

(No Model.)

M. A. START.

CHART FOR DRAFTING LADIES' AND CHILDREN'S GARMENTS.

No. 251,963.

Patented Jan. 3, 1882.

Fig. 1

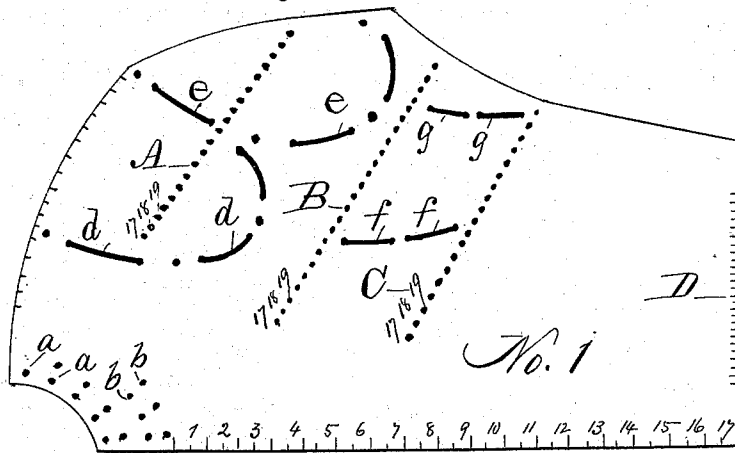


Fig. 2

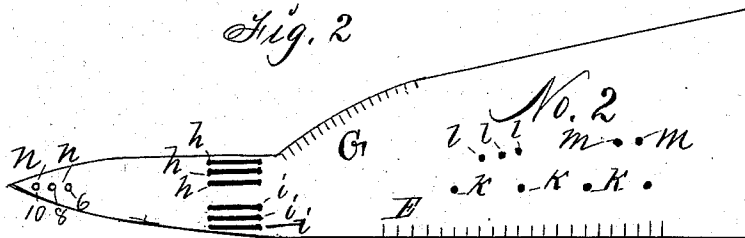
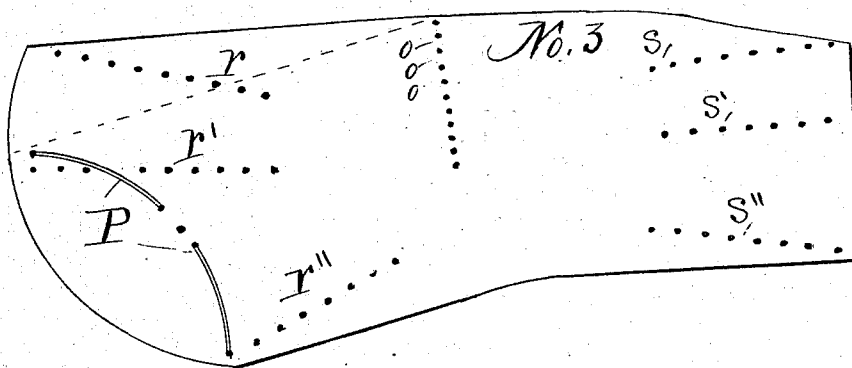


Fig. 3



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UNITED STATES PATENT OFFICE.

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CHART FOR DRAFTING LADIES' AND CHILDREN'S GARMENTS.

SPECIFICATION forming part of Letters Patent No. 251,963, dated January 3, 1882.

Application filed August 20, 1881. (No model.)

To all whom it may concern:

Be it known that I, MAY A. START, of Cherokee, in the county of Cherokee and State of Iowa, have invented an Improved Set of Dress-Charts, of which the following is a specification.

The object of my invention is to facilitate the drafting and cutting and improve the forms and the fitting of ladies' and children's garments.

Heretofore three or more charts of various forms have been used; but my invention is nevertheless novel and advantageous.

It consists in forming a complete set of charts in three pieces adapted to be unitarily used, as hereinafter fully set forth.

Figure 1 of my drawings represents chart No. 1 of my set—twenty-two inches long and fourteen wide at its upper portion. It has a concave and curved edge at its front and upper corner to produce the form required to fit to the neck of the person. *a a* are corresponding and parallel lines of perforations, to be used in marking out the patterns for high or low necked children's dresses. *b b* are corresponding lines of perforations below the lines *a*, to be used for drafting high or low necked garments for adults or large persons. On the front and straight edge, extending downward from the lines of perforations *b*, is an inch-measure, printed or otherwise permanently fixed. Along the top and convex edge is a shoulder-scale. *A B C* are corresponding scales and lines of perforations, extending diagonally and in nearly parallel position relative to each other downward and rearward from the front and upper portion of the chart. *d d* is a child's arm-size, formed of a curved line of slots and perforations. *e e* is a corresponding arm-size for adults. Both of these arm-sizes are adapted for drafting that portion of the front of a dress to which the sleeve is to be attached. *f f* and *g g* are arm-sizes adapted for shaping that portion of the back of a dress to which the sleeve is joined. *D* is a scale, extending along the straight and lower edge of the chart from the front portions rearward toward the bottom of the concave rear side of the chart.

Fig. 2 represents my No. 2 chart or dart-piece, adapted to be used, in combination with the chart No. 1, in shaping the front and back

and skirt of dress. *E* is a scale on its front and straight edge and lower portion. *G* is a scale on the upper end of the convex portion of the rear edge. *h h h* are parallel slots at the upper end of the scale *G*. *i i i* are corresponding slots on the front edge, in parallel position with the slots *h*. *k k'* represent a series of perforations in the front and lower portion, formed in a straight line parallel with the scale *E*. *l l* are perforations in rear of the top portion of the line of perforations *k*. *m m* are perforations in line with the perforations *l*, at some distance below, and, together with the perforations *l*, form an inclined line relative to the straight line of perforations *k*. *n n* represent a line of perforations in the pointed top end.

Fig. 3 represents the No. 3 chart of my complete set, and is shaped like an upper sleeve. It has a line of perforations, *o o*, extending at right angles relative to the elbow-point. *P* is an arm-size, composed of a curved line of slots and perforations adapted for shaping the upper end of the under sleeve. *r, r', and r''* are lines of perforations that converge from the upper end of the sleeve or chart downward toward the center. *s, s', and s''* are lines of perforations that converge from the lower end upward toward the central portion of the chart.

In the practical use of my set of charts thus formed of paper-board, or any other suitable material, it is necessary to first obtain the size of a person for whom a garment is to be drafted and cut by actual measurement, as follows:

For cutting a waist: first, around the bust immediately under the arms; second, around the waist; third, from most prominent bone in the back of the neck to bottom of waist; fourth, from the most prominent bone in front of neck to the bottom of the waist.

For cutting a skirt: first, around the waist; second, around the hips; third, the desired length of the skirt.

For a sleeve: first, under the arm to the point of the shoulder; second, the desired length of the sleeve on the inside of the arm.

To make the garment tight or loose the measure is drawn tight or loose accordingly.

To draft and cut the front of a waist for an adult I lay the chart No. 1 lengthwise on the goods, allowing for a hem. For rather a low

neck I form the neck by means of the second row of perforations, *b*; for a high neck, the first or highest row. If the bust measure, for example, is thirty-six inches, I mark the point on the cloth indicated by the figures 36 in the shoulder-scale. I next mark the point 36 in the scale *A* to obtain the location of the under arm-seam. I then adjust the chart and lay the front arm-size *e e* on the mark made at 36 on the shoulder-scale, and also on the mark made at 36 on the scale *A*, in such a manner that the ends of the arm-size will extend equal distances and in opposite directions from each one of the two dots or marks, and draw a curved line between the two dots or marks, as directed by the arm-size. I next take the dart-piece, (chart No. 2,) and lay it across the goods, the broad end even with the front waist-line and the top even with the last dot under the arm, and mark the dots through the perforations. I measure the length of waist from chart and draw a straight line for bottom of waist.

To get the proper size of dart I subtract the waist from the bust measure. I put the size of dart on the front dot just made, keeping the straight edge even with the goods. Marking the size of dart on the waist-line, put the line that is drawn crosswise of the dart-piece and over with the waist-line; mark the size of dart on bottom of waist; then line it from bottom of waist to bust-dot and from the bottom of waist to the dot below the waist; form the back dart the same, excepting slanting it in a little, drawing a straight line down to waist from the dot under the arm; mark the under arm-dart half-way between the back dart and the line just made under the arm. I make the under arm-dart two-thirds as large as the front darts; mark it the same size at the top as at the bottom; allow the width of the dart on the under arm-seam and a seam besides.

I mark out or draft the skirt of a basque the same as for a skirt.

To cut the back of a waist I lay the chart No. 1 lengthwise upon the goods; observe the perforations *a* and *b* for high or low neck; follow down the scale *B* (third line of figures from top of the chart) until I come to the bust-measure 36, and there mark the shoulder-point. Then I make a mark at 36 for the under arm-seam; mark the shoulder by putting it opposite from the front; then take the back arm-size, *g g*, lay it on the shoulder-dot and under arm-dot; leave both ends of the arm-size the same distance from each dot. I measure the length of waist with inch-measure and draw a straight line from waist-line. I lay the chart three inches from the neck and make one-inch taper; put the bottom of the chart even with the line just made and the waist-line; follow the last row of figures on the bottom of the chart (scale *D*) until I come to the waist measure, mark, or number; put the straight edge of the chart even with the dot under the arm and waist measure and mark.

To get the shoulder form, have the seam

one-third from neck and two-thirds from point of shoulder, one-third from back seam, and two-thirds from under arm-seam. To have the seam go to arm-size one-third from the top under arm-seam and two-thirds from point of shoulder, one-third from back seam, and two-thirds from the under arm, form for a sack one-half between the under arm and back seam. I mark it with the back arm form, allowing for seams.

To cut the upper half of sleeve I lay the sleeve-chart (No. 3) so as to have the front side straight with the goods; take the size of the sleeve and mark in the perforation both at the top and bottom of the chart; lay the front side of the chart even with the front dots; measure the length of the sleeve with the inch-measure on the inside of the sleeve; leave the same distance at the top as at the bottom; lay the back of the sleeve-chart on the dots, leaving the same distance at the top as bottom; lay the top of charts even with the dots; leave the same distance at each side of chart.

To cut the under side of sleeve I lay the chart the same as the top, except mark the inside row of perforations at top, bottom, and the elbow; allow for seam. To cut the front gore of skirt I take the dart-piece, (chart No. 2,) and lay the broad end even with the goods; follow the figures until I come to the waist-measure; take the measure of the hips; put it even with the waist-line; keep the broad end crosswise of the goods; mark down to the bottom of the dart-piece; take the straight side and mark down the bottom of the skirt; hollow out the front gore from one-fourth to one-half inch. To cut the side gore put the perforation on the straight edge of the goods, keeping the broad end crosswise of the goods; put the broad end on the line just made, and follow the line of figures till I come to the bust-measure; take the hip-measure and lay it on the mark just made; keep the broad end crosswise of the goods and mark down to the bottom of the skirt; hollow from one-fourth to one-half inch; allow for seams, and commence at the top to baste.

Well-shaped and good-fitting garments may be thus readily drafted by means of my set of charts for young and old, large and small, persons, by first obtaining the several measures, as before stated, and then applying them as stated in the example given.

I claim as my invention—

1. In a set of dress-charts, the part No. 1, having lines of perforations *a b d e*, scales *A*, *B*, *C*, and *D*, and arm-size *f* and *g*, substantially as shown and described, for the purposes specified.

2. In a set of dress-charts, the part No. 2, having scales *E* and *G*, parallel slots *h* and *i*, and lines of perforations *k l m n*, substantially as shown and described, for the purposes specified.

3. In a set of dress-charts, the part No. 3,

having arm-size P and lines of perforations *o r s*, substantially as shown and described, for the purposes specified.

4. The set of charts consisting of the form
5 No. 1, having lines of perforations *a b d e*, scales A, B, C, and D, and arm-size *f* and *g*, the form No. 2, having scales E and G, parallel slots *h* and *i*, and lines of perforations *k l m n*,

and the form No. 3, having an arm-size, P, and lines of perforations *o r s*, substantially as shown and described, to be unitarily used for drafting garments, in the manner set forth.

MISS MAY A. START.

Witnesses:

S. S. START,
Mrs. J. P. HOWE.