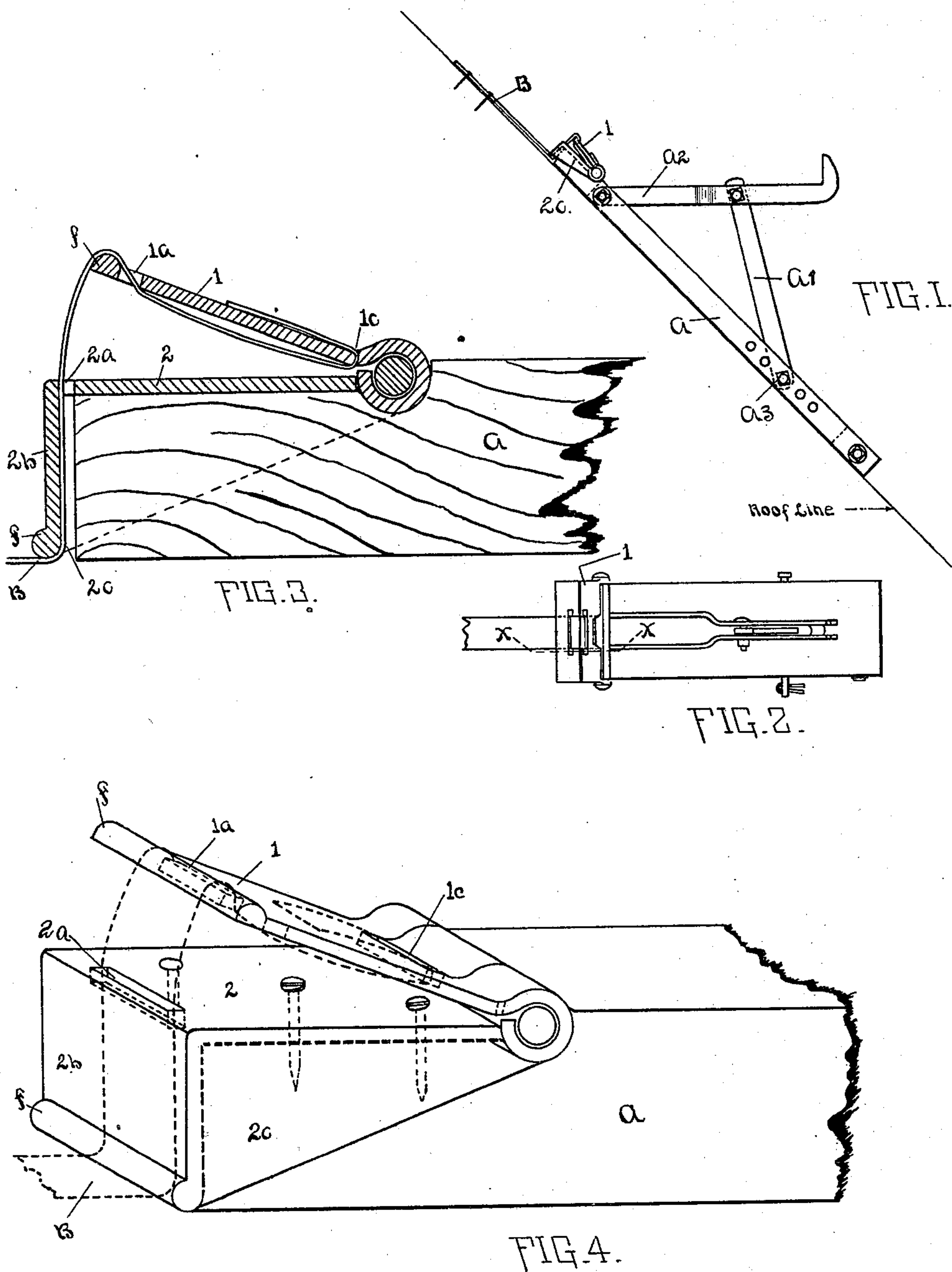
No. 684,815.

Patented Oct. 22, 1901.

C. M. HART.
CLAMP FOR ROOFING BRACKETS, &c.

(Application filed Apr. 8, 1901.)

(No Model.)



WITNESSES:
W. Stephens
Jas. C. Hanson.

Chas. M. Hart INVENTOR.
BY
Geo. B. Willcox ATTORNEY.

UNITED STATES PATENT OFFICE.

CHARLES M. HART, OF BAY CITY, MICHIGAN.

CLAMP FOR ROOFING-BRACKETS, &c.

SPECIFICATION forming part of Letters Patent No. 684,815, dated October 22, 1901.

Application filed April 8, 1901. Serial No. 54,885. (No model.)

To all whom it may concern:

Be it known that I, CHARLES M. HART, a citizen of the United States, residing at Bay City, in the county of Bay and State of Michigan, have invented certain new and useful Improvements in Clamps for Roofing-Brackets, &c.; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

This invention is a clamp for roofing-brackets; and the improvement consists in certain means whereby I produce a clamp which automatically holds the roofing-bracket to the roof more securely in proportion as the weight or strain upon the bracket increases.

The object of the invention is to provide a clamp which will not project to an objectionable extent from the frame of the roofing-bracket and can be easily and quickly put into use without the aid of levers, screws, or other clamping devices.

My invention is illustrated in the accompanying drawings, in which—

Figure 1 is a side elevation of a roofing-bracket in approximately the position it would occupy upon a roof. Fig. 2 is a top view. Fig. 3 is a section of the clamp on the line $x-x$ of Fig. 2. Fig. 4 is a perspective view of the clamp.

As is clearly shown in the drawings, the clamp consists in a hinge composed of two straps or leaves secured to the upper end of the bracket A. The upper leaf 1 of the hinge has a transverse slot 1^a near its forward end. The lower leaf 2 has a similar transverse slot 2^a directly below the front edge of the upper leaf. In front of the slot 2^a is a downwardly-projecting flange 2^b, made integral with the lower leaf of the hinge. At each side of the lower leaf are flanges 2^c for reinforcing the flange 2^b. The lower leaf, the flange 2^b, and the two side flanges 2^c together form a protecting-cap for the end of the bracket A. The operation of the clamp is as follows: A thin metal strap B, such as is commonly used by roofers, is nailed at its upper end to the roof, and its lower end is gripped by the clamp in

the following manner: The free end of the strap B is passed up behind the flange 2^b, through the slot 2^a, and up past the front edge of the upper leaf 1. The strap is then bent downwardly, passing through the slot 1^a, thence back between the two hinge-leaves and up through the slot 1^c at the knuckle of the hinge. It is then bent down flat against the upper side of the leaf 1. The lower leaf of the clamp is securely fastened by screws or otherwise to the bracket A. This bracket carries the usual scaffold-supporting arms A' and A², the positions of which are vertically adjustable by means of a bolt A³, passing through holes in the bracket A and through the lower end of the arm A'. Any increase in the strain or load upon the bracket A tightens the strap B and pulls the upper leaf 1 of the hinge tightly down upon the lower leaf 2, thus firmly clamping the end of the strap B between the two leaves. At the forward edge of the leaf 1 and at the lower edge of the flange 2^b I prefer to provide fillets f to avoid too sharp bending of the strap B.

Having described my invention, what I claim, and desire to secure by Letters Patent, is as follows:

1. A clamp of the class described comprising two hinged leaves, the upper leaf having a transverse slot near its outer edge, and a second slot between its inner edge and the pintle of the hinge, for the purpose set forth.

2. A clamp for roofing-brackets comprising two hinged leaves, the lower leaf adapted to be secured to the upper end of the roofing-bracket, and the upper leaf having a transverse slot near its outer edge, and a second transverse slot between its inner edge and the pintle of the hinge, said slots being adapted to receive a metal strap and to clamp said strap between said leaves, substantially as described.

3. A clamp comprising two hinged leaves, the upper leaf having two transverse slots; the lower leaf having a transverse slot and a downwardly-projecting flange, substantially as described.

4. A clamp for roofing-brackets comprising two hinged leaves; the lower leaf being

adapted to be secured to the upper end of the
roofing-bracket and having a downwardly-
projecting flange and two side flanges form-
ing a protecting-cap for the upper end of said
5 bracket; said leaf having a transverse slot in
the rear of the downwardly-projecting flange;
an upper leaf hinged to the lower leaf and
provided with a fillet along its front edge, and

having two parallel transverse slots, for the
purpose described. 10

In testimony whereof I affix my signature
in presence of two witnesses.

CHARLES M. HART.

Witnesses:

I. GOULD,

E. F. WARREN.