



Nina's Sweater Class

Lesson 4: Sleeves

When the torso of your sweater is finished (or when you need a break from it!) it is time to work the sleeves. Let the body of the sweater rest on a spare circular cable or waste yarn and work the sleeves—when all three pieces are done they will be joined to work in the round as we shape the shoulders and neckline. After all the long rounds of the torso, you will probably be pleasantly surprised at how quickly the sleeves work up! Both sleeves are identical, so you may wish to work them both at the same time, or you may work them one at a time and refer to your notes as you work to make sure that they match.

We will map out the increases needed for the sleeves in the same way that we calculated the torso shaping. Most sleeves are vaguely funnel-shaped in that they are narrowest at the cuff and widest at the upper arm. Some fancy styles incorporate more complex sleeve shaping such as a flared cuff. If your sweater has features like this, follow along with these steps and work the extra shaping in as needed. Suggestions for special shaping are included in a section at the end of this lesson.

Refer to your sample sweater and your schematic again. You will need these key measurements from your schematic (remember that you should take these measurements from a sample garment that you love or from your own body.)

F – The width of the sleeve at the cuff, when flat

G – The width of the sleeve at the underarm (take this measurement along a row of sts, do not angle it across several rows)

H – The length of the sleeve from armpit to cuff.

First, multiply F by 2 to get the circumference around the cuff:

$$2F = \underline{\hspace{2cm}}$$

Now, convert these INCHES to STITCHES by multiplying by S, your stitch gauge (as calculated in lesson 1.)

$$2F \times S = \underline{\hspace{2cm}} \text{ stitches around cuff.}$$

Typically, cuffs have a stitch pattern or design that matches or coordinates with the hem of the sweater. Follow the same steps as you did to decide on your hem pattern to decide on your cuff pattern—this means you will need to figure out the repeat of the stitch pattern you use. Round the last number up to the nearest number of sts divisible by your repeat. This is the number of sts you will CAST ON for your sleeve!

Cast on sts (1)

Now, multiply G by 2 to get the circumference around the top of the sleeve:

$$2G = \underline{\hspace{2cm}}$$

Now, convert these INCHES to STITCHES by multiplying by S, your stitch gauge (as calculated in lesson 1.)

Round up to the nearest whole number. If your number (1) was even, this number should be even as well. If your number (1) was odd, this number should be odd as well. Add 1 if necessary to achieve this.

$$2G \times S = \underline{\hspace{2cm}} \text{ stitches around upper sleeve. (2)}$$

Now, subtract (1) from (2) to find the number of sts you must increase over the length of the sleeve:

$$\text{_____}(2) - \text{_____}(1) = \text{_____}(3)$$

The increase rounds of the sleeve add 2 sts each, so divide the above number by 2 to find the number of increase rounds you will need.

$$\text{_____}(3) \div 2 = \text{_____} \text{ increase rounds (4)}$$

Now, let's look at the length of the sleeve. There are 3 sections of the sleeve; the cuff, the increase section, and the straight section. We will calculate the number of rows in each section so that they add up to the total length of the sleeve.

First, multiply H, the length of the sleeve from cuff to underarm, by R to find out how many rounds you will knit to achieve that length. Round up to a whole number if you end up with a decimal.

$$H \times R = \text{_____} \text{ rounds (5)}$$

Next, you'll need to determine how deep you want the cuff to be. I chose 4 inches to match the hem of my sweater, but you can go for as long or as short a length as you wish. Refer to other garments you own to see what length will work for you! Once you have chosen your cuff length, multiply it by R (and round up to the nearest whole number if there is a decimal) to determine how many rows of your stitch pattern you will be working. If you are working a turned cuff to match the turned hem discussed in lesson 1, the typical depth is 1 inch. You will use the same size needles to work the cuff as you used for you hem.

Work Cuff pattern for _____ rounds. (6)

Save this number--we have a little more math to do before starting the sleeve!

Now, subtract (6) from (5) to find out how many rounds you have left to work with.

$$(5) - (6) = \text{_____} \text{ rounds.}$$

You will work your increases over these remaining rounds. Decide how deep you want your increase section to be. I chose do work my increases over just about half the number of available rounds, so that my sleeve reaches its full width just around my elbow. The remaining rounds were knit plain. This allows for plenty of movement and a sleeve that doesn't get too tight when I bend my arm. For a more tailored look, the increases should be spread out over all available rounds. The fewer rounds you place your increases over, the more gathered the cuff of the sleeve will appear. The more rounds you spread them out over, the more gradually tapered it will be. The only requirements are that the number of 4ounds you choose must be less than or equal to the number you calculated in the last step, and that the number of rounds must be divisible by YOUR number of increase rounds, labeled (4) above.

_____ Rounds for increase section. (7)

Any remaining rounds will be the final straight section.

_____ rounds for straight section (8).

Check to make sure that your three sections add up to the correct number of rounds:

$$\text{_____}(6) + \text{_____}(7) + \text{_____}(8) = \text{_____}(5)$$

Finally, we will find the number of plain rounds to work between increase rounds. Each increase round adds 2 sts, and then a number of plain rounds are worked before the next increase round, just as with the body of the sweater. To find the number of plain rounds, divide (7) by (4):

$$\text{_____}(7) \div \text{_____}(4) = \text{_____} \text{ rounds.}$$

Subtract 1 from this number to find the number of plain rounds between each increase round: _____(9) plain rounds.

And now, you are ready to cast on! There are blanks in the simple sleeve pattern that follows; fill in the numbers you calculated where appropriate:

Section 1 - Cuff

Cast on _____(1) sts, and join to work in the round. Work your chosen cuff pattern for _____(6) rounds.

Section 2 – Increase section.

*Work one increase round as follows: K1, m1, k to one st before end of round, m1, k1.

Work _____(9) rounds plain.

Repeat from the * _____(4) times.

Section 3 – Straight section

Work _____(8) rounds plain.

When you have completed the three sections place all sts on waste yarn or a spare circular cable (this is where interchangeable needles come in really handy!) and knit another sleeve in exactly the same way!

Modifications

The possibilities of modified sleeves are really endless. Once you have calculated your beginning and ending numbers of sts, you may actually work the increases in many ways other than the technique described above for a number of different effects. For a blousy, peasant sleeve, you could work ALL the necessary increases in the first round above the cuff, and then work the straight section for the remainder of the length. Or, you could work ribbing or a cable along the top of the arm (centered in the middle of your round) and work the increases around the cable pattern. Or, you could work flared sleeves by beginning with a large number of cast-on sts, which are then decreased to a reasonable number of cuff sts, and then increase as described up to the underarm. Detailed sketches of your desired sleeve shapes will be very helpful in planning out unique sleeve shaping, and once you have worked a few sleeves, you will find it is actually quite simple to achieve these effects!

When you have finished the sleeves and torso of your sweater, you may give yourself a big pat on the back because the majority of the knitting is now done! Our class will be taking a week off from lessons to troubleshoot and share progress, and then we will begin the most exciting part of our knitting adventure: The yoke, which includes both shoulders and neckline! Until then, happy knitting!