Oct. 24, 1933. W. L. BRAINARD ET AL 1,931,889

METAL COVE AND BRACKET

Filed Jan. 11, 1932

Fig. 1.

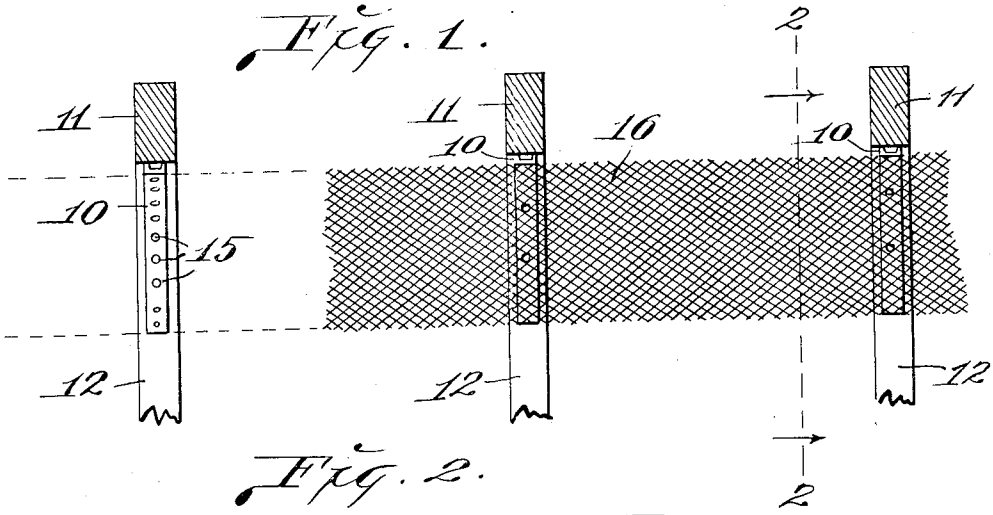


Fig. 2.

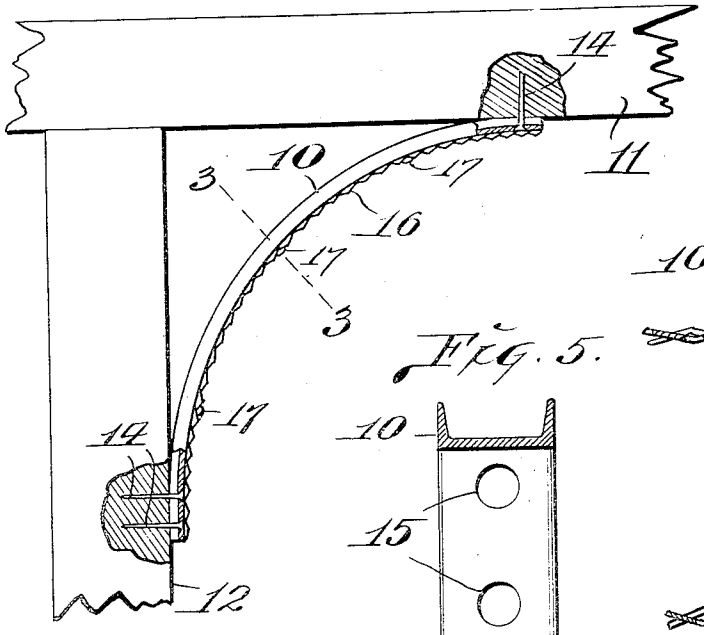


Fig. 3.

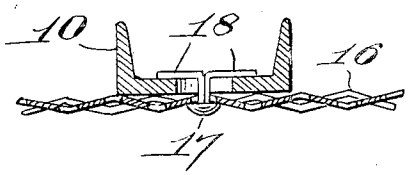


Fig. 5.

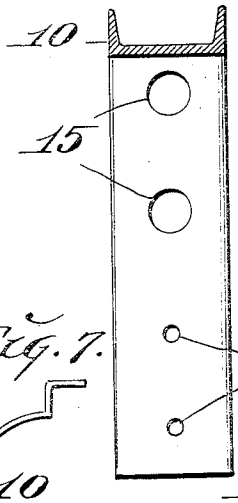


Fig. 4.

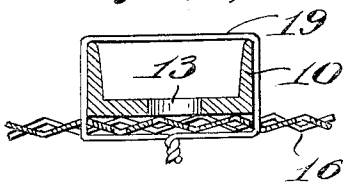


Fig. 6.

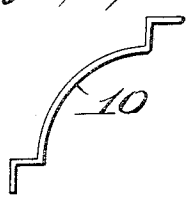
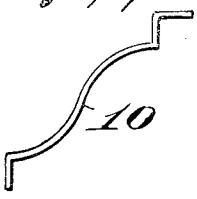


Fig. 7.



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METAL COVE AND BRACKET

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Application January 11, 1932. Serial No. 585,972

3 Claims. (Cl. 72—118)

Our invention relates to a metal cove and bracket and has for its principal object, the provision of a relatively simple, practical and inexpensive cove and bracket that may be conveniently and economically utilized in the corners between the studs and joist of a building for producing the desired cove between the wall and ceiling.

Further objects of our invention are, to provide a cove and bracket that are formed wholly of metal, thereby providing a strong and substantial structure that is fireproof and which will withstand the destructive action of insects, decay and moisture, further, to provide a cove and bracket that may be applied for use in much less time and with less labor than is required in the installation of coves formed of wooden brackets and lath and further, to provide a cove bracket having apertures for the reception of the means employed for fastening the reticulated sheet metal to the brackets to produce the base or body of the cove and which apertures also permit plaster or other wall forming material while in plastic condition to pass through said apertures and interlock behind the brackets when said plastic material becomes hardened.

With the foregoing and other objects in view, our invention consists in certain novel features of construction and arrangement of parts that will hereinafter be more fully described and claimed and illustrated in the accompanying drawing, in which:

Fig. 1 is an elevational view partly in section and showing our improved metal cove and brackets applied to the studs and joist of a building.

Fig. 2 is an enlarged cross section taken on the line 2—2 of Fig. 1.

Fig. 3 is an enlarged cross section taken on the line 3—3 of Fig. 2.

Fig. 4 is a cross section similar to Fig. 3 and showing a modified form of the means employed for securing the reticulated sheet metal to the cove bracket.

Fig. 5 is an elevational view of the lower portion of one of the cove brackets.

Figs. 6 and 7 are side elevational views of modified forms of cove brackets constructed in accordance with our invention.

Referring by numerals to the accompanying drawing which illustrates a practical embodiment of our invention, 10 designates a cove bracket constructed in accordance with our invention and which bracket is preferably formed of channel-shaped metal, although if desired, said bracket may be formed from flat metal strips or bars or from T or I beam shapes, or from round or half round metal rods or tubes.

Where a plain cove is to be produced, the brackets 10 are curved lengthwise so that each bracket forms an arc approximately 90° in length and when applied for use, the upper end of the bracket fits against the underside of one of the ceiling joists 11, and the lower end of the bracket fits directly against the corresponding stud 12.

Formed through the end portions of the bracket or those portions that engage against the joist and stud, are apertures 13 for the reception of nails 14 that firmly secure the bracket to the joist and stud.

We prefer to form a single nail receiving aperture through one end of the bracket and a pair of similar apertures through the other end of the bracket, for such arrangement enables the bracket to be secured to the joist and stud with three nails which effectively prevents the bracket from swinging laterally in either direction and which result might occur if only two nails were utilized in securing said bracket to its supports.

Formed through the web of the bracket 10, is a longitudinally disposed row of apertures 15 which, in addition to serving as openings for the reception of the fastening means for the reticulated sheet metal that is applied to the brackets, permits plaster or like material while in plastic condition, to pass through the bracket and thereby interlock with the same when said plastic material becomes hard.

Secured to the brackets 10 in any suitable manner and lying immediately against the outer or underfaces thereof, is a section 16 of reticulated sheet metal and which is commonly known as expanded metal or metal lath. This section of sheet metal may be secured to the brackets 10 by suitable metallic fasteners 17 comprising heads from which project a pair of ductile legs 18 and which latter pass through the apertures 15 in the bracket and have their end portions bent laterally against the rear face of the bracket.

If desired the reticulated sheet metal may be secured to the bracket by means of suitable ties 19, preferably ductile wire, which passes entirely around the bracket and the ends of the tie twisted together in front of the reticulated sheet metal (see Fig. 4).

When the cove is properly positioned for use on the joist and studs the thickness of the cove comprising the brackets and reticulated sheet metal is approximately equal to the thickness of

the lath that is placed on the joist and studs and thus a practically uniform surface is provided to receive the plaster and finishing coats that form the outer portions of the walls and ceiling.

Inasmuch as the cove brackets 10 are formed from metal, they may be readily bent to form coves of different ornamental shapes, such for instance as are illustrated in Figs. 6 and 7.

Thus it will be seen that we have provided a metal cove and bracket that is relatively simple in construction, inexpensive of manufacture and installation and which is very effective in performing the functions for which it is intended.

It will be understood that minor changes in the size, form and construction of the various parts of our improved metal cove and bracket may be made and substituted for those herein shown and described without departing from the spirit of our invention, the scope of which is set forth in the appended claims.

We claim as our invention:

1. In building constructions, the combination with studs and joist of curved metal brackets spanning the corners between said studs and joist said brackets being formed of channel-iron, with the end portions of their flanges bearing against the studs and joist, fastening means passing through the ends of said brackets and seated in said studs and joist, each bracket being perforated at points intermediate its ends and a section of reticulated sheet metal secured to said brackets and arranged against the outer faces thereof.

2. As an article of manufacture, a metal cove for building construction, comprising brackets formed of channel-iron, curved throughout their lengths and adapted to be positioned in the corner between the studs and joist of the building construction, with the end portions of their flanges bearing against said studs and joist, the end portions of the webs of said brackets being provided with apertures for the reception of fastening means, the intermediate portions of the webs of said brackets being provided with apertures and a section of reticulated material secured to said brackets and arranged on the outer faces of the webs thereof.

3. As an article of manufacture, a metal cove for building construction, comprising brackets formed of channel-iron, curved throughout their lengths and adapted to be positioned in the corner between the studs and joist of the building construction, with the end portions of their flanges bearing against said studs and joist, the end portions of the webs of said brackets being provided with apertures for the reception of fastening means, the intermediate portions of the webs of said brackets being provided with apertures, a section of reticulated material arranged on said brackets and bearing against the outer faces of the webs thereof and means passing through the reticulated material and engaging said brackets for securing said reticulated material to said brackets.

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