## H. J. & W. D. DAVIES. Felt-Fabrics.

Patented Aug. 31, 1875. No. 167,310.

## UNITED STATES PATENT OFFICE.

HENRY J. DAVIES AND WALTER D. DAVIES, OF BROOKLYN, N. Y., ASSIGNORS TO JAMES G. BENNETT AND ANDREW H. SMITH, OF SAME PLACE.

## IMPROVEMENT IN FELT FABRICS.

Specification forming part of Letters Patent No. 167,310, dated August 31, 1875; application filed March 6, 1875.

## CASE A.

To all whom it may concern:

Be it known that we, HENRY J. DAVIES and WALTER D. DAVIES, both of Brooklyn, in the county of Kings and State of New York, have invented a new and useful Improvement in Felt Cloths for the Manufacture of Ladies' Skirts and other articles; and we do hereby declare that the following is a full, clear, and exact description of the same, reference being had to the accompanying drawing forming part of this specification.

This invention consists in a felt cloth manufactured with its selvages of such unequal lengths that when said fabric is laid flat it has a curved shape, its selvages presenting the form of arcs of different radius. Such cloth, although applicable to other purposes, is mainly designed for making ladies' skirts, which can be made of it with only a single seam and without waste.

The accompanying drawing represents a felt cloth or fabric of curved form on its edges in direction of its length, said edges, in shape, constituting arcs of different radius.

In the manufacture of our felt cloth we propose ordinarily to make the bat from which it is produced by the process commonly practiced in the manufacture of felt cloth, except that, instead of the usual carding-engine, we propose to employ one having a conical doffer, and otherwise constructed to produce a curved bat, substantially, for instance, as described in Letters Patent No. 155,503, issued to us September 29, 1874. The "former" or "creeper," too, which may consist, as usual, of two aprons for laying the laps one upon the other to form

the bat, should have its rollers conical instead of straight, and be suitably arranged, and the aprons of greater length on the one side of the creeper than the other, to form the curved bat, which may be afterward hardened, fulled, washed, and sized in the ordinary or in any other suitable manner.

A felt cloth may thus be produced the width of which will be equal to the required length of the skirt, and which may be cut into lengths corresponding with the circumference of the skirt, so that it will only be necessary to unite the ends of a length, by sewing or otherwise, to make a skirt of larger circumference at its bottom than at its top and with a single seam.

By this invention, not only may a better skirt be produced, but the production may be materially cheapened over, or as compared with, a skirt made up, in the usual way, of sections cut from a felt cloth having its selvages straight or parallel with one another.

We do not confine ourselves to the particular process herein described of manufacturing the fabric; but

We claim-

An article of manufacture from which to make ladies' skirts, &c., consisting of a felt cloth of a curved form, having selvages which present arcs of different radius and length, as and for the object specified.

HENRY J. DAVIES. WALTER D. DAVIES.

Witnesses:

BENJAMIN W. HOFFMAN, A. J. DE LACY.