

# Hems

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**H**ems are an important part of any garment and can be handled in many ways. The manner in which a hem is handled depends on the *style of the garment* (full or slim), the *location of the hem* (sleeve, skirt, etc.), the *fabric being used*, and the *occasion or mood for which the garment is designed* (casual, evening, fun, etc.). As with most construction techniques, there are decisions to be made. This publication is designed to help you make those decisions with greater confidence.

## Standards of a Well-Made Hem

A well-made hem should:

- be inconspicuous on the right side of the garment, except when the hem is designed to be a decorative feature.
- be an appropriate distance from the floor.
- be even in width throughout and an appropriate depth for the fabric and garment design.
- be free from unnecessary bulk created by seams and other construction techniques which fall within the hem area.
- have fullness eased in and evenly distributed for a smooth, flat appearance.
- have the edge appropriately finished for the type and weight of the fabric.
- be secured neatly and in a manner appropriate to the edge finish, the fabric type, garment design, and hem depth.

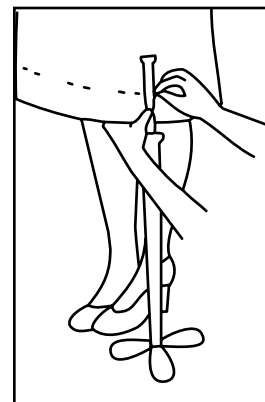
## Adjusting and Measuring Length

Before you try to level the hem, hang the garment on a hanger overnight to allow for any stretching or sagging. After the garment has hung overnight, try it on over the undergarments you plan to wear. Put on shoes of the type and heel height that you will wear with the garment. Close all openings, adjust belt, and make sure the garment is hanging correctly on your body. This should help you decide on a length that is becoming and fashionable.

### Methods of Measuring

**With a Helper:** While standing on a firm surface, have the helper mark the hem length with a hem marker or yardstick, placing pins about 3 inches apart and parallel to the floor. A flared skirt requires placing the pins closer together.

For a level hem, stand still on a flat, uncarpeted surface while the helper moves around the garment to mark the hem length (**FIGURE 1**).



**Figure 1.** Marking a level hem.

**Without a Helper:** Marking a hem without a helper is usually more difficult and less accurate. However, there are occasions when a helper is not available. If you find yourself in this situation, you may decide to purchase a powdered chalk-type hem marker (FIGURE 2).

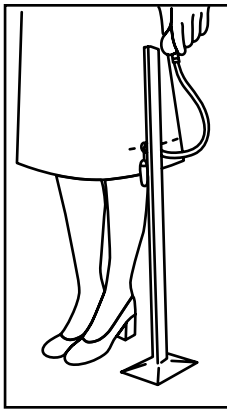


Figure 2. Marking a level hem.

Another alternative is to attach a piece of string across a doorway, the same distance from the floor that you want your hem (FIGURE 3). Carefully apply powdered chalk to the string. Move close to the string and allow it to leave a chalk line in locations on all sides of the garment.

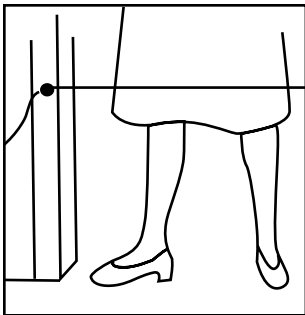


Figure 3. Marking a level hem.

## Hem Depth

The hem depth should be considered after you have marked the proper hem length on the garment. The depth of a hem will depend on the *garment style*, the *location in the garment*, and the *fabric*.

After determining the length, trim seam allowances below the hemline to  $\frac{1}{4}$ -inch (FIGURE 4), reducing bulk that can cause ridges when the hem is pressed. Then baste close to the fold of the hem, measure the hem depth, and trim evenly (FIGURE 5). Press the hem with brown paper between the hem and the garment, steaming out fullness (FIGURE 7). The brown paper will prevent the hem edge from creating a mark on the right side of the fabric.

A hem edge must be eased when the lower edge of the garment is larger or slightly fuller, as with an A-line style. To ease, stitch  $\frac{1}{4}$ -inch from the raw edge, using long stitches. Pull up the ease thread every few inches (FIGURE 6). Try to shrink out the fullness with a steam iron (FIGURE 7).

When a garment is full or circular, the depth of the hem must be reduced to eliminate excess fullness and bulk (FIGURE 8). Mark the hem for a depth not to exceed 1 inch. A narrow hem is also frequently recommended for woven sheers and lightweight fabrics.

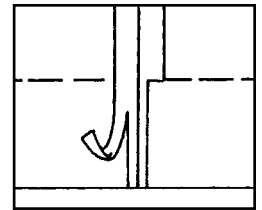


Figure 4. Trim seam allowances.

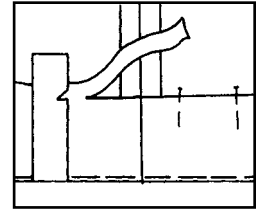


Figure 5. Trim hem.

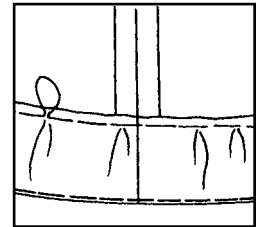


Figure 6. Pull up the ease thread.

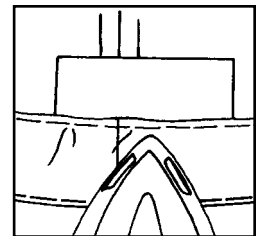


Figure 7. Press the hem.

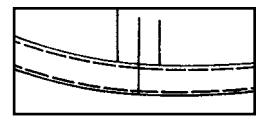


Figure 8. Reduce hem depth.

Hem Depth Chart		
Garment	Style	Hem Depth Inch(es)
Dresses, Skirt	Straight	2 $\frac{1}{4}$ - 3
	A-line	1 $\frac{1}{2}$ - 2
	Full	$\frac{1}{2}$ - 1
Pants		1 $\frac{1}{2}$ - 2
Shirts, Tops	Tuck-in	$\frac{1}{4}$ - $\frac{1}{2}$
	Pullover	1 - 1 $\frac{1}{2}$
Sleeves		1 - 1 $\frac{1}{2}$
Jackets, Coats	Lightweight	1 $\frac{1}{2}$ - 2
	Heavyweight	2 - 3

## Securing the Hem

The type or method of hem edge finish is determined by the *type of fabric* (e.g., knit, woven, felted). If the raw edge of the hem ravels, curls, runs, frays, or stretches, it requires a finishing technique.

The hem finishing technique dictates the manner in which the hem should be secured. Finishing techniques include machine or hand stitching with thread or fusing with narrow strips of fusible web. The finishing technique also determines the choice of hand stitches. Refer to Cooperative Extension publication CT-MMB.002, *Hand Stitches*, for specific directions for hand stitches.

### Machine-Stitched Hems

While most hems on fine garments are secured by hand stitching, a machine hem can be used. Machine hems can be as simple as regulation stitching along the folded edge of a lightweight to medium-weight, cotton-like fabric or as complex as multiple rows of decorative stitches that resemble a fancy border design. A machine hem is often selected for use on casual wear, children's garments, and sleepwear. Machine hems are also used on household textiles and linens, including draperies and some curtains.

Many of today's new sewing machines have control settings for a machine blindstitch hem. Check your machine's instructions for specifics. Perfecting the machine blindstitch hem generally takes practice so that it meets the standards of a well-made hem found on page 1 of this publication.

Stand-alone hemming machines are now available for home purchase and use. The hemming machine uses a single thread to form its hemstitch. Similar to a chain stitch, the stitch can be removed easily for adjustments to the hem length.

### Fused Hems

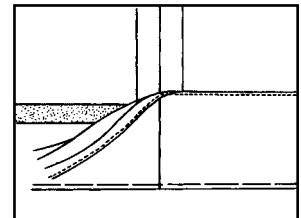
Narrow strips of a commercial sewing fusible web can be used to hold hems in place instead of thread. In some circumstances, a fused hem might be preferred. However, before selecting this method, be sure the fabric and the hem edge-finishing technique can withstand the heat required to fuse the area.

To fuse, cut a strip of fusible web 1/4-inch wide, or use precut strips of web. Insert the web between the hem and the garment fabric, making sure it is about 1/4-inch short of the hem's edge. Fuse in place following the manufacturer's instructions (**FIGURE 9**).

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**Tip:** Always test fusible web on a scrap of the fabric being used to make sure the fused web hem will not be visible on the right side of the item. Some fabrics tend to let the web show through, giving the hem a glued look or leaving a visible line of demarcation.

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**Figure 9.** Fused hem.

A fused hem works well on many lightweight knit fabrics. Fusible web is available in a “no sew” and a sewable version. Both types add some stability and firmness to the hem, preventing it from stretching. Avoid using the “no sew” variety when topstitching, because it can “gum” the machine needle and cause skipped stitches.

## Edge Finishes

Different types of fabrics and the hem-finishing techniques they require are covered below. The appropriate stitch or method of securing is listed for each.

### Woven Fabrics

Woven fabrics need the edge of the hem finished because the fabric will ravel. This can be done with thread (machine zigzag or overcast), with some type of fabric covering (applied binding), or with special handling (turned under and stitched).

### Machine Zigzag

The machine zigzag can create a nice finished edge for ravelly medium-weight to light heavyweight fabrics, such as corduroy, denim, suit-weight linen, and suit-weight cotton. Adjustments to the stitch density is usually necessary. Position the fabric so the stitching is approximately  $\frac{1}{8}$ -inch away from the edge of the hem edge. Trim fabric edges back to the line of zigzag stitching (FIGURE 10).

**Securing the Hem:** Hand-catch stitch (FIGURE 11), machine topstitch, or fuse.

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**Tip:** The greater the tendency of the fabric to ravel, the more dense (closer together) the zigzag stitches need to be. Adjust stitch length accordingly.

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### Machine Overcast

The machine overcast creates a nice finished edge for medium-weight to heavyweight fabrics that ravel easily, such as corduroy, denim, suit-weight linen, and cotton. Most of today's newer sewing machines will have at least one machine overcast stitch and/or a special overcast presser foot. Some older machines can be set on a medium density zigzag stitch. The fabric edge must be positioned so the needle wraps the thread around the outer edge of the fabric. Some machines will "chew" the fabric edge when attempting this procedure. Test your machine on a scrap before using it on a hem edge.

**Securing the Hem:** Hand catch stitch (FIGURE 11), machine topstitch, or fuse.

### Serge (3-Thread)

The serger/overlock machine can be used to create an edge finish similar to the sewing machine overcast. This finish can be used on all fabric weights. Thread and set serger for a 3-thread overlock stitch. When stitching, guide the hem edge of the fabric under the presser foot to allow the cutting blade to trim a "hair's" width from the fabric.

**Securing the Hem:** Hand catch stitch (FIGURE 11), machine topstitch, or fuse.

### Turned Under

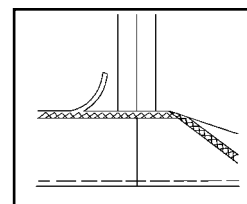
Turned under is a finish used for lightweight to mediumweight fabrics and sheer and limp fabrics. To construct, turn the raw edge of the fabric under  $\frac{1}{4}$ -inch. Press in place (this may also be stitched in place approximately  $\frac{1}{8}$ -inch from the folded edge; omit stitching on sheer fabric).

**Securing the Hem:** Hand slipstitch (FIGURE 12), or single/multiple machine topstitch.

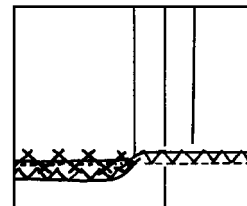
### Seam Tape, Flexible (Stretch) Lace

These materials are used occasionally on lightweight to medium-weight fabrics that have a tendency to ravel. Care must be taken that excess bulk is not created with their use. To construct, sew the tape/lace so that it laps over all but approximately  $\frac{1}{8}$ -inch of the edge of the fabric (FIGURE 13).

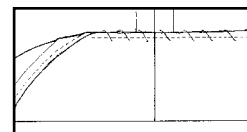
**Securing the Hem:** Hand-hemming stitch (FIGURE 14 OR 15).



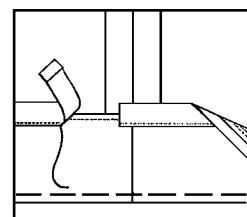
**Figure 10.** Trim fabric edges back to the line of zigzag stitching.



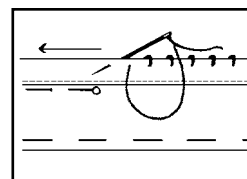
**Figure 11.** Hand catch stitch.



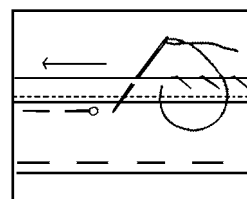
**Figure 12.** Hand slipstitch.



**Figure 13.** Seam tape, flexible lace.



**Figure 14.** Hand hemming.



**Figure 15.** Hand hemming.

## Bound (Tricot Binding, Bias Tape, Hong Kong)

Bound edges make an excellent finish for many types of fabric and for a number of locations within a garment. For example, a bound edge is a good selection for an unlined jacket because it is neat and attractive. To construct using binding or tape, place the binding or tape around the hem edge and machine stitch in place. Stitching can be straight or a fine-line zigzag. Again, take care that these materials do not add bulk to the hem area. For more information on the Hong Kong finish, see Cooperative Extension publication FCS2-304, *Seams and Seam Finishes*.

**Securing the Hem:** Hand slipstitch (FIGURE 16). When using heavy fabric or a fabric that has a tendency to mark or show on the right side, slipstitch along the back edge of the fold. Fusing might be used with Hong Kong or bias tape. Fuse below the line of stitching.

## Pinked and Stitched

This is used *only* on fabrics that do not ravel (e.g., felt) or when the hem is to be concealed (e.g., a firmly woven wool fabric used to make an item that is lined). Stitch 1/4-inch from the hem edge and pink close to line of stitching.

**Securing the Hem:** Hand-catch stitch (FIGURE 17). Fusing may be appropriate, depending on the fabric.

## Knit Fabrics

Knit fabrics do not ravel; however, some may have a tendency to run, roll, or curl. A double needle works well for machine topstitching knit hems.

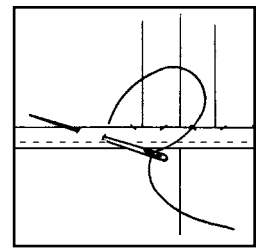
## Edge Stitched

Firm/stable double knits, as well as medium and heavyweight knits, generally do not need any type of hem edge finish. A row of machine stitching is frequently done approximately 1/4-inch from the hem edge. This line of stitching can be used to ease the hem if needed and as a guide for hand stitching it in place.

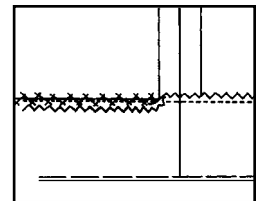
**Securing the Hem:** Hand-catch stitch (FIGURE 17), fuse, or machine topstitch.

For lightweight knit fabrics that tend to curl or roll, treat the hem edge in the same manner as described above.

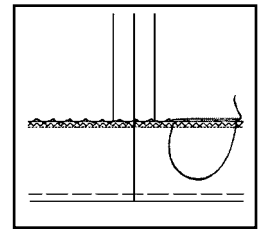
**Securing the Hem:** Loosely hand-catch stitch across the top edge of the hem (FIGURE 18). If the hem forms a ridge that can be seen from the right side, remove and catch stitch from the back side of the hem (FIGURE 17). Also, machine topstitch with double needle (FIGURE 19), or fuse.



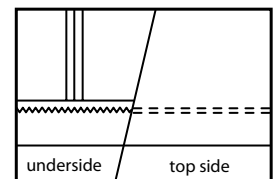
**Figure 16.** Hand slipstitch.



**Figure 17.** Hand-catch stitch.



**Figure 18.** Loose hand catch stitch.



**Figure 19.** Bobbin thread forms a zigzag on underside when double needle is used for topstitching.

## Using the Edge Finish as the Hem

Sometimes the hemming process can be simplified by using the edge finish as the finished hem. Depending on your fabric, choose either a shirttail hem, narrow rolled serged hem, or a scarf edge hem.

### Shirttail Hem

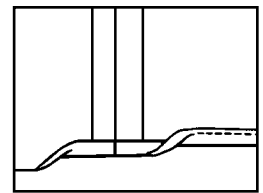
The shirttail hem is a narrow machine-stitched hem used for light weight to medium-weight woven fabrics. This method may also be used for finishing the edge of ruffles as well as shirts. Trim hem allowance to  $\frac{5}{8}$ -inch. Press under  $\frac{5}{8}$ -inch, forming a crease line. Unfold and fold raw edge to crease line and refold. Stitch close to top edge of second fold (**FIGURE 20**).

### Narrow Rolled Serged Hem

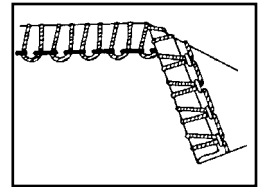
By changing the throat plate and foot on the serger, a narrow rolled hem can be created. This type of hem is desirable for lightweight to sheer fabrics. Refer to your serger manual for specific instructions and/or CT-MMB.199, *Serger Sewing Rolled Edge* (**FIGURE 21**). In general, the hem must be leveled and trimmed to within  $\frac{1}{8}$ - or  $\frac{3}{16}$ -inch of the desired hem edge. Thread should be wrapped tightly around the edges.

### Scarf Edge Hem

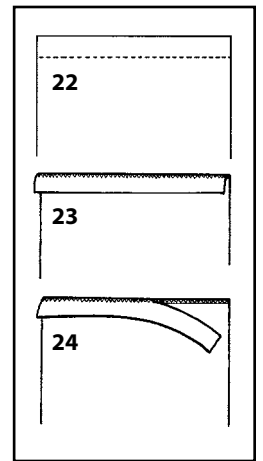
For a very narrow designer edge on garments made from sheer fabric (or to replace a hand-rolled hem), try a scarf edge. This is only suitable for special occasion clothes because it is not very durable. To construct, stitch  $\frac{5}{8}$ -inch from the raw edge using a short, straight stitch (**FIGURE 22**). Fold to the wrong side along the stitching line. Press. Stitch over the pressed edge with a short, narrow zigzag stitch (**FIGURE 23**). Trim off excess fabric close to the stitching (**FIGURE 24**).



**Figure 20.** Stitch close to top edge of second fold.



**Figure 21.** Serged hem.



**Figures 22, 23, 24.** Hemming sheer woven fabrics.