

(Model.)

A. E. MATTESON.
ARTIFICIAL CROWN FOR TEETH.

No. 280,052.

Patented June 26, 1883.

Fig. 1.

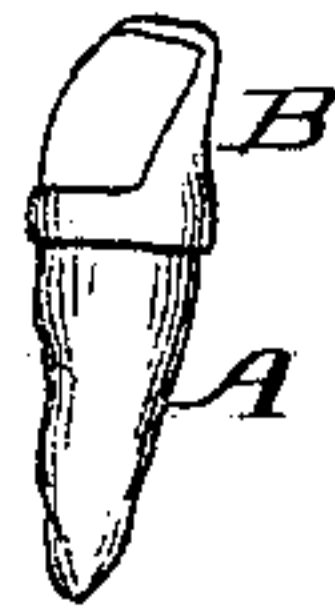


Fig. 2.

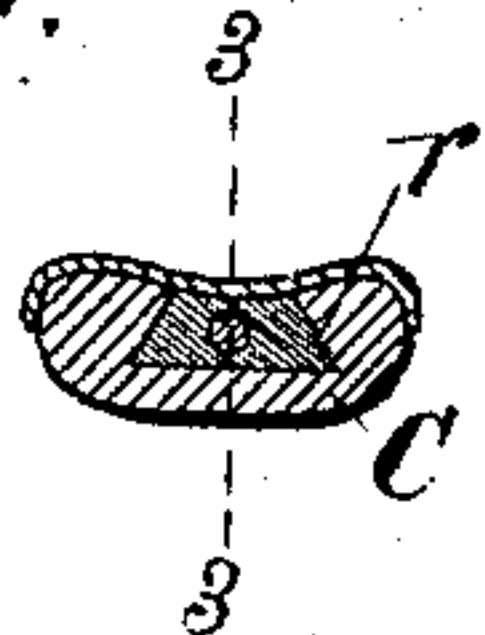


Fig. 3.

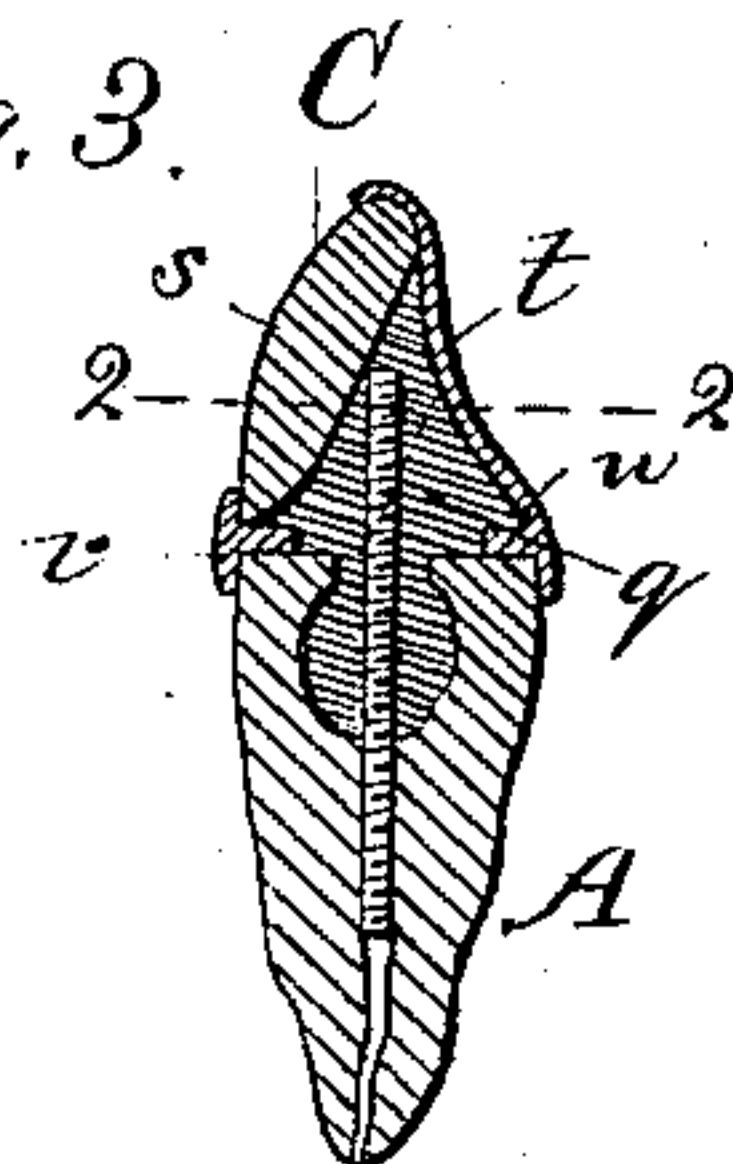
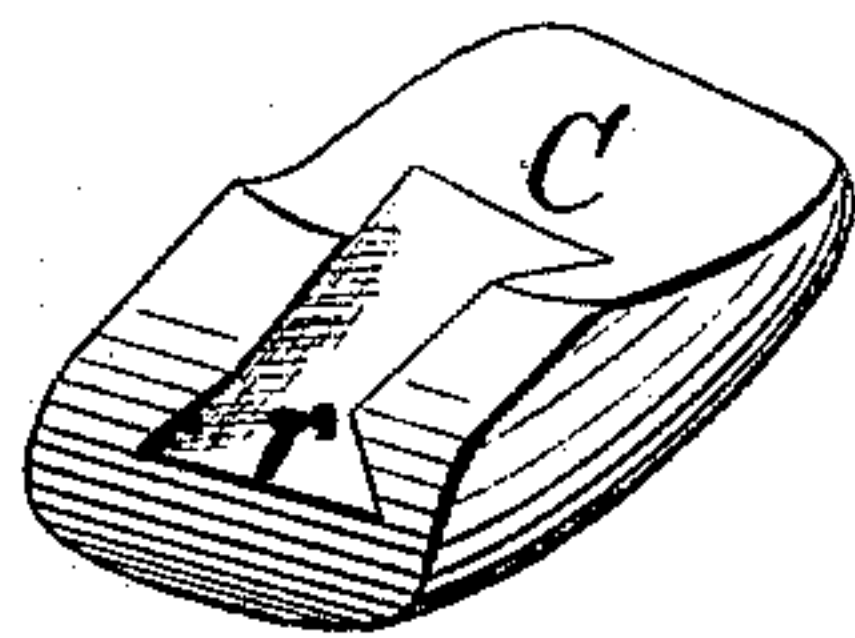


Fig. 4.



Witnesses:

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UNITED STATES PATENT OFFICE.

ARTHUR E. MATTESON, OF CHICAGO, ILLINOIS.

ARTIFICIAL CROWN FOR TEETH.

SPECIFICATION forming part of Letters Patent No. 280,052, dated June 26, 1883.

Application filed June 28, 1882. (Model.)

To all whom it may concern:

Be it known that I, ARTHUR E. MATTESON, a citizen of the United States, residing at Chicago, in the county of Cook and State of Illinois, have invented certain new and useful Improvements in Dental Crowns with Porcelain Fronts; and I hereby declare the following to be a full, clear, and exact description thereof, reference being had to the accompanying drawings.

My invention relates to the construction of artificial crowns for teeth and securing them in place to the roots; and it consists in the particular construction which I employ for giving them firmness and strength and facilitating the placing of them in position, all as hereinafter more fully set forth.

In the drawings, Figure 1 is a side elevation of a tooth provided with my improvements; Fig. 2, a horizontal section on the line 2 2 of Fig. 3; Fig. 3, a central vertical section on the line 3 3 of Fig. 2, and Fig. 4 a perspective view of the porcelain front.

A is the root of the tooth, and B the metal portion of the crown. The part B comprises the band *v*, provided with the internal shoulder or flange, *u*, projecting inward, as shown, from a point about midway of the breadth of the band, and the part *t* extending upward from the band and forming the inner wall of the crown. The band *v* and the wall *t* are formed in one piece out of metal plate by pressing or swaging the plate over a die of the required shape, and the shoulder *u* is subsequently soldered or otherwise secured in place to the inner surface of the band. The size and shape will of course vary according to the particular circumstances and requirements. The part of the band below the shoulder *u* snugly fits the top of the root, the lower face of the shoulder resting upon the root. One or more screws, *s*, are driven into the top of the root at any desired angle or angles, and the metal part B placed in position upon the root, as shown.

C is a front, of porcelain, or a side, as the case may be, depending upon whether the

crown is to be fitted to a front or a side tooth. The peculiarity of this porcelain part is that it is provided on its inner face with a dovetailed recess, *r*, preferably longitudinal, the purpose of which is to receive and be held by the cement or amalgam, *q*, with which the crown is filled. The porcelain part is made of the proper shape to correspond with the other teeth, and supplements the inner wall, *t*, as shown in the drawings, the edges of the metal being swaged or burnished down upon it. At its base it fits within the band *v* and rests upon the shoulder *u*, as shown in the drawings.

Among the chief merits of my invention are the ease, rapidity, and certainty with which it may be applied, while the parts being put together as shown, and the interior of the crown filled with cement or amalgam, they are held together with very great firmness, the screw or screws, together with the dovetailed recess in the porcelain front, forming the best possible media for uniting the porcelain front and the root by means of the cement. The inwardly-projecting flange will be found of service in crowns differing otherwise from mine in construction.

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

1. In a dental crown, the combination, with the metal backing extended into a band, *v*, of a flange or shoulder, *u*, projecting inward from a position about midway of the breadth of the band, substantially as described, and for the purpose set forth.

2. In an artificial crown, the part B, of metal, comprising the band *v*, having the inwardly-projecting flange *u*, and the inner wall, *t*, in combination with the porcelain front or side C, provided with the dovetailed recess *r*, substantially as described, and for the purpose set forth.

ARTHUR E. MATTESON.

In presence of—

C. C. LINTHICUM,

THOMAS A. BANNING.