

R. S. WILLIAMS.
Dental-Foil Package.
No. 220,687. Patented Oct. 14, 1879.

Fig. 1.

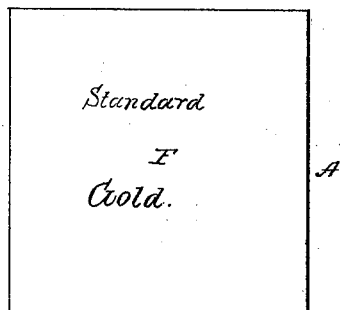


Fig. 2.

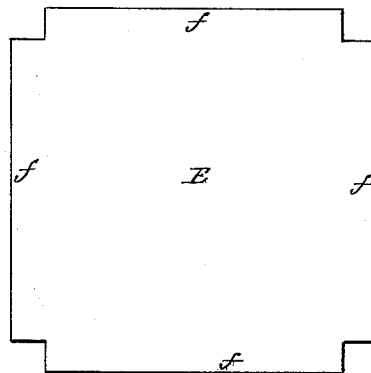


Fig. 3.

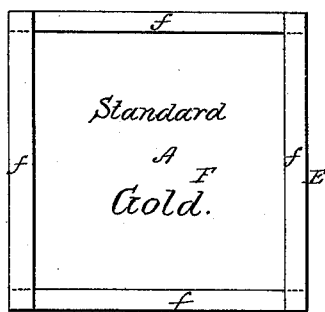


Fig. 4.

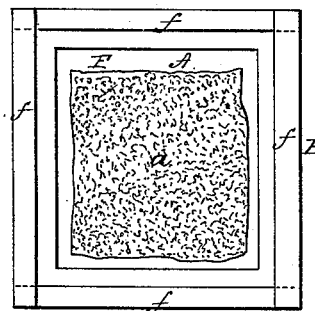


Fig. 5.

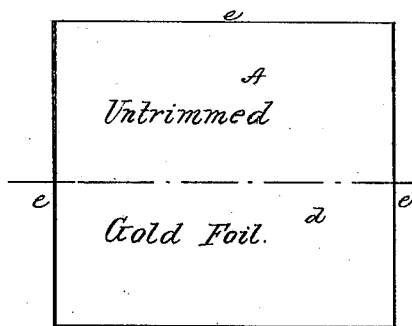


Fig. 7.

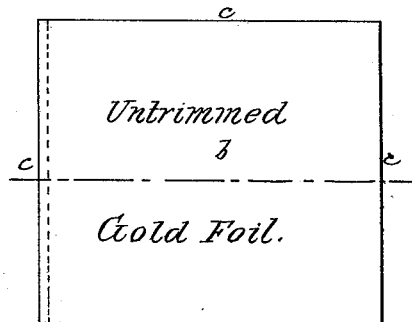


Fig. 6.

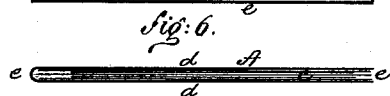


Fig. 8.

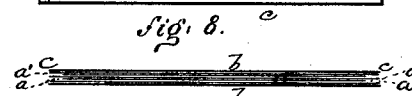
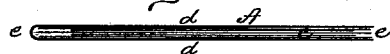
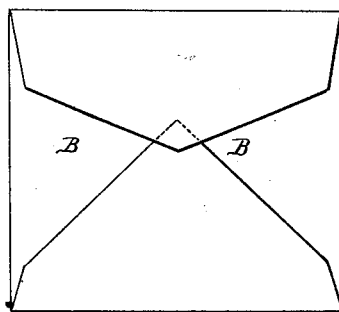


Fig. 9.



Witnesses:

Chas. Nida.
H. L. Watterberg



Inventor:

Richard S. Williams
Per [Signature]
Atty

UNITED STATES PATENT OFFICE.

RICHARD S. WILLIAMS, OF NEW YORK, N. Y.

IMPROVEMENT IN DENTAL-FOIL PACKAGES.

Specification forming part of Letters Patent No. **220,687**, dated October 14, 1879; application filed July 10, 1879.

To all whom it may concern:

Be it known that I, RICHARD S. WILLIAMS, of the city, county, and State of New York, have invented a new and useful Improvement in Enveloping-Packages for Dental Foil; and that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawings, and to the letters of reference marked thereon, making part of this specification.

This invention is in the nature of an improvement in enveloping-packages for dental foil, &c.; and the invention consists of a package for dental foil composed of a book or pile of alternate layers of sheets of foil and paper, the edges and outer coverings of the package being charged with a moisture and air proof composition, substantially as hereinafter described.

In the accompanying sheet of drawings, Figure 1 is a top view of package; Fig. 2, bottom view of same package, showing overlapping edges; Fig. 3, a top view of package with overlapping edges cemented down; Fig. 4, a top view of package with the outer water-proofed surface removed; Fig. 5, book with luted edges; Fig. 6, section of same; Fig. 7, pile with luted edges; Fig. 8, section of same; and Fig. 9, inclosing-envelope with flaps.

Similar letters of reference indicate like parts in the several figures.

To preserve the well-known adhesive qualities of freshly-annealed gold foil, it is all-important that it be kept from contact with the air and from moisture. When the foil is folded or rolled and cut into pellets, cylinders, and other well-known forms, it may be preserved in vials; but the ordinary flat sheets of foil cannot be packed in this way, and, besides, the vials are heavy and liable to be broken, which is a serious drawback to their being sent through the mail. It is also important, when dental foil is packed in books, that the dentist may use one, two, or more sheets of foil, or as many as he sees fit to use, and yet have the remaining sheets of the foil protected from the air and moisture.

To accomplish these desirable results the sheets of foil *a* are placed between the ordinary separating-leaves *a'* of a pile, the outer coverings, *b*, being waterproofed with any suit-

able composition, such as a solution of gum-shellac in alcohol, paraffine, gum-rubber, or other moisture-repelling substance or substances, and the edges *c* coated with the water-proof composition, as is shown in Figs. 7 and 8; or, if desired, the ordinary book of foil *A* may have its outer or covering sides, *d*, rendered water-proof, and its edges *e* cemented with water-proof composition, as is shown in Figs. 5 and 6. These two forms of pile or book with luted edges possess the very great advantages of permitting the user of the foil to remove from the book one, two, or more sheets of foil, as he may require them, and yet leave protected and undisturbed the remaining sheets in the book. This is simply accomplished by cutting each superimposed covering-sheet of paper, removing the foil then exposed, and leaving the rest undisturbed until all the foil has been consumed, the luted edges keeping out the moisture, and keeping the leaves in position until removed. In either of these forms the entire series of superimposed protecting-leaves may be charged with water-proof composition, if desired; but perhaps the simplest and most desirable form of making the water-proof package is to either form with or attach to the book *A*, on its under cover, a sheet cut in the manner shown at *E*, Fig. 2. This sheet has four overlapping sides, *f*, and the entire sheet, as well as the front cover, *F*, is thoroughly charged with any suitable water-proofing composition. The overlapping sides *f* are then folded over the four edges of the book *A*, and tightly cemented down upon it, as shown in Figs. 3 and 4. The result is a package easily and cheaply made, and thoroughly impervious to moisture and air.

In Fig. 9 is shown an envelope, *B*, which has been charged with water-proof composition for preserving the foil.

Packages of the kind hereinbefore described not only enable the foil to be sent to any part of the country and over the sea without impairing it, but they also protect the gold from being amalgamated by accidental drops of mercury which may come in contact with it, and also from the dust of the laboratory, and preserving the adhesive qualities of the gold for an indefinite time, if desired.

Having now described my invention, what

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

1. A water-proof package for dental foil, consisting of a pile of alternate sheets of foil and protecting-leaves, the edges of the protecting-leaves being cemented with a water-proof composition, and the outer coverings of the pile charged with such composition, substantially as and for the purpose described.

2. In a water-proof package for dental foil, the book containing the foil, in combination with a sheet of waterproofed material having overlapping sides, which inclose the edges of the book of foil, in the manner and for the purpose described.

3. A water-proof package for dental foil having the edges thereof cemented with water-proof cement, whereby the foil can be used as wanted without disturbing or exposing the remaining foil in the book to the atmosphere, substantially as described.

In testimony whereof I have signed the foregoing specification in the presence of two witnesses.

RICHD. S. WILLIAMS.

Witnesses:

H. L. WATTENBERG,
G. M. PLYMPTON.