

tapimatic rug maker



Instruction Book

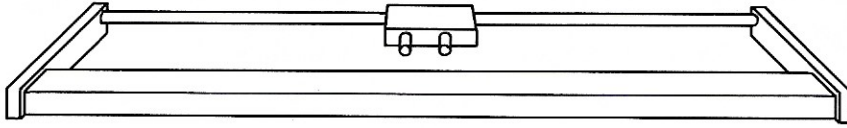
tapimatic

- 2 Unpacking and setting up the rug maker
- 6 The pattern sheet
- 11 Fitting the canvas
- 13 Threading the yarn
- 15 Making the rug
- 18 What to do when ...
- 20 Edge binding and fringing
- 23 Hints on designing your own rugs

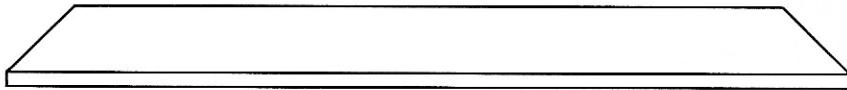
Unpacking and setting up the rug maker

The different parts of the rug maker

The long flat box contains:

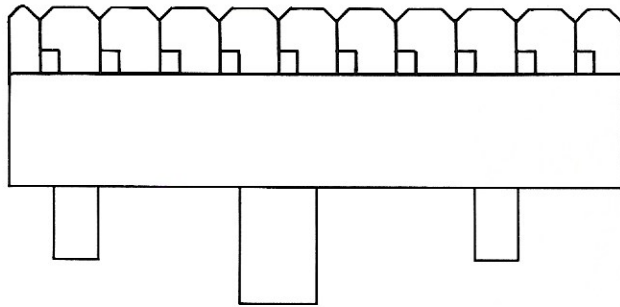


The frame

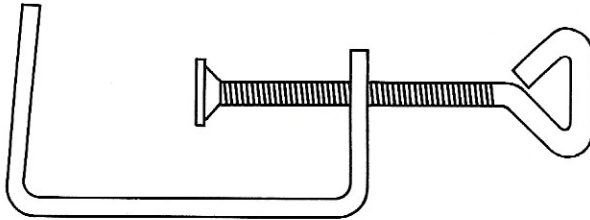


The board

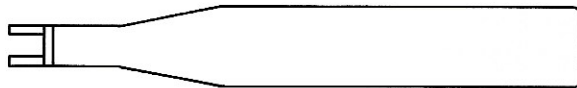
The smaller, square box contains a styropor tray with the following items:



The yarn guide



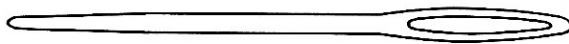
Two clamps



The pronged tool used for securing the canvas



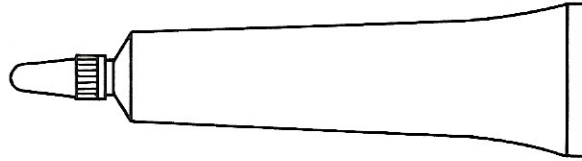
The rug hook



The binding needle

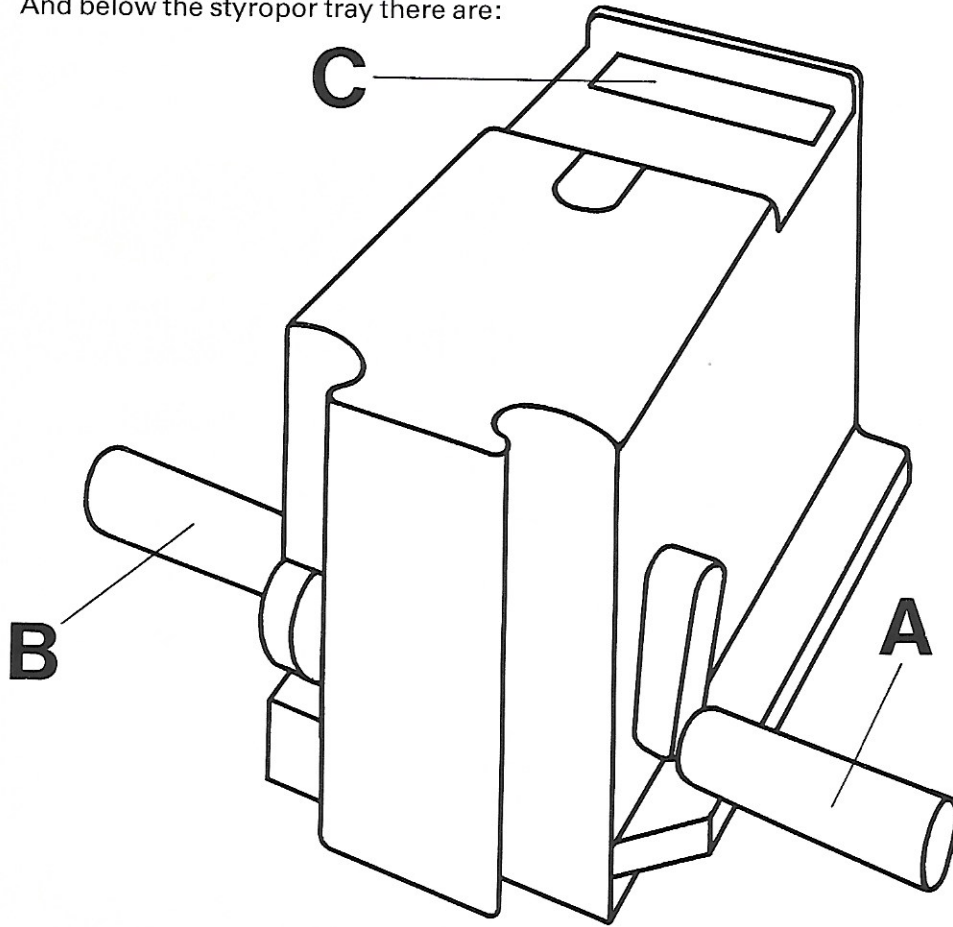


Unpacking and setting up the rug maker



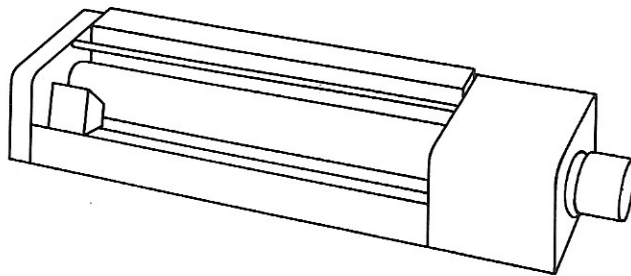
The oil tube

And below the styropor tray there are:

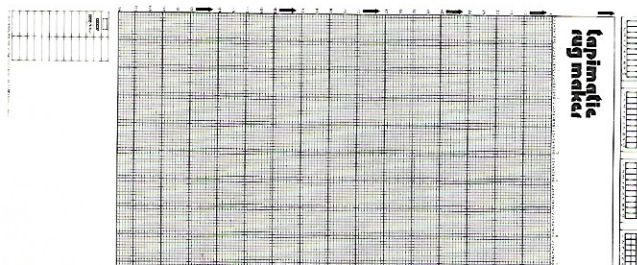


The knotting unit

- A The knotting handle in rest position
 - B The colour changer
 - C The support for the pattern reader
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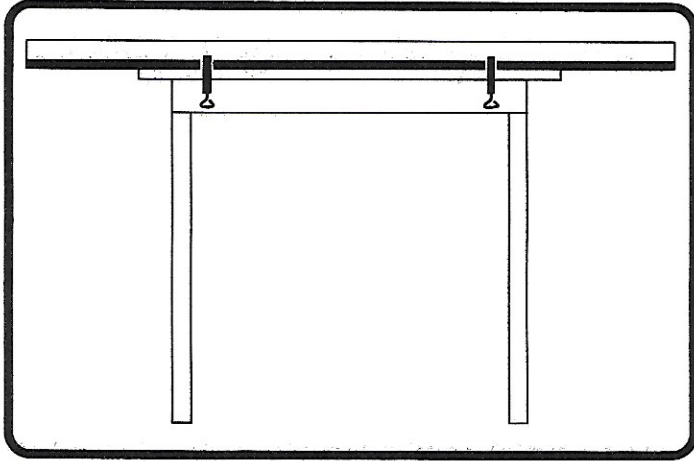


The pattern reader



Unpacking and setting up the rug maker

Securing the frame

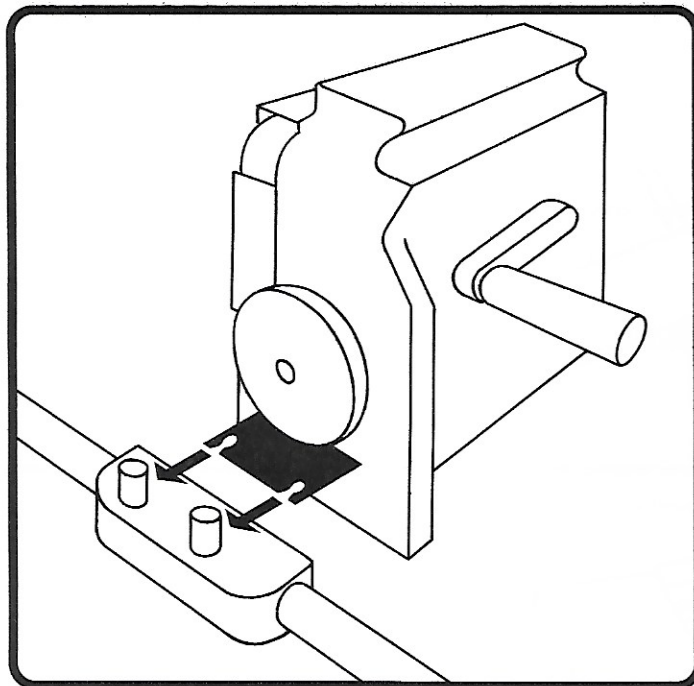


Attach the frame to your table by using the two clamps supplied. There are two holes for this purpose in the supports underneath the silver-coloured rail at the front of the frame.

Should your table not be wide enough for the frame, place the board underneath the frame and attach them both together to the table with the two clamps.

Important: Make sure both ends of the frame are standing level either on the table or the board.

Mounting the knotting unit



Twist the support for the knotting unit until the two screws point upward, now loosen the screws slightly.

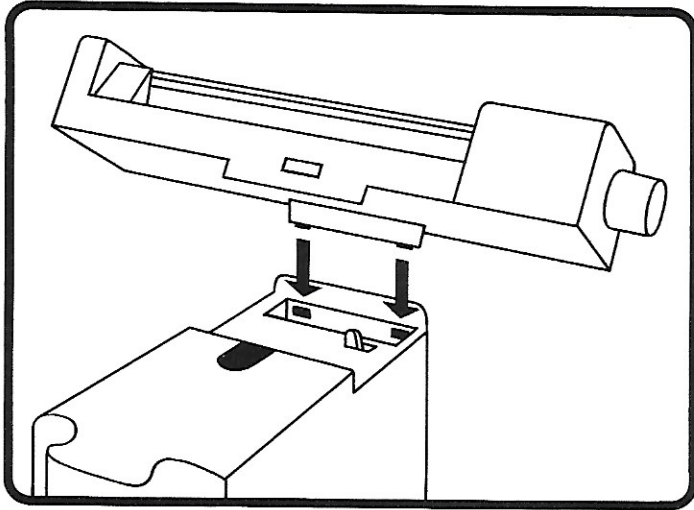
With the underside facing to the front, place the knotting unit on its back onto the table.

Guide the joining-plate of the knotting unit over the support until the two special screws fit against the back of the slots in the joining-plate.

Tighten the special screws firmly. The special screws have a slit at the top so, if necessary, you can use a screw driver.

Now tip the knotting unit forward. In case it does not lock, move it slightly sideways.

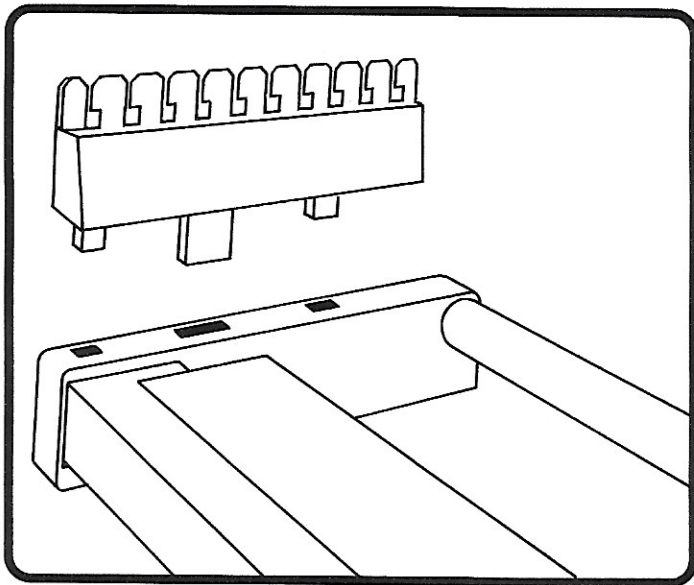
Unpacking and setting up the rug maker



On the back of the pattern reader there is a lug. Guide it into the corresponding opening at the top of the knotting unit.

Tilt the pattern reader forward until it clicks into place. To remove the pattern reader again, pull the slide in front of it towards you, and lift the pattern reader off.

Important: The pattern reader can only be attached to the knotting unit when the knotting handle is in rest position, i.e. down.

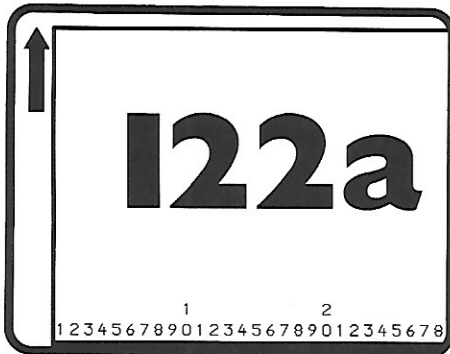


Mount the yarn guide onto the left-hand end of the frame, making sure it clicks into place.

The pattern sheet

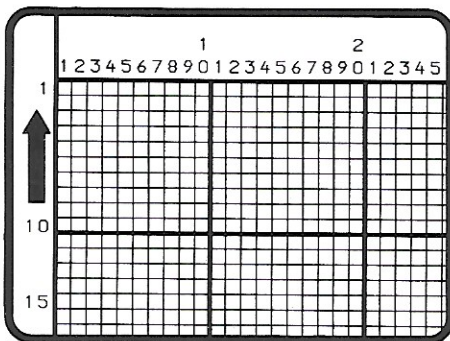
Take a close look at the pattern sheet you have chosen. You will find it carries some important information.

The number



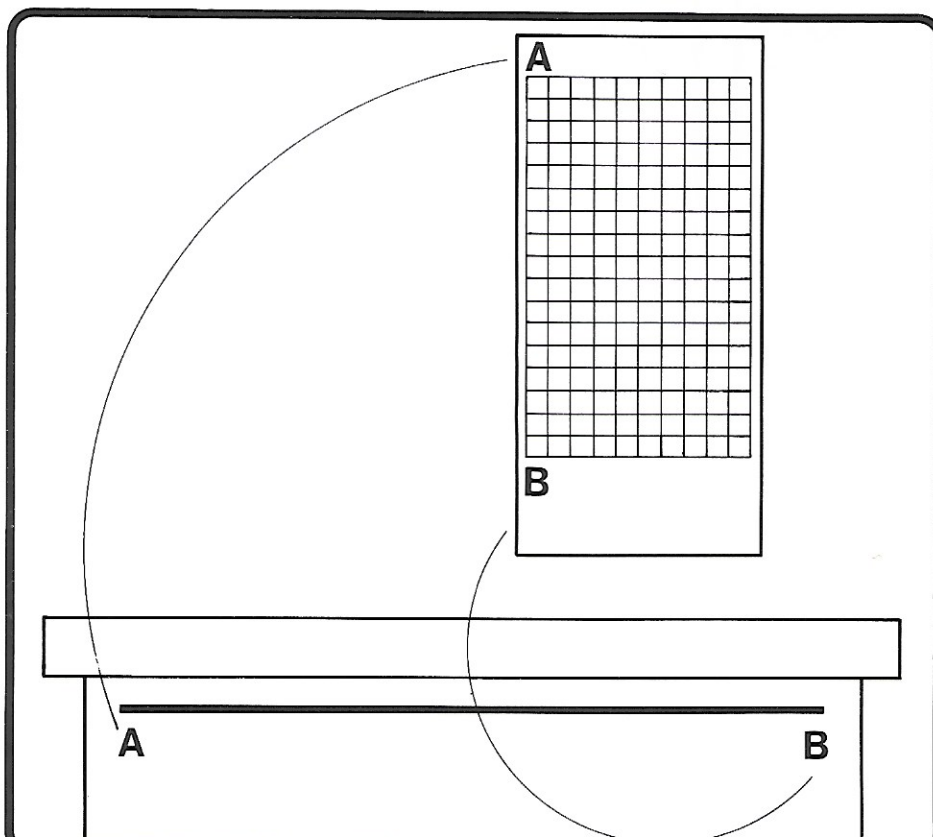
At the top end you will see the Brand name and in front of it the number of the rug corresponding to the number shown in the illustrated book. In the case of rugs requiring more than one pattern sheet, the number is followed by some letters.

From pattern sheet to rug



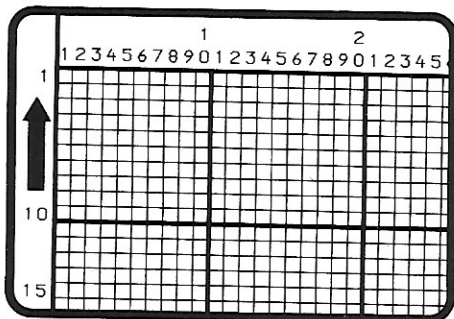
Each coloured square on your pattern sheet corresponds to a knot of the same colour in your rug.

When you are making the rug, always begin with the first square at the top left-hand side of the pattern sheet. Continue with the square directly underneath, and so on.



The first knotted row on the canvas therefore corresponds to the first row of squares down the left-hand side of your pattern sheet.

The pattern sheet



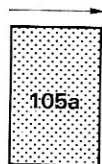
Then you make the knots for the second row down, and so on.
The horizontal row of numbers at the TOP of the pattern sheet therefore numbers the rows that are to be knotted. The row of numbers DOWN the sides of the pattern sheet numbers the individual knots.

Diagrams of the rug

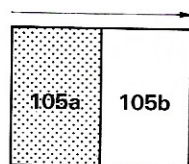
Down on the right-hand side of the pattern sheet you will see a diagram illustrating the correct sequence and direction in which the pattern sheet must be used when making the rug.

The rectangles framed by a thick line represent the pattern sheets you actually have in front of you. The rectangles with a thin line round them represent the parts of the rug that are only made when using the pattern sheet two or more times.

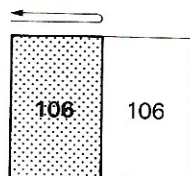
Here some examples to make the above clearer:



This pattern consists of one sheet. You begin with the first vertical row of squares on the left, and then continue by making the knots for all the consecutive vertical rows on your pattern sheet.



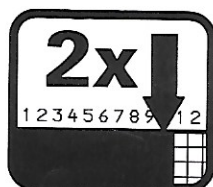
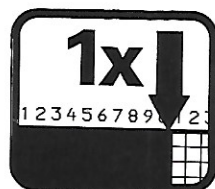
This pattern consists of two sheets. You begin with the first vertical row of squares on the left of sheet "a", make the knots for all consecutive vertical rows of sheet "a", and then continue with the first vertical row on the left of sheet "b".



This pattern consists of one sheet. You begin with the first vertical row on the left and then make the knots for all consecutive vertical rows once more but in reverse order.

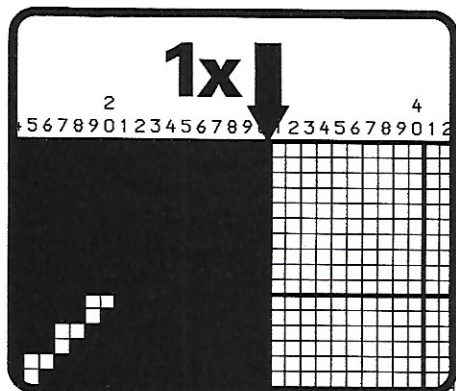


The arrow pointing backwards means that you first follow your pattern sheet in the normal direction from left to right, and then for the second half of the rug from right to left, i.e. in the opposite direction.

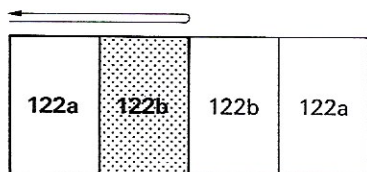


On each pattern sheet used in this manner you will also find an arrow pointing to the last vertical row on the right and marked either "1x" or "2x". **This arrow tells you whether to work this last row at right once or twice.**

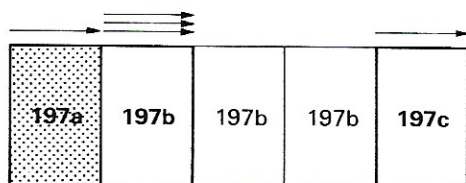
The pattern sheet



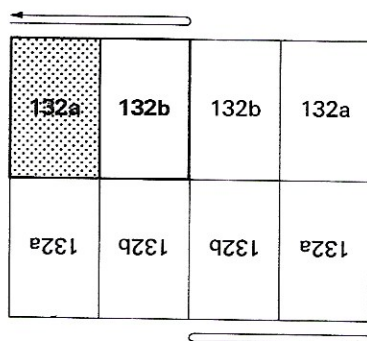
In this example therefore you work the last row "30" only once before you continue with rows "29", "28", etc.



This pattern consists of two sheets. You begin with the first vertical row at left on sheet "a", work all the way down the following rows of sheet "a", and continue with the first vertical row at left on sheet "b". When you have finished, repeat sheet "b" in reverse order. Look at the arrow which tells you whether to work the last row at right once or twice. When you have finished sheet "b", return to sheet "a" and follow it in reverse order, beginning with the vertical row number 100 on the right.



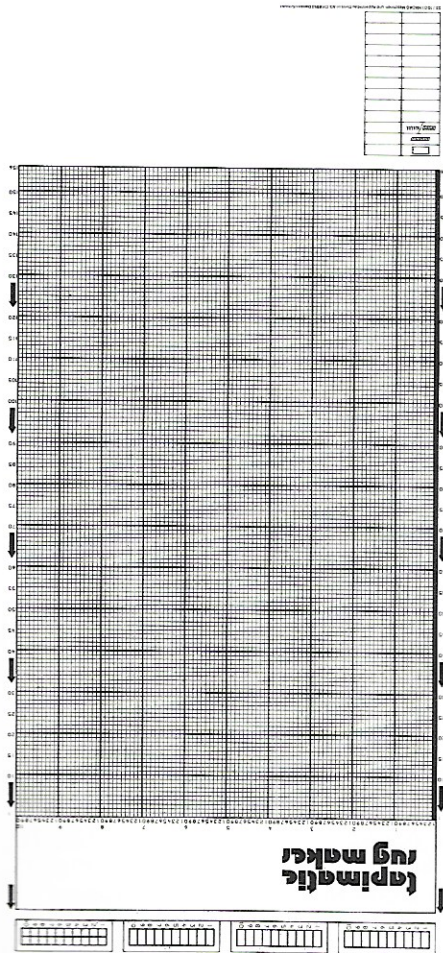
This pattern consists of three sheets. Begin with the first vertical row at left on sheet "a", and work all the rows of sheet "a". Continue with the first vertical row at left on sheet "b". When you have worked all the rows of sheet "b", work them twice more but **do not** reverse the order. Always start at the first vertical row on the left. When you have finished with sheet "b", continue with sheet "c", beginning at the first row on the left.



This pattern consists of two sheets. However, this rug is much larger than the ones described so far. **This means, the rug has to be made in two parts, and then sewn together.** Two parallel rows of rectangles in a diagram always mean that the rug is **worked in two panels.** You begin with the first vertical row at left on sheet "a", work all consecutive rows of sheet "a", and continue with the first vertical row at left on sheet "b". When you have worked all the rows of sheet "b", repeat sheet "b" once more in reverse order (observe arrow). After which, all the rows of sheet "a" are repeated once more in reverse order.

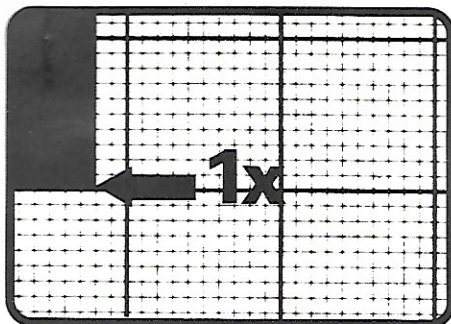
For the second panel use exactly the same procedure as given for the first panel. When you join the two panels it will follow that the knots of the two halves will not lie in the same direction.

The pattern sheet



If you want to avoid this, always insert the pattern sheet for the second half with the lower end of the sheet first and begin with the first vertical row appearing on the right-hand side of the pattern reader.

Note: If you have already cut off the colour strip on the pattern sheet, you will find that you cannot turn back the pattern sheet after you have made the last knot of a row. You have to re-insert the sheet every time. This can be remedied by sticking a strip of paper to the top of the sheet to lengthen it.




Important: On sheets used for rugs made in two parts you may find an horizontal arrow marked "1x" on the left by the last square for the last row of knots. **This means that when you make the second half of the rug, you should leave out the last knot of every row. On sewing the two parts together, the pattern will then remain correct.**


The pattern sheet

Chart listing yarn requirements


This chart is down below on the left-hand side of your pattern sheet, and the information may be important for you if, for example, you wanted to make the same rug a second time and have to order your own yarn. When you make use of this chart, be on the safe side and order a little more than indicated.

	171×281 cm	67×110 in.
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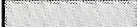

The small diagram of a rug is followed by its measurements in centimetres and inches. The measurements of the rug include the edge but not the fringe, and the final size of the rug may vary somewhat depending on the type of canvas used.

	131 m	143 yd
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The diagram of the rug edge is followed by the indications of how much yarn is required if you intend to bind all four edges of the rug as described on page 20.

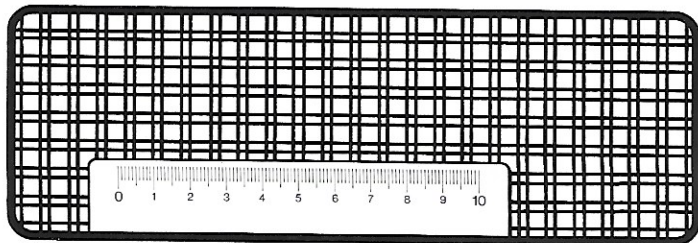
	81/129 m	88/141 yd
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The diagram of edge and fringe is first followed by the quantity of yarn required if you bind the two long edges of the rug. **The figure after the stroke indicates the quantity of yarn required if you make a fringe along the two short edges.**

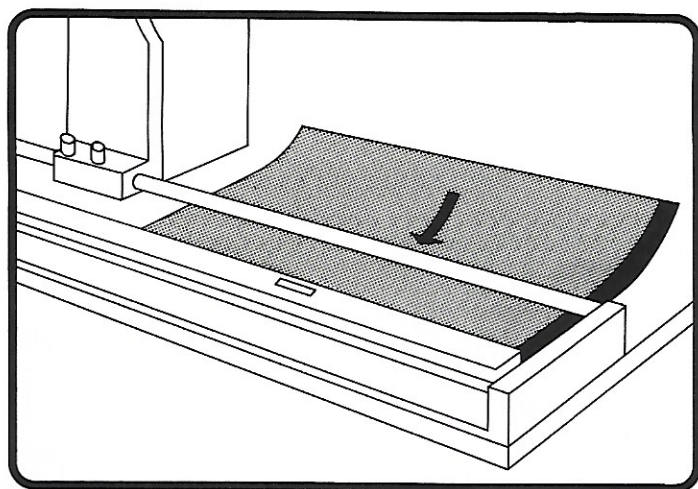
	305 m	333 yd
	433 m	473 yd

Listed alongside each coloured rectangle is the amount of yarn required for this particular colour. If you buy your yarn in weight rather than metres/yards, you will have to work out how many grams to the metre you need for the chosen yarn (i.e. how many metres equal 100 g). For satisfactory results buy only well worsted and firmly twisted yarns. As a rule the ideal rug-making yarn works out at about 40 to 45 m length per 100 g. **We recommend that you always buy about 10% more yarn than the quantities indicated.**

Fitting the canvas



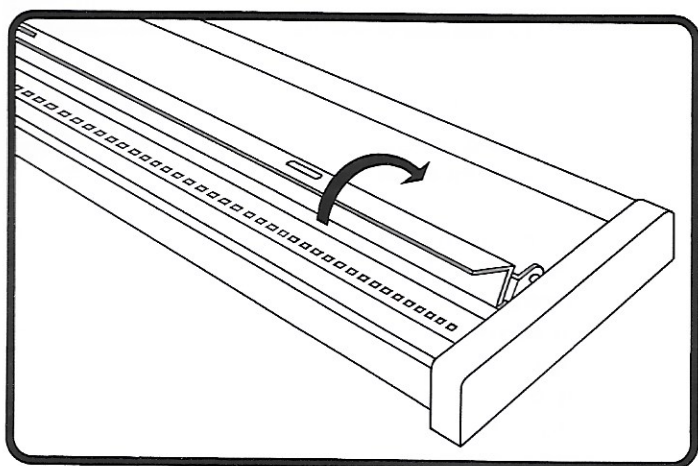
For rug-making on the TAPIMATIC you need a double mesh canvas which has 13 large open squares or 13 double bars to 10 cms (approx. 4")



The canvas is inserted from the back of the rug maker, i.e. in the same direction it will advance while the rug is being made so that the knotted rows start appearing at the front.

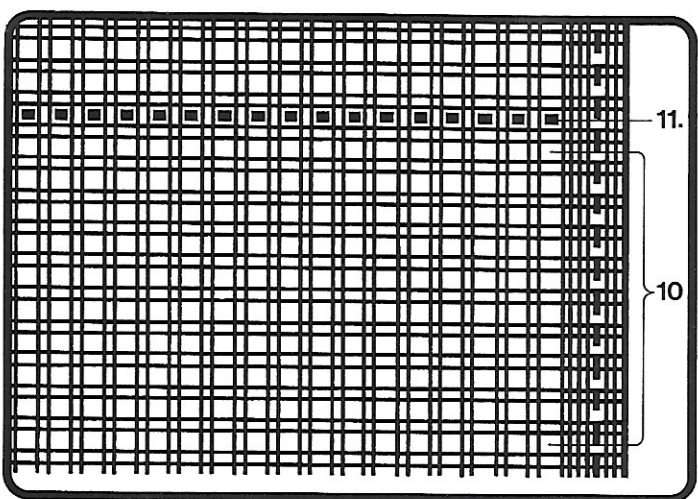
Make sure that the selvages are always to the right and left of the rug maker, i.e. not running parallel to it but at right angles.
If your canvas has been cut so that it has only one selvage, this selvage must always be on the right-hand side.

Always insert the canvas so that it touches the right-hand edge of the frame.
Lifting the knotting unit gently guide it as far to the left as possible and fold it back on the table.



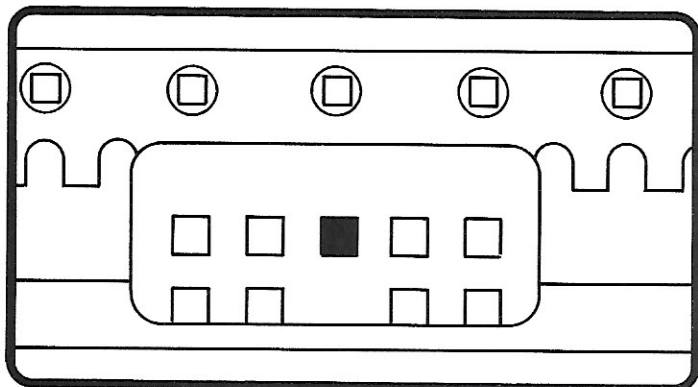
Open the slotted rack by lifting it at the two oval indentations and fold it back.

Get your canvas ready. Remember, selvage to the right. If necessary lift the knotting unit a little.
Slide the canvas underneath the guide bar and pull it forward to the front over the holding pins.



Pull the canvas at least 10 rows of squares beyond the holding pins so that the eleventh row sits on the pins.
Run the pronged tool along the canvas to push the canvas securely down onto the holding pins taking care that the canvas lies in a straight line on the pins.

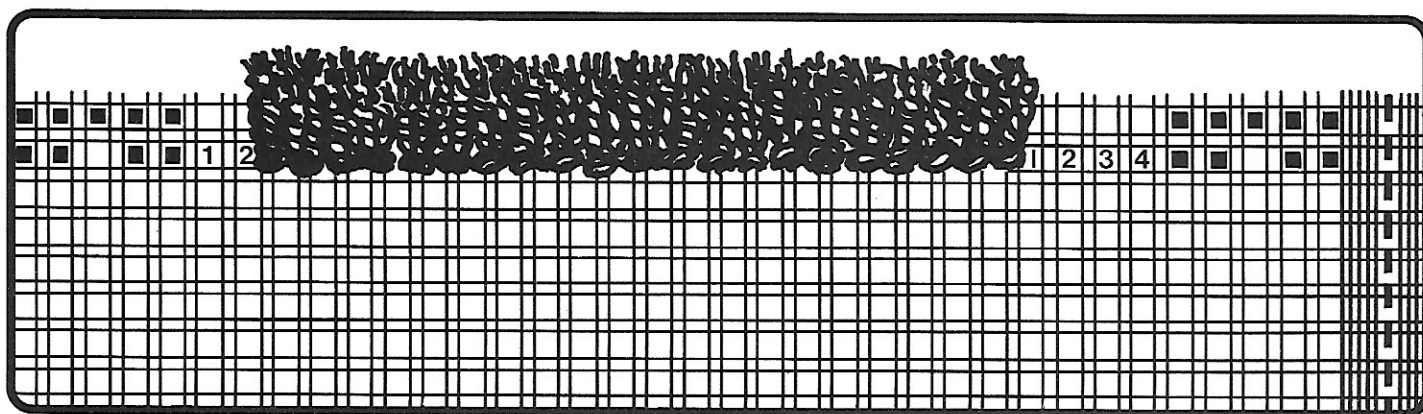
Fitting the canvas



Positioning the canvas-stretchers:

The canvas-stretchers are used to stretch the canvas tightly. This ensures a smooth working of the rug maker. **The canvas-stretchers can be moved by pressing down the pin that is at the centre of the two groups of four pins.**

On releasing this centre pin make sure that the canvas-stretcher clicks into place. If necessary move it a little from side to side, as otherwise the canvas-stretcher cannot fulfil its function properly and this may lead to trouble.



Move the right canvas-stretcher as far to the right as possible but make sure that each pin still fits into a large canvas square. To the left of it, count four canvas double bars: these must remain empty.

Now count so many double bars on the canvas as there are knots in the first vertical row of your pattern sheet.

Count two more double bars which must also remain empty.

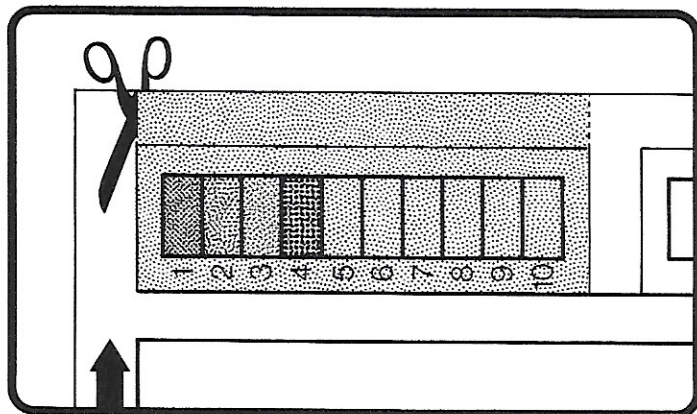
Now position the left canvas-stretcher so that its pins fit into the adjoining large canvas squares.

Use the pronged tool here as well.

Now close the slotted rack and press it down a little, and tilt the knotting unit up again.

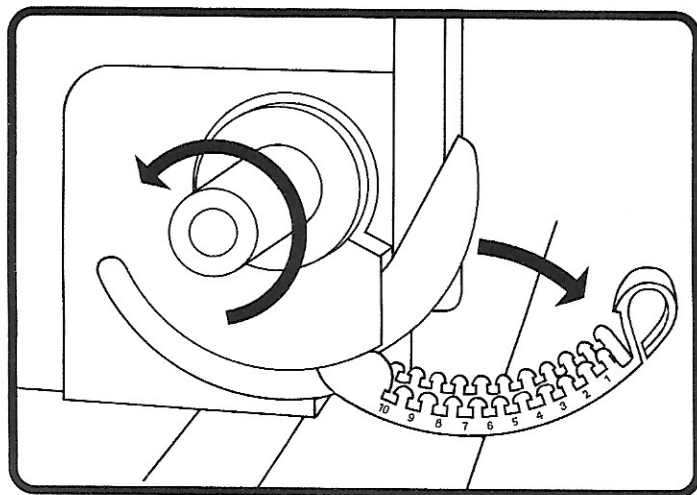
Your canvas is now ready for knotting.

Threading the yarn



Pick up your pattern sheet and cut off the colour sequence strip at the top.

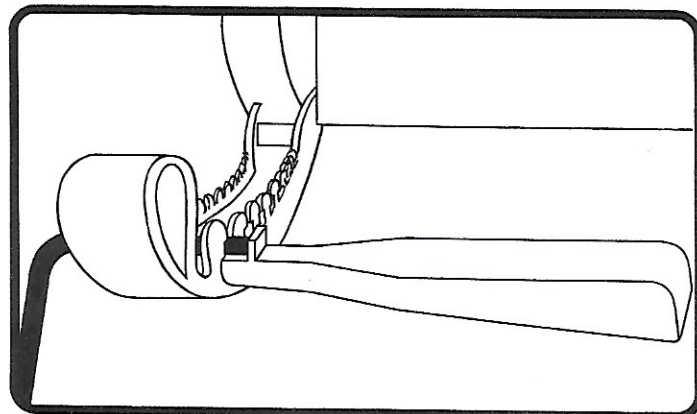
Cut along three sides of the colour strip but leave the blank part at the top of the pattern sheet attached to it so that you can fold it back. In this way it will hold more firmly in the colour-changer handle when you insert the strip into the slot. Get the corresponding yarns ready which should be in balls or on cones.



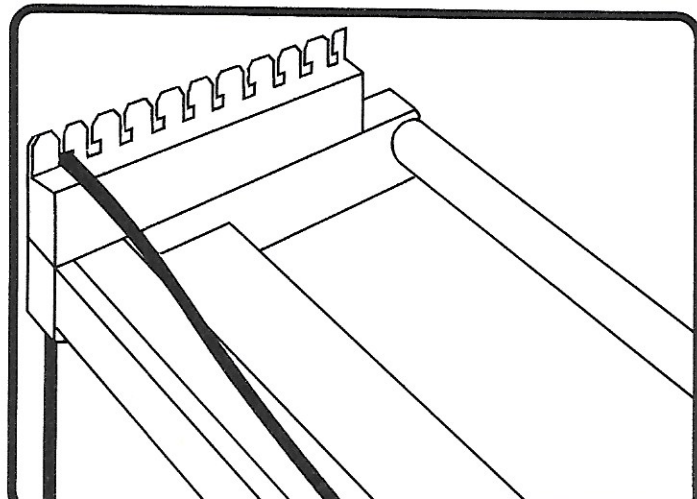
Turn the handle of the colour-changer to the back as far as it will go, hold it tight, and open up the yarn flap by pulling it forward by its looped handle. You can see clearly the rectangular openings through which the yarn will pass. Each opening has a number which matches the numbering of the colours on the colour strip.

Pick up that colour first which has the number one on the colour strip.

Place the yarn end into the number one opening at the front of the yarn flap, leaving about 8 mm jutting out on the right.



Measure this bit with the prongs of the pronged tool.

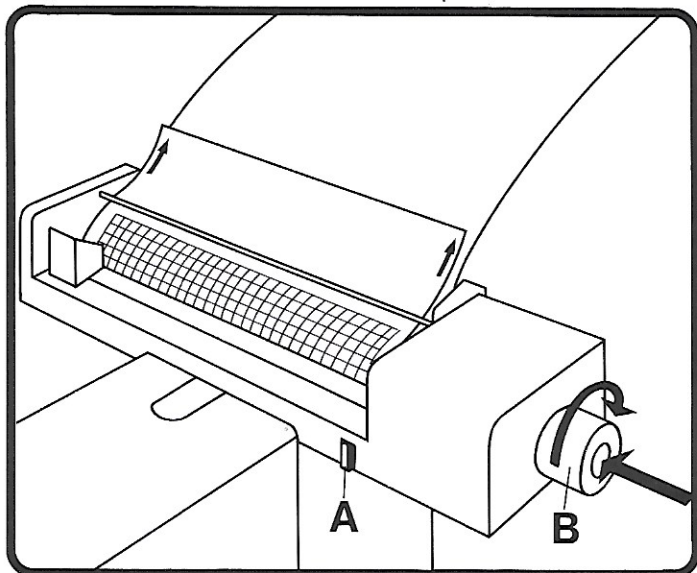


Now also place the yarn coming from the ball carefully into the first opening, number one, of the yarn guide. Be careful not to pull the end out of the yarn flap.

Thread the other colours in the same way.

Then close the yarn flap and turn the colour-changer handle a little to the front again.

Threading the yarn



The pattern sheet is inserted in exactly the same way as paper would be into a typewriter.

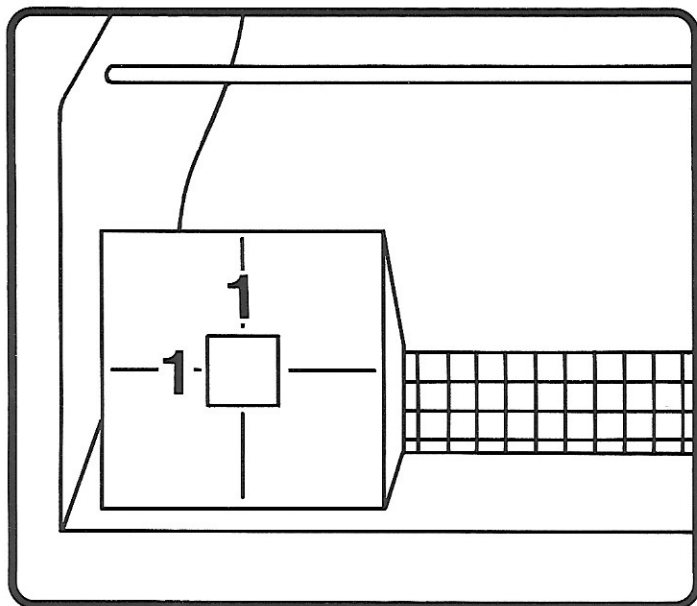
First push the blocking lever A on the front right-hand side of the pattern reader to the right. Insert the pattern sheet behind the platen with arrows pointing down and the reverse side facing you.

By pushing in the knob B on the right of the pattern reader you can turn the platen with your right hand.

Slide the pattern sheet up behind the thin bar at the front. After inserting almost half of the pattern sheet, release the blocking lever (A) on the front right-hand side of the pattern reader by sliding it to the left.

Now align the top and bottom edge of the pattern sheet. Slide the blocking lever (A) to the right again.

Note: When you are not working and there is no pattern sheet in the pattern reader, this blocking lever should be released, i.e. be pushed to the left.

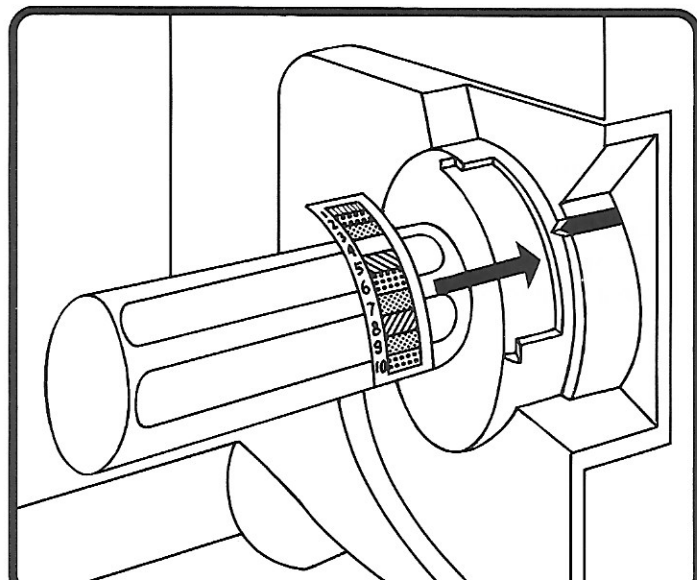


Slide the magnifier to the left until the white-framed square centres on a pattern sheet square in the first vertical row. Now turn the pattern sheet back until the white-framed square centres on the first top left-hand square.

Always turn the platen back a little further than necessary so that with your last movement when looking for the proper square, it is turned in the same direction it will turn for the next knot.

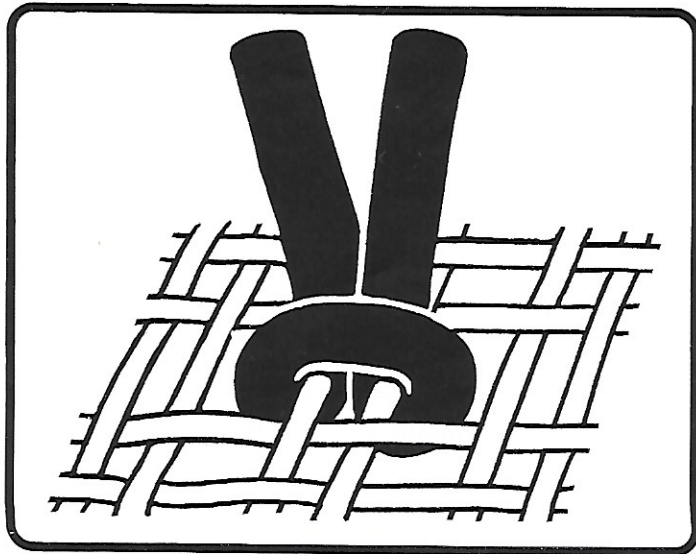
When the magnifier focuses on the desired square, always pull knob B slightly to the right: this ensures the perfect advancement of the pattern sheet.

Should the pattern sheet shift slightly while you are working, readjust it with the platen as given above.

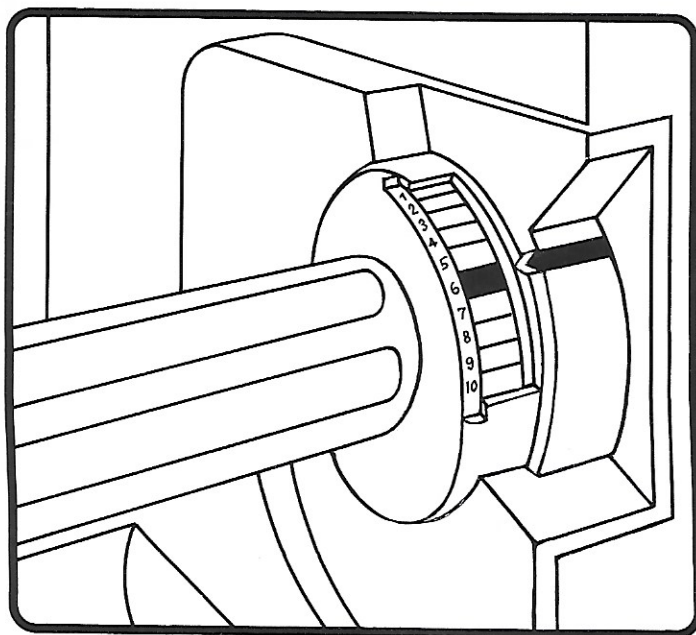


Insert the colour strip into the slot provided for it on the colour-changer handle.

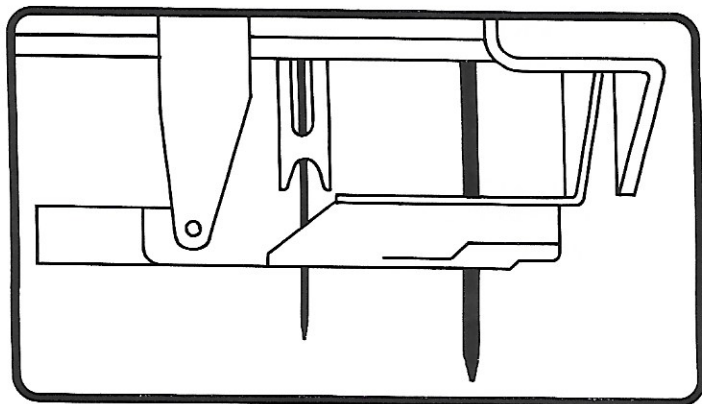
Making the rug



The **TAPIMATIC** makes what is called the **Ghiordes knot** where the yarn is taken round the double bar of the canvas.



To adjust the colour changer properly, check through the magnifier centred on the first top left square what colour comes first. Now turn the handle of the colour-changer handle so that the arrow on the colour-changer points to the corresponding colour. Work under good lighting conditions, to avoid difficulties in discerning the different colours on the pattern sheet. Now look at the canvas for the double bar on which to make the first knot. **You begin at left, that is with the third double bar counted from the left canvas-stretcher.**

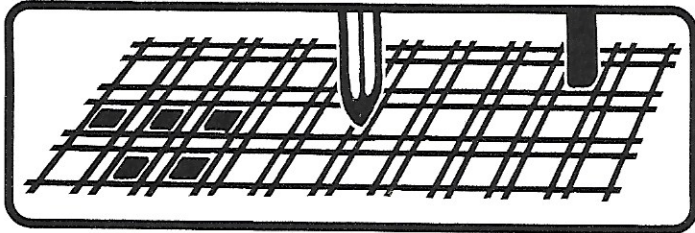


Using your left hand, slightly lift the knotting unit off the canvas and turn the knotting handle $\frac{3}{4}$ turn clockwise, i.e. up at the front, down at the back.

On the right underneath the knotting unit you can now see the thick centering pin, and on the left the slightly shorter flat knotting needle.

Turn the knotting handle until the knotting needle juts out **1 cm** at the very least.

Making the rug



The knotting needle must enter right between the two threads of the double bar where the first knot is to be.

Lower the knotting unit taking care that the knotting needle enters the third double bar counting from the left canvas-stretcher.

Use your left hand (that is resting on the colour-changer) to press down the knotting unit lightly all the time you are making knots, while with your right hand you are turning the knotting handle clock-wise.

Give the handle a second full turn. You have now made the first knot on your canvas.

It always takes two full turns of the knotting handle to make one knot.

While you were turning the handle, the knotting unit has moved one large canvas square to the right, and the pattern sheet one square up.

Through your magnifier you can now already see the colour for the second knot. If it is the same colour as for the first knot, then don't move the colour-changer handle; if it is a different colour, then turn the colour-changer handle until the arrow points to the correct colour.

While you are making the second knot, watch carefully as the pattern sheet advances.

The pattern sheet already advances after $\frac{3}{4}$ turn. Which means, you can see the colour of your next knot already in advance. Therefore, as soon as the pattern sheet has advanced, you can with your left hand immediately choose the colour for your next knot, while with your right hand you are turning the handle the second time for the first knot. Changing the colour without interrupting the movement of the knotting handle of course enables you to reach a higher knotting speed. At the same time, a safety device prevents you from changing colour at the wrong time.

When making the first two rows of knots make sure that the knotting needle enters between the two threads of the canvas bars. You may find you have to pull the canvas slightly or else, keeping your left hand on the colour-changer handle, press the knotting unit to the left or right while making the knots.

Making the rug

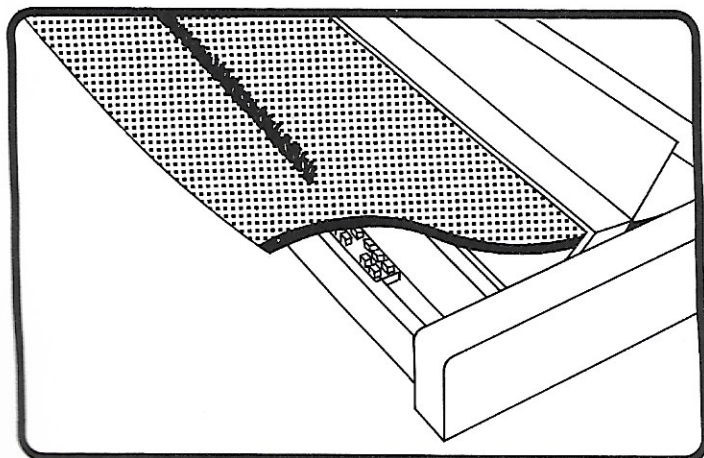
Advancing the canvas by one row

When you have reached the end of your first vertical row on the pattern sheet, the canvas has to be advanced one row.

Lift the knotting unit slightly and move it over completely to the left, and tilt it on its back.

On the left, pull the yarns you are working with down below the yarn guide. This will prevent tangling.

Fold back the slotted rack.



Beginning from the right and pulling it up a little, **release the canvas from the holding pins.** Holding the work by the pile makes this easier.

Now push the next row of squares over the holding pins. Use the pronged tool. You can already start positioning the beginning of the new row of squares before you have actually fully taken off the end of the knotted row.

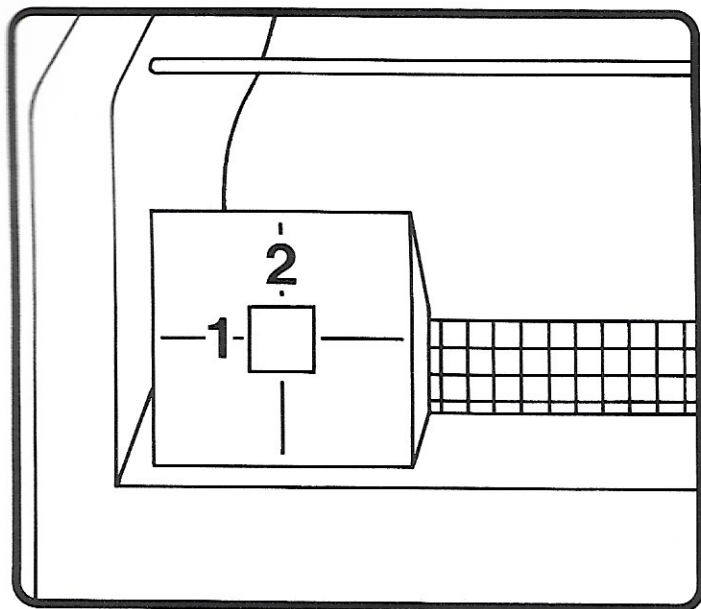
Between the last knotted row and the holding pins there must be two rows of empty canvas squares. Press the canvas back onto the canvas-stretchers again. Close the slotted rack, pressing the canvas down slightly at the same time.

Before starting on a new row of knots, press the pile towards you to prevent it from getting caught up in the knotting unit.

Adjusting the pattern sheet: Press knob B on the right of the pattern reader, and turn the pattern sheet back until the magnifier is over the first square at the top of the first vertical row. Pull knob B to the right.

Move the magnifier one square to the right onto the first square of the second vertical row.

Now make the knots of this row as described above.



What to do when...

You have chosen the wrong colour by mistake

1. You detect a knot in the wrong colour along the row you are working.

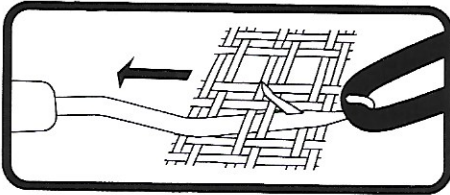
Finish the row. Pull the wrong knot out of the canvas. Slightly lift up the knotting unit and move it as far as the missing knot.

Choose the correct colour, turn the handle on the knotting unit away from you (to the back) until you can see 1 cm of the knotting needle. Insert it between the double bar where the new knot should be. Press the adjacent knots left and right a little to the side so as not to catch them.

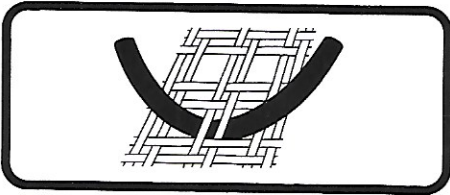
Complete the two full turns of the handle to make the new knot in the right colour.

2. Right at the end, you detect knots in the wrong colour.

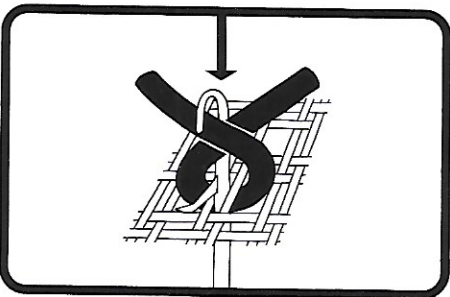
With the wrong side of the rug facing you, pull the knots out of the canvas. Cut a length of yarn 6.5 cm long in the correct colour.



**Push the hook under the canvas double bar.
Pick up the length of yarn**



and pull it through underneath the double bar.



From the right side of the canvas, insert the hook between the double bar.

To make an identical knot, observe carefully whether on the adjacent knots the two ends of the yarn are in front or behind the knot.

Open the latch of the hook and lay the two ends of the yarn cross-wise into it.

Pull the hook back through the double bar, and the new knot is made.

Knotting stops because of an interruption in the yarn flow

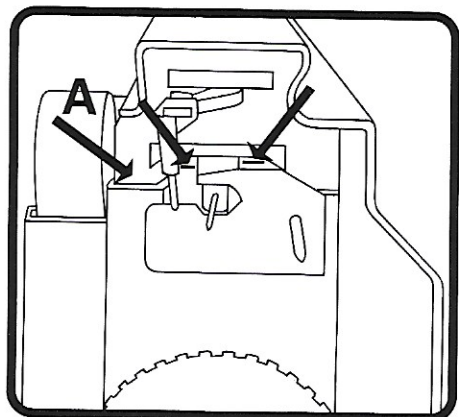
If there is a knot or unevenness in the yarn, the knotting unit cannot pull the yarn through the yarn guide or the openings of the yarn flap.

Find the knot or uneven part, take out the yarn and cut off the faulty bit. Thread the yarn again as described on page 13.

If you are using bulkier yarn, i.e. less than 40 m per 100 g, it may be useful to wax it first.

What to do when...

Cleaning and oiling the knotting unit



It is advisable to clean the knotting unit every time you have finished a rug.

Tip the knotting unit back and with brush and tweezers remove the accumulated fluff.

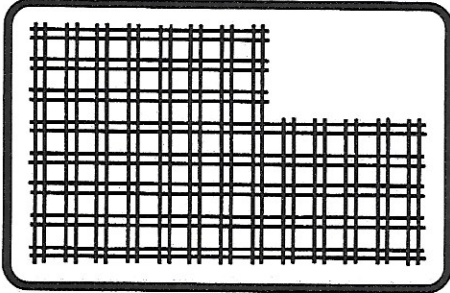
Pay particular attention to the slots for the two knotting arms: Pull out all protruding bits of fluff.

From time to time it is also necessary to oil the guide bar on which the knotting unit glides back and forth, as well as the metal parts marked by arrow A.

Edge binding and fringing

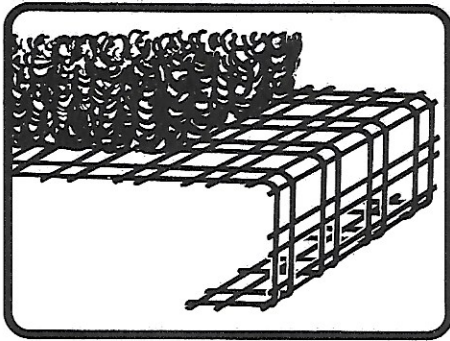
To finish your rug, you can either bind all four edges in the stitch we recommend or bind only the two long edges and attach a fringe to the two short edges.

Binding

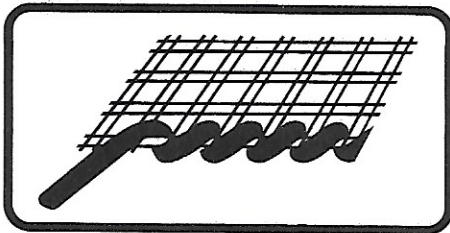


For one metre of edge you need 14.5 m of yarn. The canvas must be cut so as to leave five complete rows of canvas squares.

The illustration on the left shows you how to cut the canvas to achieve a neat corner.

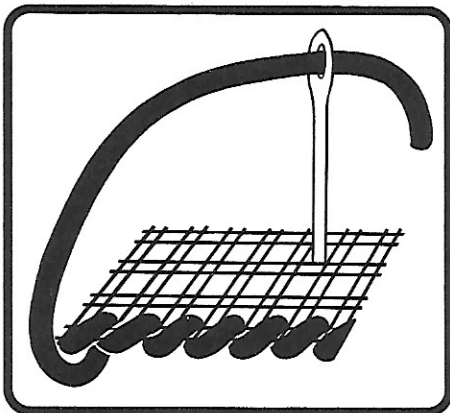


First, fold back one row of canvas squares. Count two more rows of squares, fold back again. This leaves two rows of canvas square from the edge to the knotted row.



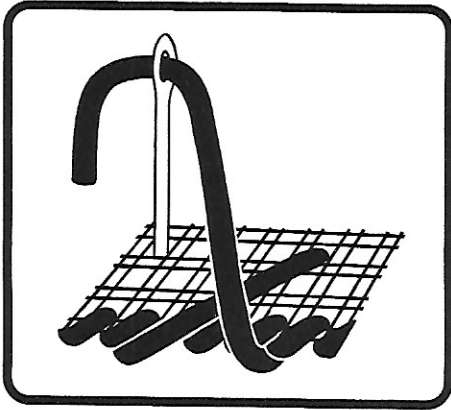
To make binding easier, you can first sew the edge down into place, using a strong thread. Remember, if you are using some of your yarn, you will need more yarn for binding the edges than indicated above.

For the actual binding, hold the rug so that you always stitch down into the right side of the canvas, with the needle coming out on the wrong side of it, and always stitching into the canvas square of the last knot.

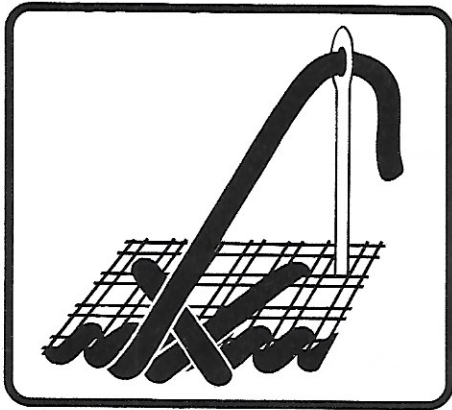


Counting from the beginning to the right, stitch from above into the fifth canvas hole. Pull the needle down and up over the edge.

Edge binding and fringing



Stitch into the fourth hole counting to the left from the top of the first stitch, i.e. miss three squares.



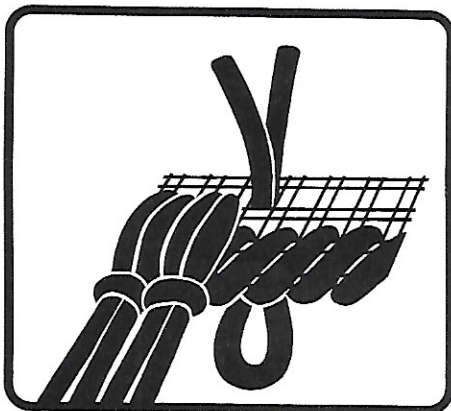
Again, from above stitch into the first empty square following the top of the first stitch.

Then into the fourth hole to the left again, and so on, always advancing by one square on the right and going back by four squares on the left.

Fringing

For the fringe as described you will need 37.5 m of yarn for 1 m of fringe.

Prepare the canvas as for edge binding. Cut a length of cardboard 14 cm wide, round which you wind the yarn you have chosen for the fringe. Cut along one edge, and you now have yarn lengths measuring 28 cm.

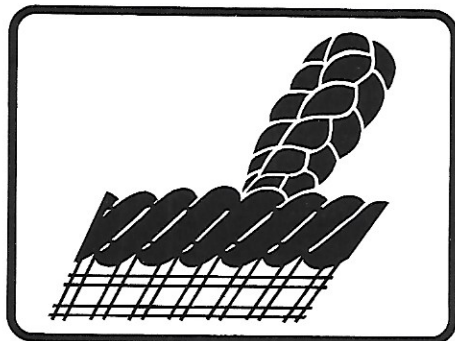


From the underside of the canvas, push up the hook into the large canvas square of the last knot, get hold of doubled piece of fringing yarn, pull it down in a loop large enough to thread through the two ends, and pull tight.

Edge binding and fringing

Putting up wall hangings

If you don't want just to nail your wall hanging to the wall, you can make loops all along the top edge.



To make a loop, pull three fairly long pieces of yarn through the back of the binding and plait the strands of yarn. Fold the plait in half to the back and attach. Continue making loops in the same way always 10 to 15 cm apart.

Finally, slide a bamboo cane, brass rod, etc. through the loops and hang the rug on the wall.

Joining two parts of a rug

If your rug is made up of two parts, you will have to join these at the end.

To do this, use the strongest type of thread available and take it two or even four-fold. With the right sides of the two rug parts facing, backstitch into the canvas squares of the last row of knots.

Be careful not to pick up and tear out any yarn in the process.

Fold the two canvas edges to either side, fold back one row of large squares, and sew the edge in position.

The rug is now ready for binding/fringing as given above.

Hints on designing your own rugs

Of course, you can also make rugs to your own liking and designs, in which case observe the following points:

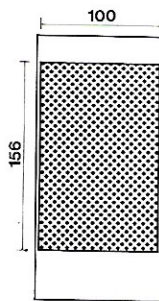
Colouring the pattern sheet

To colour the pattern sheet, we recommend using coloured felt-tipped pens or coloured pencils.

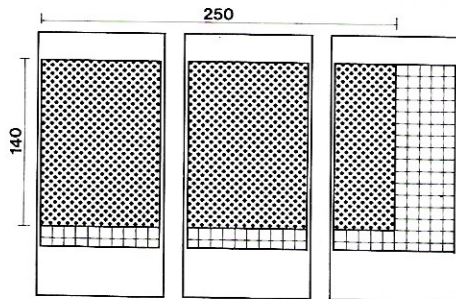
Do not use poster paints as these will obliterate the black lines on the pattern sheet, making it difficult to see the individual squares when it comes to making the rug.

Remember: The first vertical row of pattern sheet squares corresponds to the first row of knots on your rug.

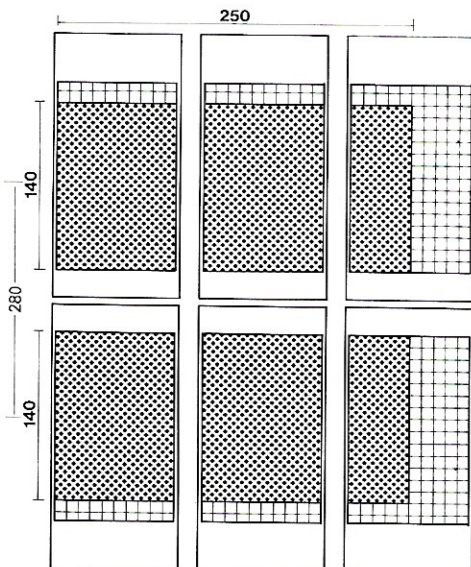
This row has 156 squares which is the maximum rug width possible on the rug-maker.



If your rug design is less than 156 knots long and less than 100 knots wide, the length and width on the pattern sheet can be reversed. In other words, the first vertical row of your pattern sheet equals the long edge of your rug.



As soon as your rug is longer than 156 knots, your pattern must run sideways across the pattern sheet. This means, the first left vertical row of your pattern sheet equals the short edge of your rug.



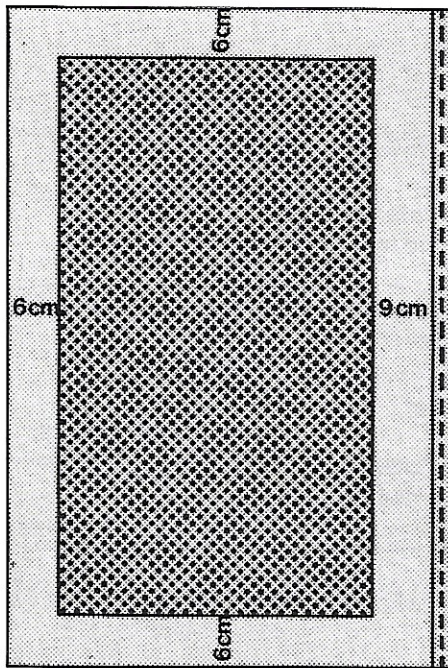
If your rug is not only longer than 156 knots but also wider than 156 knots, it has to be made up in two parts.

If you want a rug with 280 knots in the width, you make two panels 140 knots wide each, and join them at the end.

If a two-part rug is absolutely symmetrical along the vertical centre line, the same pattern sheets can be used for both halves.

Hints on designing your own rugs

The size of the canvas



If you cut the canvas yourself, observe the following points:

First work out length and width of your rug. Since 13 knots equal 10 cm, you have to divide the number of knots by 1.3 to obtain the measurements of your rug in centimetres.

Remember: The first vertical row of squares of your pattern sheet equals the width of the first row of knots, and this must never run parallel to the selvages but at right angles.

On the side where the selvage is, add 9 cm to the actual rug measurement. For the other edges add 6 cm.

Yarn requirement

For each knot you need 6.5 cm of yarn.

For 1 m of edge you need 14.5 m of yarn for binding.

For 1 m of fringe you need 37.5 m of yarn.

Be on the generous side when you work out the yarn requirements. You might suddenly find at the end that you have run out of yarn and that there is none left of the same dye lot, in which case there may be differences in the colour shades.

Important: Always use the yarn and the canvas recommended by your dealer when making a rug with the tapimatic.

Suggestions for different motifs

Would you like to design a rug with a symmetrical motif and resembling an oriental rug? Then read the following:

Borders

It is often advisable to begin a design with the edge borders as their pattern repeats will finally influence the exact measurements of your rug.

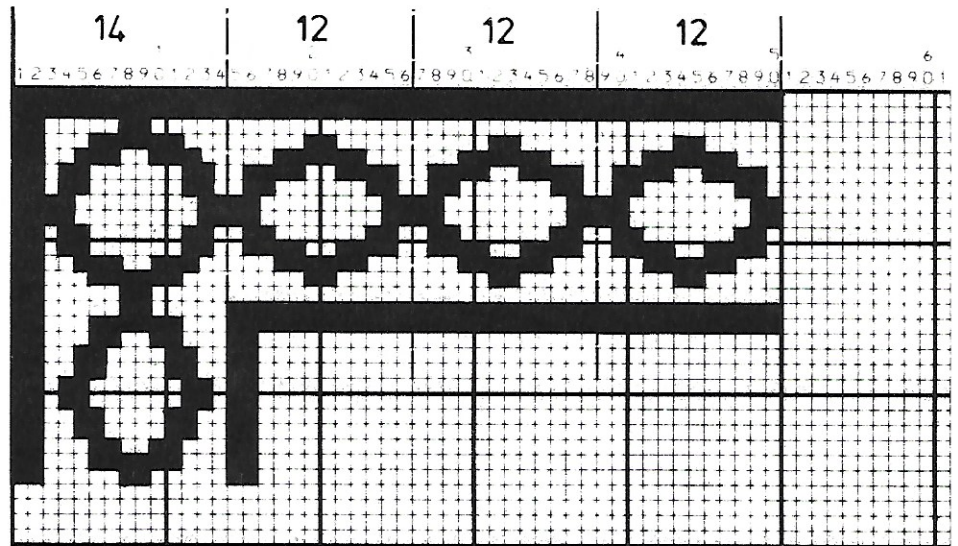
The smallest motif unit repeating itself continuously is called a pattern repeat.

It is important to think right from the start about how to take the border round the corner.

Hints on designing your own rugs

For further explanation study the following examples:

Example 1



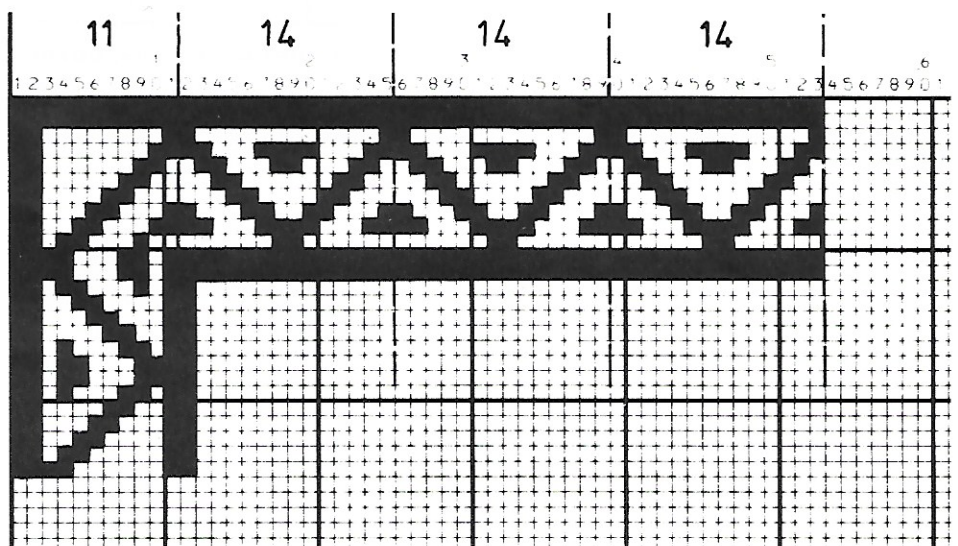
The pattern repeat of this border consists of 12 squares or knots. And as you can see already, you don't need the same number of squares for the corner as you do for the pattern repeat. From the end of the last repeat to the edge of the rug you need 14 squares.

To work out the exact width of your rug, proceed as follows:

Two corners at 14 squares = 28 squares. To this add 12 squares as many times as you need to reach the approximate rug measurement you have in mind.

Example: You would like a rug about 100 cm wide. Remember 10 cm = 13 knots, you therefore need 130 knots. First deduct from 130 knots the 28 knots for the two corners, this leaves 102 knots. 102 divided by 12 equals 8, leaving 6. This means you can repeat the pattern repeat 8 or 9 times. If you repeat it 9 times, your calculation looks like this: $2 \times 14 = 28$ plus $9 \times 12 = 108$, equals a total of 136 knots. If you repeat the pattern repeat only 8 times, you have 12 knots less, i.e. 124 knots. In which case you will either have 6 knots more or 6 knots less than the desired measurement. If you want to come closer to the ideal measurement, you will have to choose another motif for your border.

Example 2

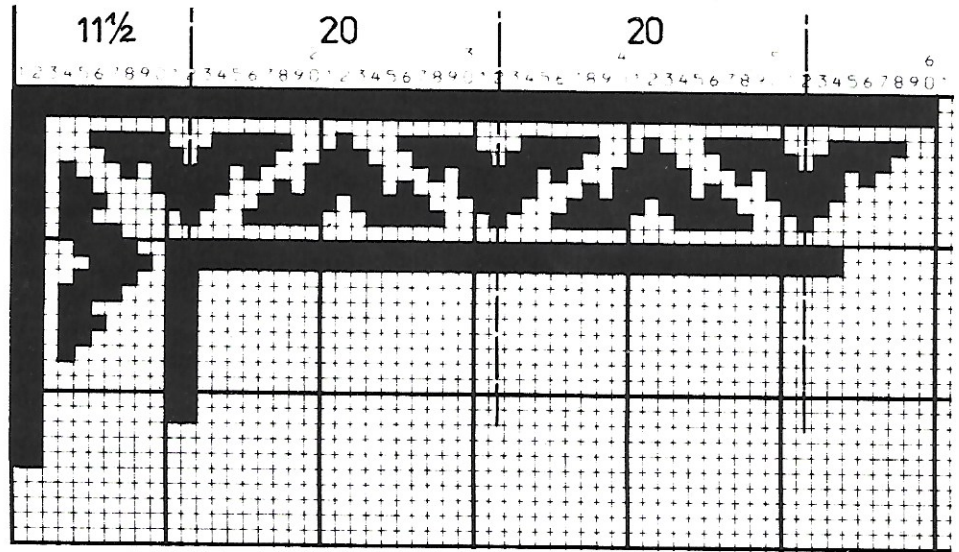


Here the pattern repeat for the border has 14 and the corner 11 squares.

You therefore add 14 to 22 as many times as you need to reach the

Hints on designing your own rugs

Example 3

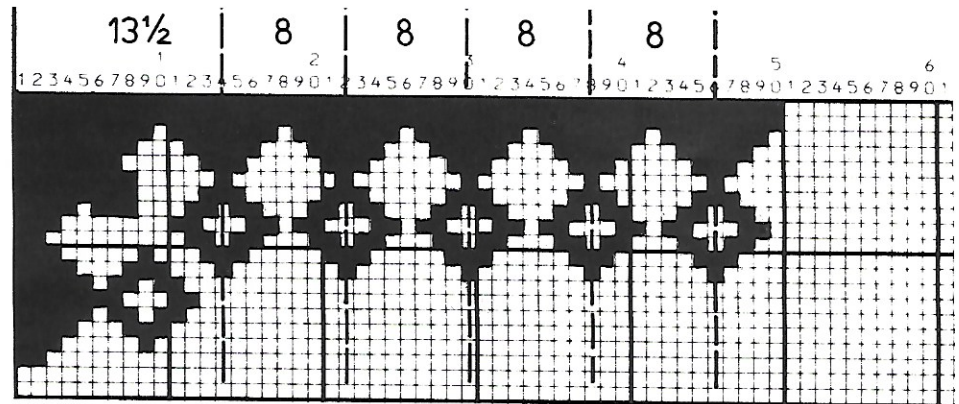


Here, the pattern repeat for the border has precisely 20 squares, while the corner has $11\frac{1}{2}$ squares.

Note that in this example the division from one pattern repeat to the next does not coincide with a line delineating the squares, but lies at the centre of a row of squares.

In spite of this, the method for calculating the border remains the same as in the previous examples. The above observation becomes important only when it comes to placing a centre motif.

Example 4



Pattern repeat 8 squares, corner $13\frac{1}{2}$ squares.

Here again, the dividing line between the pattern repeats runs along the centre of a row of squares.

Hints on designing your own rugs

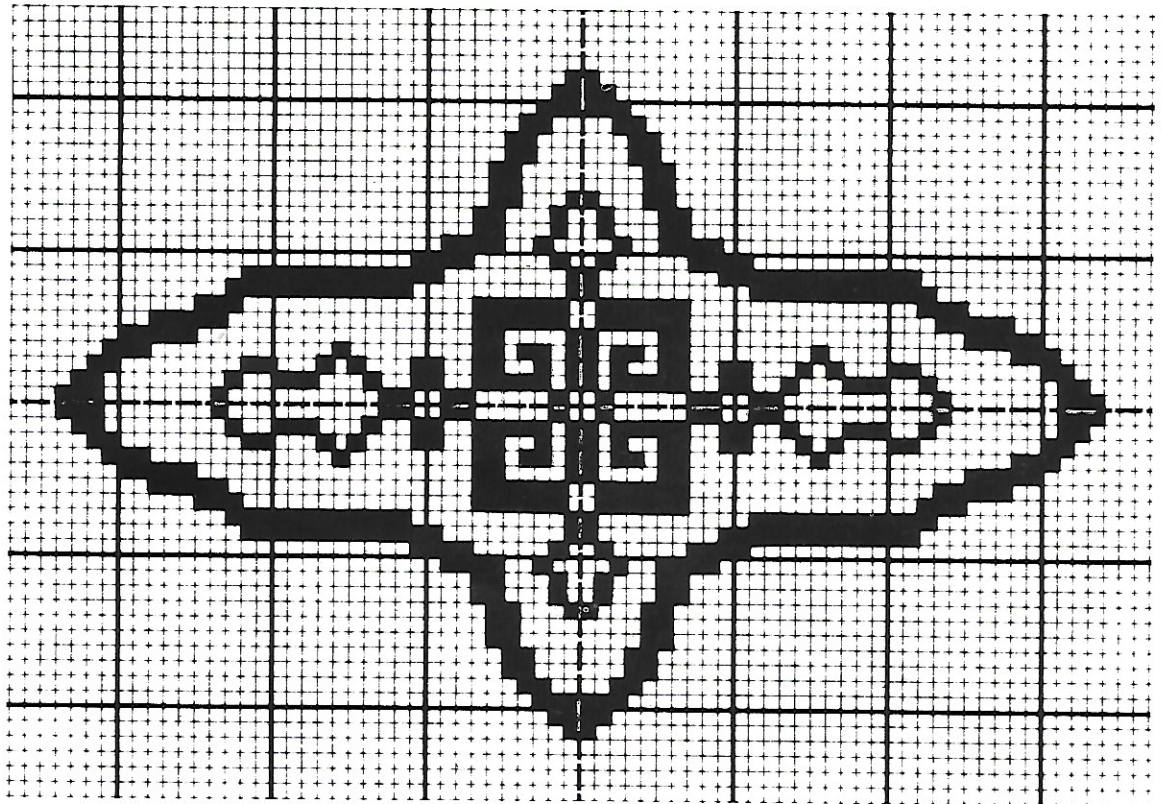
Centre motifs

You have designed a border for your rug, and now also decide to place a motif in the centre of the rug.

Here you should note carefully where the rug's symmetrical axis lies, as obviously you want to position the centre motif right in the middle of the rug.

So here again look at the following examples:

Example 1

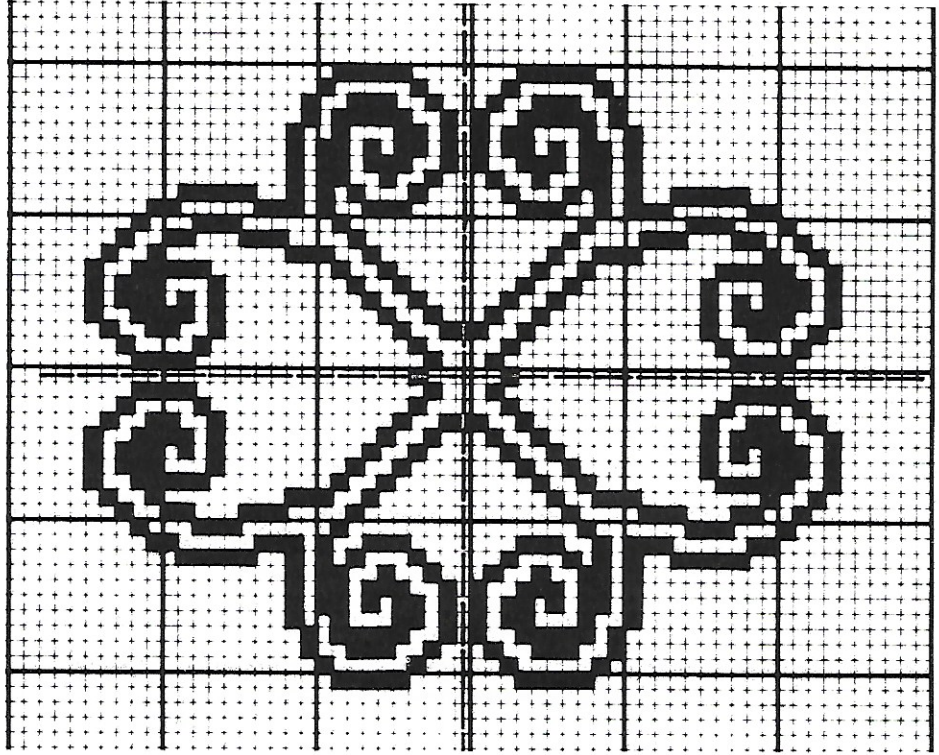


Note that here the centre or symmetrical axis of the motif coincides with a line between the squares.

Such a motif belongs on a rug where the border repeats are arranged in the same way, i.e. the dividing line between repeats coincides with a line between the squares (Examples 1 and 2).

Hints on designing your own rugs

Example 2

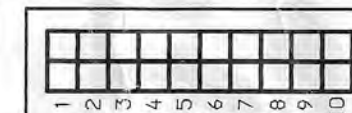
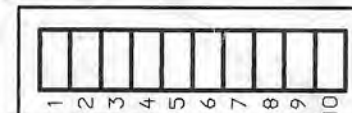
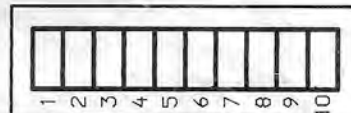
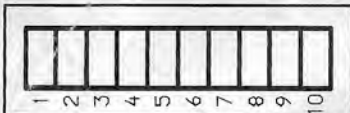


Note that here the centre axis runs along the centre of a row of squares.

Such a motif belongs on a rug with a border as in examples 3 and 4 on page 26.

These are just a few suggestions to help you on your way to an enjoyable and creative hobby. The tapimatic gives you the opportunity to give free rein to your imagination in making your own individual creations.

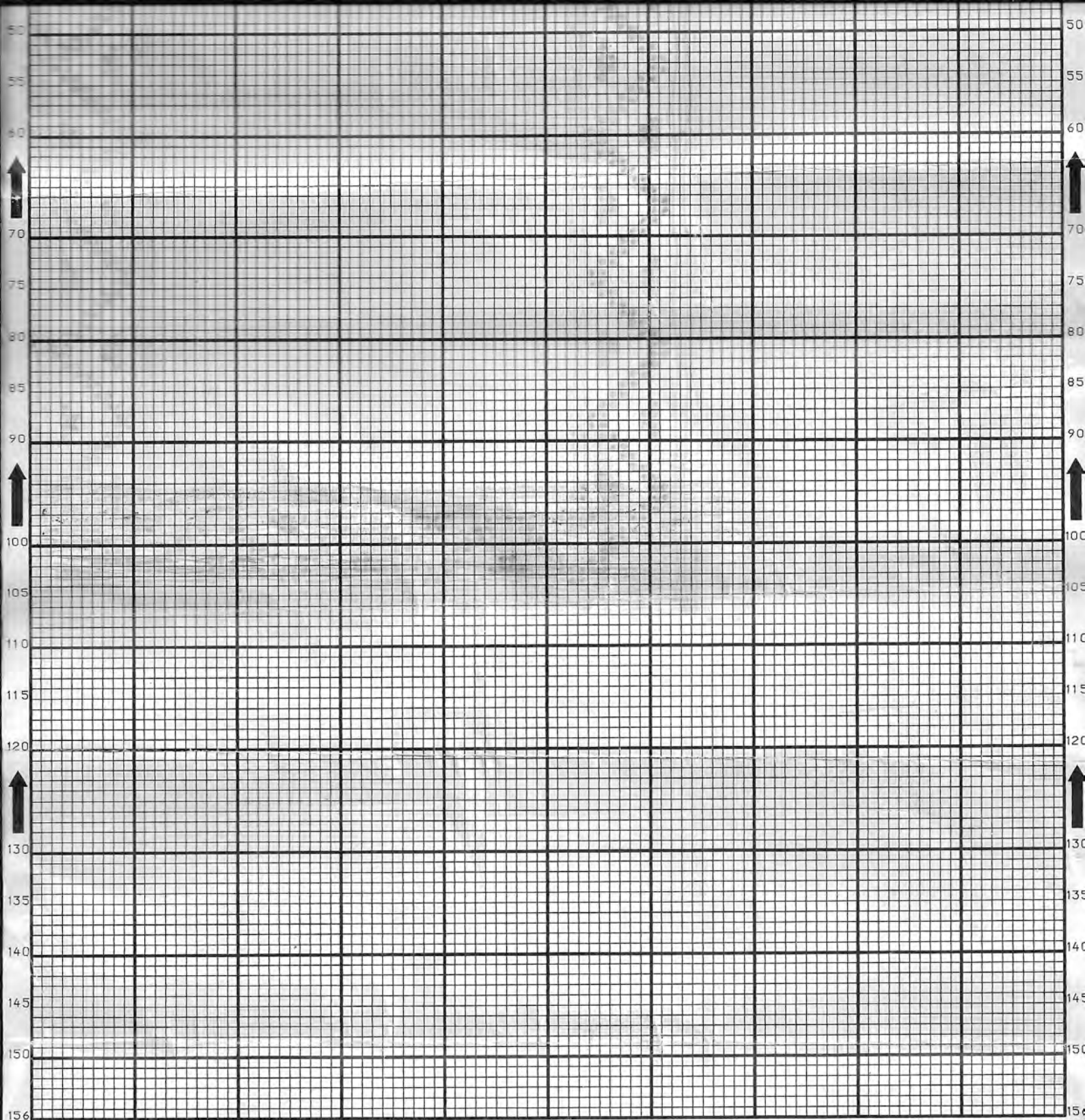




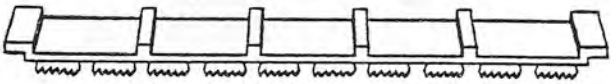
tapimatic rug maker

1 2 3 4 5 6 7 8 9 10 1 2 3 4 5 6 7 8 9 10 1 2 3 4 5 6 7 8 9 10 1 2 3 4 5 6 7 8 9 10 1 2 3 4 5 6 7 8 9 10 1 2 3 4 5 6 7 8 9 10

1
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90
100
105
110



White special yarn brake



You will need the special yarn brake if instead of using the rug yarn recommended by us, you use a thinner rug yarn or even bulky knitting yarn taken two or threefold.

Suitable yarns :

To ensure that your rug has the proper density, the yarn you are using should have the following yard-lengths :

Rug yarn, single, without special yarn brake

40 - 50 metre-length per 100 grams

Rug yarn, single, with white special yarn brake

50 - 60 metre-length per 100 grams

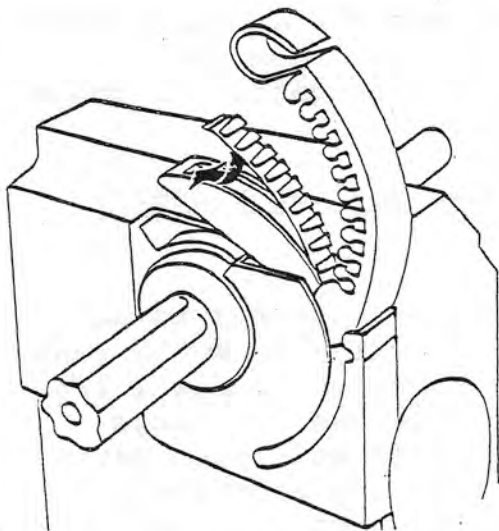
Knitting yarn, two-fold, with white special yarn brake

80 - 120 metre-length per 100 grams

Knitting yarn, three-fold, with white special yarn brake

120-180 metre-length per 100 grams

Fitting the special yarn brake



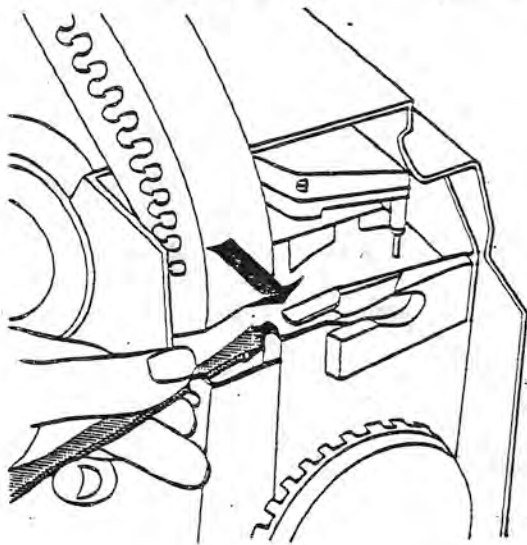
- Turn the handle of the colour changer as far back as it will go, hold it firmly and open up the yarn flap by pulling it forward by its looped handle.
- Facing the yarn flap, you will see the yarn brake. Hold it by one of its brake-feet and pull it to the front out of its support.
- Now fit the white special yarn brake into the empty support bending it slightly to the front. Make sure that the serrated edges of the brake-feet face to the right.

Fitting the rubber collars

If your knotting unit is not yet fitted with rubber collars, it is essential that you fit these rubber collars.

If your knotting unit is already fitted with rubber collars, these will have to be changed from time to time as they wear out. However, before replacing the collars, remember that the collars can first be turned so that the other end and the reverse side can also be used.

Fitting the metal part of the gripper with the larger rubber collar



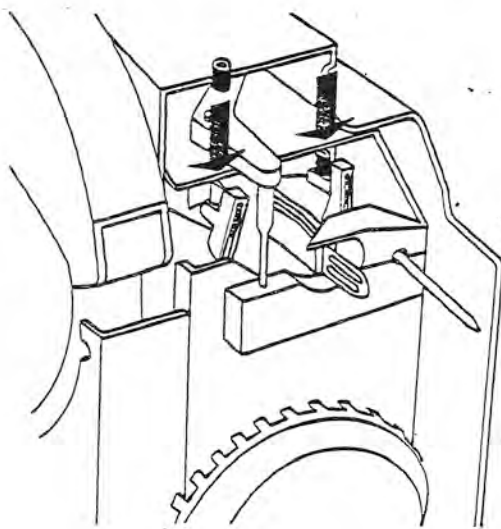
First of all get a pair of tweezers ready with which you can firmly grip the rubber collar.

- Tip the knotting unit to the back and turn the colour changer handle right to the back.
- Starting from the rest position, turn the knotting handle a little more than $1/8$ to the front. The gripper now comes forward from the right.
- The gripper consists of a lower plastic part and an upper metal part. When the gripper is open, hold the handle firmly in this position until you have fitted the rubber collar. (Should you have turned the handle too far and the gripper has closed up, you can turn the handle back again.)

- Now pick up the tweezers with your left hand and use them to push the rubber collar onto the upper metal part of the gripper by guiding the collar from the left behind the yarn brake into the knotting unit. You may find it easier to slip on the collar only lightly, and then push it completely in position with your finger. The collar should cover the front end of the metal part and not protrude.

(In case you should have dropped the collar into the knotting unit, you can retrieve it by loosening the knotting unit from its support and shaking it with the opening facing down until the collar falls out.)

Fitting the upper part of the tongs with the two smaller rubber collars



Here again the knotting unit has to be tipped back first. Starting from the rest position, turn the knotting handle $1 \frac{1}{8}$ turn to the front. Now, the two tongs with their toothed lower and upper parts will come forward from the left and right. Hold the handle in position when the tongs are opened up. The rubber collar must now be pushed by hand onto the upper parts of the tongs. Complete the turning of the handle.