T. J. FLOREY.

WATER CLOSET SEAT.

APPLICATION FILED AUG. 20, 1918.

1,287,942. Patented Dec. 17, 1918.

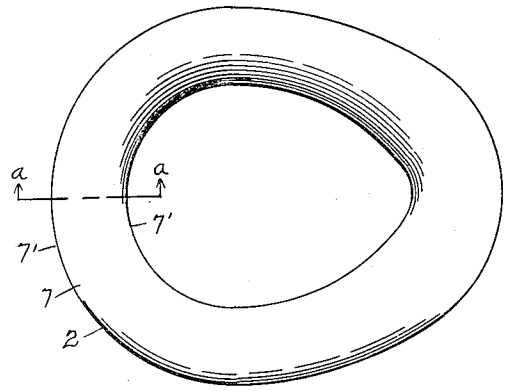

Fig. 1.

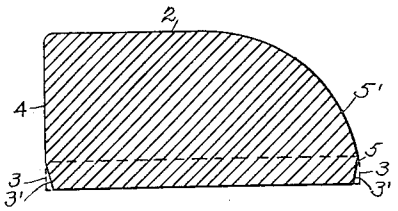

Fig. 2.

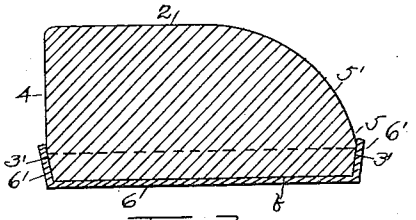

Fig. 3.

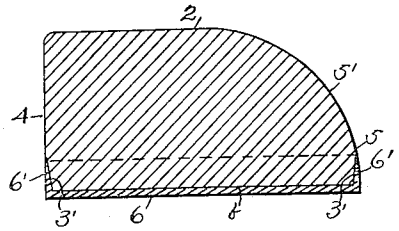

Fig. 4.

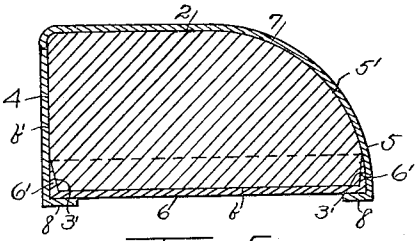

Fig. 5.

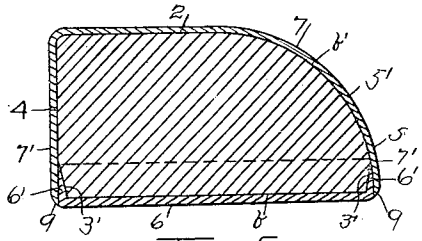

Fig. 6.

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WATER-CLOSET SEAT.

1,287,942. Specification of Letters Patent. Patented Dec. 17, 1918.

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To all whom it may concern:

Be it known that I, TILGHMAN J. FLOREY, a citizen of the United States, residing at Washington, in the county of Warren and State of New Jersey, have invented certain new and useful Improvements in Water-Closet Seats, of which the following is a specification.

This invention relates to improvements in water-closet seats, and the invention relates particularly to the covering of the ordinary wooden closet seats, and other like articles, with sheets of celluloid, "pyralin", or other nitrated substances, for rendering the said articles impervious to moisture, acids, dirt or other unsanitary and injurious conditions common to the painted or varnished wooden or metal articles heretofore in use.

The object of the invention is to effectually cover and inclose the wooden or other cores of closet seats, as well as other articles of the bath-room, kitchens, pantries, &c., with a substance which not only renders the same sanitary, but also tends to strengthen the structures and prevent the injurious effects of dampness, as well as, heat and cold. A further object is to provide a tough, hard smooth finish covering for said articles, which will stand considerable wear and abuse without checking or scaling-off so as to render them unsightly and unsanitary. A particular object is to so apply the covering to said articles that all sharp edges and rough and discolored surfaces are eliminated and obviated, and to so form the joints between the several sections or parts of the covering that there is no danger of the covering becoming loose or displaced, nor any portion of the wooden surfaces becoming exposed to urine or germs. And a further object is to generally improve, simplify and perfect the method by which coverings of the class are applied to the articles.

I attain these objects by the means set forth in the detailed description which follows, and as illustrated by the accompanying drawing, in which—

Figure 1 is a top-face view of a closet seat to which my improved covering is applied.

Fig. 2 is a cross-section, on line *a*—*a* of Fig. 1; showing the wooden core of the seat prepared to receive the covering.

Fig. 3 is a similar view; showing a sheet of the covering material adhesively applied to the bottom side of the seat.

Fig. 4 is a view showing the projecting edges of the bottom sheet trimmed.

Fig. 5 is a view showing the top covering member applied to the seat.

Fig. 6 is a view showing the margins of the top sheet trimmed—the final operation.

In the drawing, 2 represents the wooden core or body of a closet seat, which I have selected from a number of articles for illustrating my invention. The lower inner and outer edges of the closet seats are usually sharp, as indicated by the dotted lines 3 in Fig. 2. The first step in the preparation of the core 2 for the reception of the covering of celluloid or like material, is to bevel the edges 3, substantially as shown at 3′ in Figs. 2, 3, 4, 5 and 6. In the type or style of closet seats herein shown, the main outer edge 4 of the core 2 is square-cut, or substantially at right angles to the bottom plane of the core, while the opposite or inner main edge 5, which comprises the margin of the opening in the seat, is usually rounded off, as shown at 5′ in the several views.

The application of the covering is as follows: A strip or sheet of celluloid, pyroxylin or similar material 6, slightly wider than the wooden core 2, after first being softened by heat or other processes, is applied to the bottom surface of the core, as shown in Fig. 3, in which the opposite free edges of the sheet are molded or bent upwardly, as shown at 6′, to conform to the bevels or angles 3′. A suitable cement or adhesive *b* is applied between the sheet 6 and the wood, and then sufficient pressure is exerted, by a hydraulic or other press, to cause the sheet 6 to closely and evenly adhere to the core. After the sheet 6 has been suitably dried, the upturned edges 6′ are rasped or shaved off, as shown in Fig. 4, which restores the core 2 to its original shape or contour, without changing its cross-sectional area, except to slightly increase its thickness at the bottom side. The next operation consists of first softening, and then applying the top sheet 7 to the core 2, as shown in Fig. 5, in which the lateral edges 8 are bent or folded inwardly against the bottom surface of the seat covering 6, to the extent shown in Fig. 5. A similar adhesive *b*′ is employed for cementing the top sheet to the wood and to the up-

turned edges 6′, and pressure is also applied for firmly and evenly molding and securing said sheet to the core. After the sheet 7 becomes dried and hard again, the under-lapped portions 8 of said sheet are rasped or shaved off, and the corners or edges formed by the over-lapping margins of sheets 6 and 7 are rounded off, as shown at 9 in Fig. 6. The overlapping of the tapered portions 6′ of sheet 6 by the downwardly extending portions 7′ of sheet 7, produces relatively broad lap-joints, in which, during the process of applying, the celluloid parts are molded and cemented and pressed together until they become as one solid part. The peculiar rounding of the corners or edges 9 is an important feature, as it serves to protect the joints from gaping or springing open under the usual rough handling of closet seats. When closet seats are covered with the sheets 6 and 7 fashioned and applied, as herein shown and described, the life of the seats is prolonged, and the seats always present a neat and smooth appearance and are also easily kept clean. By beveling the lower edges of the core 2, affords a convenient and desirable recess to receive the tapered upturned portions 6′ of the bottom sheet 6, which preferably substantially fills the hollow corners or recesses, so that when the top covering 7 is applied, a more pleasing and symmetrical appearance is given to the seat, and besides I am able to effect a more durable and substantial covering, wherein the joints of the covering are of double thickness and are practically invisible, which greatly enhances their serviceability and the sale of the product. My invention includes the use of sheet celluloid, "blanco" pyroxylin, or any other suitable plastic or moldable substance, adapted for surface coverings.

Having thus described my invention, what I claim as new and desire to secure by Letters Patent, is—

1. The combination with the wooden body of a closet seat having its lower inner and outer edges tapered upwardly from the bottom plane, of a sheet of material such as celluloid adhesively applied to the bottom side of the body, its lateral margins bent upwardly and cemented to the tapered portions of the body, a second sheet of similar material adhesively applied to the top and opposite edge surfaces of the body, the opposite margins of said sheet over-lapping the upturned tapered margins of the first sheet and the edges of the second sheet adjacent the plane of the bottom of the body rounded off for rendering the joints between the sheets invisible from the top and edges of the seat.

2. The combination of the wooden core of a closet seat having its lowermost edges beveled so as to contract the bottom surface of the core, a strip of plastic material such as pyroxylin cemented to the bottom surface and to the beveled portions of the core, and a second strip of the same material molded and cemented to the top and lateral surfaces of the core, the lateral edges thereof lapping the upturned margins of the first strip and cemented thereto and the depending edges of the second strip and the corners of the first strip rounded off adjacent the plane of the bottom of the core.

3. A water-closet seat, comprising a wooden core having its lower inner and outer edges tapered upwardly for providing continuous recesses, a strip of plastic material such as celluloid adhesively applied to the bottom side of the core, said strip being wider than the core and its projecting margins being bent upwardly and conforming to and filling said recesses, a second strip adhesively applied to the top and lateral surfaces of said core, said strip having a breadth greater than the core and its lateral margins overlapping said upturned margins of the first strip and rounded off for rendering the joints between said strips invisible except from a bottom view of the seat.

In testimony whereof I affix my signature.

TILGHMAN J. FLOREY.