M. L. DERICK.

GOSSAMER FABRIC AND PROCESS OF MANUFACTURING THE SAME. No. 344,086. Patented June 22, 1886.

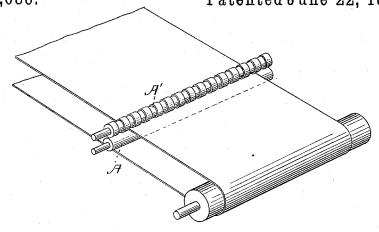


Fig-

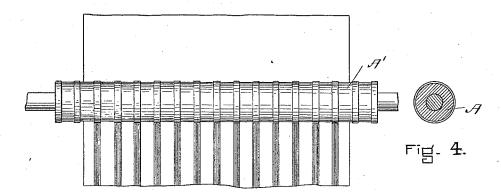
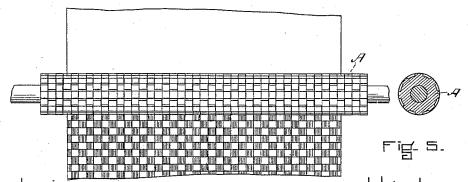


Fig. 2.



WITNESSES. Fred Bola J. M. Dolan

Fig.3-

United States Patent Office.

MYRON L. DERICK, OF BROCKTON, MASSACHUSETTS.

GOSSAMER FABRIC AND PROCESS OF MANUFACTURING THE SAME.

SPECIFICATION forming part of Letters Patent No. 344,086, dated June 22, 1886.

Application filed March 27, 1886. Serial No. 196,746. (Specimens.)

To all whom it may concern:

Be it known that I, MYRON L. DERICK, of Brockton, in the county of Plymouth and State of Massachusetts, a citizen of the United 5 States, have invented a new and useful Improvement in Gossamer Fabrics and Process of Manufacturing the Same, of which the following is a full, clear, and exact description, reference being had to the accompanying 10 drawings, forming a part of this specification

in explaining its nature.

The invention relates to that class of gossamer goods known as "electric or silver-finished gossamer," or goods which are finished upon 15 their surface with powdered potato-starch; and it consists in providing such goods with an ornamental or figured surface of any character or design, and also to the method or process of manufacturing the same.

Referring to the drawings, Figure 1 represents in perspective a portion of the mechanism employed in the process. Fig. 2 is a plan view of a portion thereof enlarged, showing the pattern or figure on the goods. Fig. 3 is 25 a like view to that shown in Fig. 2, representing a somewhat different pattern or figure on the roll and goods. Figs. 4 and 5 are end views of the roll.

In the manufacture of the goods the fabric 30 which forms the base or support for the rubber or water-proof surfacing is treated with one or more coats or layers of the water-proof or rubber composition. It is then surfacecovered with finely-pulverized potato starch, 35 and it is then, before it is sun dried or cured, immediately subjected to the action of the figuring-rolls, which impress upon the coated surface of the fabric the design or figure which it is desired it shall have. The fabric is then 40 completed by exposure to the sun.

In the drawings, I have represented only so much of the mechanism as is used for producing the design or figure upon uncured goods; and A represents a plain or smooth-45 surfaced roll of suitable length, which is mounted in proper bearings or supports, (not shown,) and A' is a roll placed above the first named, and having formed thereon the design or figure which it is desired to give to the sur-50 face of the fabric. This roll is also mounted in suitable bearings. The design or figure may

produced by the roll shown in Fig. 2 of the drawings, or it may be of any other form of line-work, or in the form of squares, as shown 55 in Fig. 3, or figured, or in fact of any form or design that can be engraved or formed up-on an impressing-roll. The fabric, after it has received the last coating of water-proof material, and having been surface-coated with 60 the potato-starch, is passed between the two rolls A A', and the rolls set upon it sufficiently to cause the impression to be given to the surfacing-coating of the fabric, and the movement of the goods through the rolls is 65 sufficient to cause them to revolve.

The fabric, after it has been treated, is removed and finished or treated by exposure to the sun, and this sets the figure or design which has been previously formed or made, 70

so that it becomes permanent.

The figure is formed not so much by impressing or sinking the surface of the material as by rolling such portions of the surfacing of potato starch into the coating of the goods as 75 the upper roll shall come in contact with as the material is passed by it; and this rolling action gives such portions of the fabric as come in contact therewith a dull finish, which forms a contrast with the silvery finish provided by 813 the potato-starch.

Of course I would not be understood as limiting the invention to a fabric in which the silvered effect or finish is obtained by potatostarch, as the same result would follow if any 85 other finishing-powder of any other color were employed in lieu of the potato-starch.

I am aware of the British Patent No. 6,399, dated April 16, 1884, and also of the United States Patent No. 322,601, dated July 21, 1885, 90 and of the process therein described; and I would say that I do not claim anything therein shown and described, as I do not make a fabric with a design in relief or in intaglio, as I do not use rolls for producing such design, 95 as I do not cure the goods as therein stated, and as the character of the goods which I make is very different from those therein described.

Having thus fully described my invention, I 100 claim and desire to secure by Letters Patent of the United States-

1. The process of manufacturing figured gosbe in the form of parallel bars, as would be samer fabrics, consisting in surface coating the fabric with a water-proof composition, then covering the same with a finishing-powder, then impressing or forming a figure or design upon such surface by rolling portions of the finishing powder or material into the coating of the fabric, and then solarizing or curing the fabric, all substantially as described.

2. The improved article of manufacture, consisting of a gossamer fabric surface-coated to with a water-proof composition, and having

its surface provided with figures or designs by means of a finishing surfacing-powder, portions of which are rolled into the coating of the fabric, to provide a figure or design, substantially as described.

MYRON L. DERICK.

Witnesses:

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