Nov. 10, 1925. 1,560,712

R. C. NAYLOR

SEAM FOR GARMENTS

Filed July 21, 1921

Fig. 1.

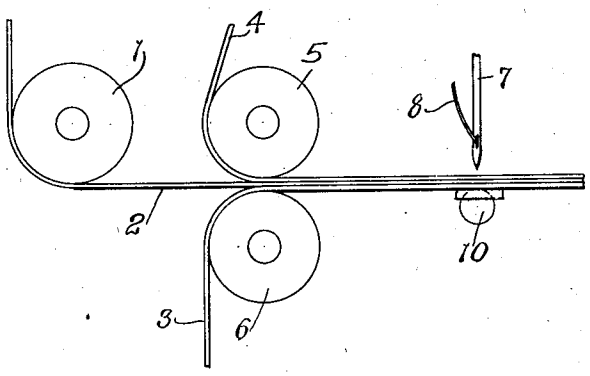


Fig. 2.

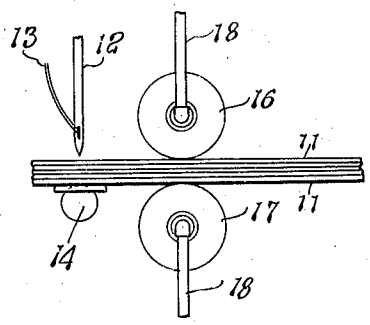


Fig. 3.

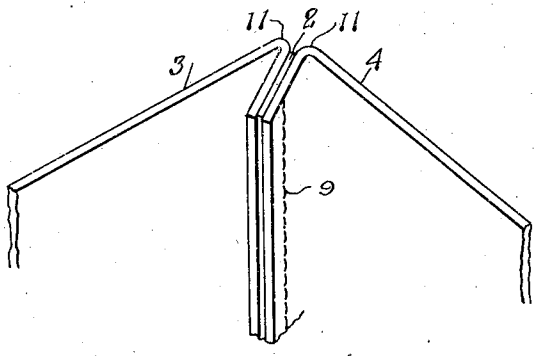


Fig. 4.

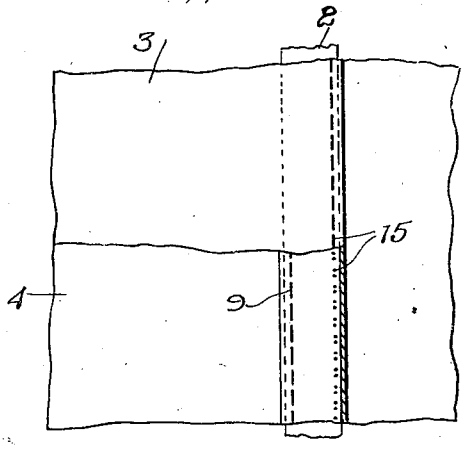
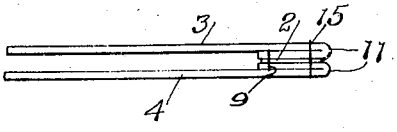


Fig. 5.



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Patented Nov. 10, 1925. 1,560,712

UNITED STATES PATENT OFFICE.

ROBERT C. NAYLOR, OF DAYTON, OHIO, ASSIGNOR TO THE GEM SHIRT COMPANY, OF DAYTON, OHIO, A CORPORATION OF OHIO.

SEAM FOR GARMENTS.

Application filed July 21, 1921. Serial No. 486,559.

To all whom it may concern:

Be it known that I, ROBERT C. NAYLOR, a citizen of the United States, residing at Dayton, in the county of Montgomery and State of Ohio, have invented certain new and useful Improvements in Seams for Garments, of which the following is a specification, reference being had therein to the accompanying drawing.

My invention relates to garments, and in particular to seams for garments and the water-proofing of the seams. It also relates to the method by which the seams are manufactured.

The object of the invention is to provide a water-proof seam for water-proof garments, receptacles and the like.

Heretofore, it has been difficult to secure seams that were water-proof and would remain water-proof. It has been the practice to cement the seams or otherwise endeavor to make the two portions of a garment or receptacle water-proof by joining them permanently, but these means are both expensive and unsatisfactory.

It is the present object of the invention to provide an article which will have seams that will remain permanently water-proof but will not necessitate the use of any glues, adhesives or other substances, such as are now used in the manufacture of garments.

Referring to the drawings:

Fig. 1 is a side elevation of the apparatus for making the water-proof seams;

Fig. 2 is a side elevation of another portion of the apparatus for making the water-proof seams;

Fig. 3 is a perspective from the inside of the seam after one row of stitching has been applied;

Fig. 4 is a plan view of the completed article with two rows of stitching applied;

Fig. 5 is a section of the fabric-folded on itself.

Referring in detail to the drawings, 1 is a roll guiding rubberized fabric or other water-proof material. 2 is the water-proof material being guided by the roll 1 and passing between the strips of water-proof cloth 3 and 4 that are guided into position by the rolls 5 and 6. A needle 7 stitches a thread 8 through the cloth and water-proof material, thus inserting the line of stitching 9 (see Fig. 3). 10 is the bobbin. The cloth is then turned over upon itself and bent as at 11—11. It has the arrangement when folded such as shown in Figure 5. The needle 12, with the thread 13, in conjunction with the bobbin 14 inserts the second row of stitching 15. The folded seam then passes between heated rollers 16 and 17 heated by gas carried through pipes 18 or under an iron. The means of applying the heat and pressing the seam is immaterial.

It is not essential that the second row of stitching pass through all four layers of the fabric as it may pass through three layers when a flat seam is to be formed with the fabric projecting in either direction as in a garment. It is also not essential that the second row of stitching pass through the rubberized compound, but I prefer these forms under certain conditions.

The result of this heat is to cause the rubber in the rubberized fabric or any other similar water-proofing compound on the intermediate water-proofing strip to flow into the holes made by the stitching and to completely seal the seam. It also flows into the interstices in the fabric itself.

While I have shown and described certain features as constituting my invention, it will be understood that parts have been shown for purposes of illustration only, and that I do not desire to be limited to such details, as obvious modifications will occur to a person skilled in the art.

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

A waterproof seam for fabrics comprising a pair of fabric members and a narrow strip of waterproof material, the waterproof material being interposed between the fabric members at one edge of each, said fabric member edges and one edge of the waterproof strip being alined, a row of stitching extending through the fabric members and the waterproof strip at said alined edges, folds in said fabric members alined with the remaining edge of the waterproof strip, and a second row of stitching extending through the folds and the waterproof strip.

In testimony whereof, I affix my signature.

ROBERT C. NAYLOR.