



APPLICATION MANUAL

Crystal Threads

PRECIOSA



Sewing and hand application

Preciosa Crystal Components offer a wide range of various products ideal for sewing and embroidery. Thanks to a rich choice of shapes, sizes, settings and applications, Preciosa crystals can be used in mass apparel and accessories production, designer’s studios and Do-It-Yourself activities. Stones can be easily applied with industrial sewing or embroidery machines or household sewing machines and are also suitable for various manual applications.

PRODUCT OVERVIEW

	COMPONENTS	SEWING	HAND APPLICATION
Flat Back Stones	Sew-on Stones	✓	✓
Beads and Pendants	Beads	✓	✓
	Pendants	✓	✓
Nacre Pearls	Nacre Pearls	✓	✓
	Cup Chains	✓	✓
Fashion and Fashion Jewellery Components	Plastic Bandings	✓	✓
	Metal Bandings	✓	✓
	Stones in Settings	✓	✓

MACHINES, TOOLS AND AIDS

Use the following machines, tools and aids for sewing Preciosa components:

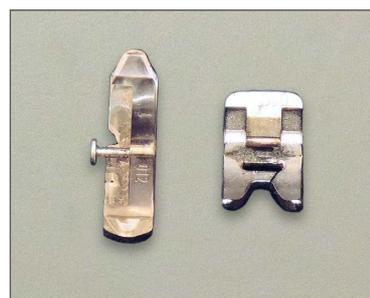
- Household sewing machine with common stitch types (straight, zigzag, button sewing programme).
- Industrial sewing machine.
- Sewing machine accessories – presser feet, needles, threads.
- Goggles.



Household sewing machine



Industrial sewing machine



Different types of presser feet

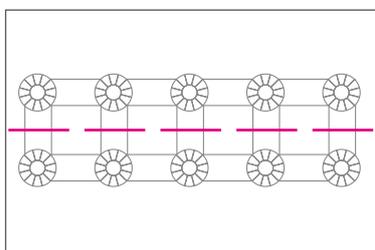
Sewing – basic rules

CHOICE OF THE RIGHT THREAD

Synthetic threads of 50 – 60 Nm strength are the most suitable for sewing Preciosa stones. The threads are abrasion resistant and products with these threads are sufficiently resistant against any damage. Cotton threads are not suitable as their abrasion resistivity is lower.

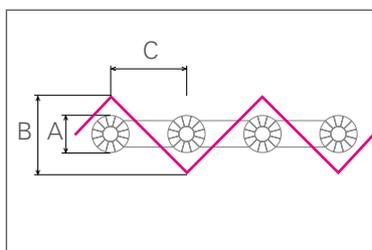
CHOICE OF THE STITCH TYPE

A wide range of stitches can be used for sewing Preciosa stones, beads and applications:



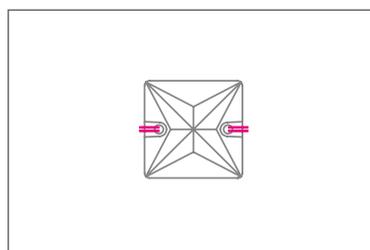
Straight stitch

The stitch length should be selected according to the space between the cups so that the stitch fits into the space.



Zigzag stitch

The length and width of the stitch has to be adjusted to the applied element. The stitch width (B) should be by 0,5 mm – 1 mm broader on both sides than is the applied crystal element (A). The stitch length (C) should be equal to ca. 2/3 of the stitch width. It might be necessary to reduce the tension of the upper thread sometimes.

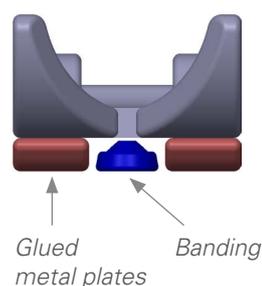
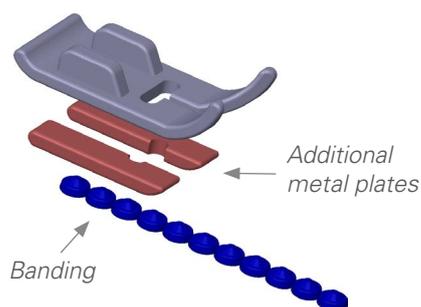


Button sewing programme

Sew-on stones can be easily applied using a button sewing programme. A correct stitch width must be chosen. Proceed according to the sewing machine manual.

ADAPTED PRESSER FOOT

A standard presser foot of the household sewing machine can be adapted for an easier sewing on of plastic bandings. Take two small metal plates and fix one on the left side and one on the right side of the presser foot with an epoxy glue. The resulting gap should be equal to the banding width.



TYPES OF MACHINE APPLICATION OF CRYSTAL COMPONENTS

APPLICATION		MACHINE	TOOL	PROGRAMME	NOTE
Sew-on stones		Sewing machine	Button foot	Programme for button sewing without the feed function	Switch off the lower feed, adjust the stitch width to the product
Plastic Bandings	Basic (one row)	Sewing machine	Adapted standard presser foot	Zigzag stitch	Adjust the stitch width to the product
			Zipper foot	Straight stitch	Net edges
	Basic (multiple rows)	Sewing machine	Standard presser foot	Straight stitch, Zigzag stitch	Adjust the stitch width to the product
			Zipper foot	Straight stitch	Net edges
	Fishnet	Sewing machine	Adapted standard presser foot	Straight stitch	
Decorative	Sewing machine	Zipper foot	Straight stitch	Net edges	
Metal Bandings		Sewing machine	Standard presser foot	Straight stitch	
			Zipper foot	Straight stitch	Net edges
Cup Chains		Sewing machine	Adapted standard presser foot	Zigzag stitch	Adjust the stitch width to the product

Crystal Threads Application with a sewing machine

Choosing the right thread (strength ca. 50 – 60 Nm) and needle (strength ca. 80 Nm) is particularly important for sewing on applications. A right tension of the upper and lower thread has to be set on the sewing machine. The fabric must be smoothly stretched and the upper and lower thread should run easily and smoothly.

Tests with the material chosen for the application should be carried out before beginning the production.

It is important to set the sewing machine to the correct hole pitch and stitch length and width before sewing on crystal stones. This prevents the stones from being damaged during sewing on and reduces the risk of an injury.

When sewing high multi-row bandings, problems with the sewing machine feed caused by an inclined presser foot can occur. Use a height compensating pad to avoid this. Place it beneath the presser foot so that the presser foot is parallel to the material which then feeds through smoothly.

CRYSTAL THREADS

The following product is suitable for application by sewing or embroidering.

- **Machine:** Sewing machine.
- **Tools:** Adapted standard sewing foot.
- **Program:** Zigzag stitch that is wider than crystals of the Crystal Threads.
- **Useful information:** Make sure that the Crystal Threads run straight in the foot.



Sewing machine needles sizes 70-90 mm

*Coil with wound
Crystal Threads*

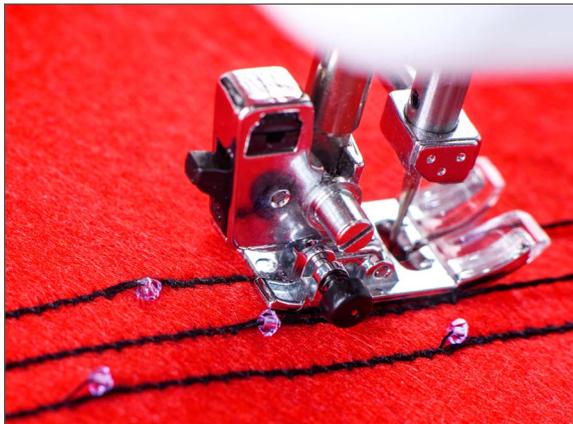
STANDARD HOUSEHOLD SEWING MACHINES

Offer a zigzag stitch or another decorative stitch which offers your sewing machine suitable for the Crystal Threads application.



AIDS

A foot for sewing on beads and crystal pearls.



Hand Application

The Crystal Threads can be also applied by hand, knitted or crocheted.



Crocheting

Crocheting with the Crystal Yarn can be done using normal crochet hooks.



Important advice and information

POSSIBLE PROBLEMS, THEIR CAUSES AND RECOMMENDATIONS

PROBLEM	CAUSE
The product or fabric does not feed through correctly.	1, 2, 3
The sewing machine misses stitches.	4, 5, 6, 7
The thread tears.	4, 6, 8, 9
The needle breaks.	10, 11, 12, 13
The stones fall from the cups.	14

CAUSE	RECOMMENDATION
1 The foot pressure is too low.	Increase the foot pressure according to the instructions.
2 There is dust between the feeder teeth.	Clean the teeth.
3 The upper feed is faulty.	Replace the upper feed.
4 The needle is bent or damaged.	Replace the needle.
5 The needle is not fitted correctly.	Push it right up into the needle holder.
6 The machine is wrongly threaded.	Re-thread the machine.
7 The thread tension is incorrect.	Check the thread tension.
8 There are knots on the thread or it is too thin.	Check the thread for faults and change it if necessary.
9 The components forming stitches can be damaged.	Have the sewing machine checked by a specialist.
10 The wrong needle was used.	Choose a needle of correct size for the base material.
11 The bobbin is not fitted correctly.	Check the bobbin.
12 The needle is too thick and gets stuck in the product.	Use a thinner needle.
13 The needle hits the stone.	Sew more slowly and feed the product through the machine more carefully.
14 The needle damages the cup.	Check the stitch length and the needle thickness.

GENERAL RECOMMENDATIONS

FASHION JEWELLERY STONES

FLAT BACK STONES

		Round Stones, Channel	Fancy Stones, Ball	No Hotfix Stones	Hotfix Stones	Sew-on Stones
Stones with coatings — use only gentle wash cycle (30 °C).	 Turn inside out, choose a gentle wash cycle and use mild laundry detergent. To protect the crystals as much as possible, the use of a soft wash bag is recommended.	●	●	●	●	●
	 Turn inside out and use mild laundry detergent.					
	 Do not wash!					
	 Chlorine bleach may be used.					
	 Do not use chlorine bleach!	●	●	●	●	●
	 Turn inside out and dry at reduced temperature.					
	 Do not tumble dry!	●	●	●	●	●
	 Iron inside out using a silk/polyester viscose setting. Ironing the textile inside out and using a pressing cloth is recommended.					
	 Iron inside out using a wool setting.			●	●	●
	 Do not iron! Do not iron directly over the crystals.					
To protect the crystals as much as possible, the use of a soft wash bag is recommended.	 The textile can be gently dry-cleaned using perchlorethylene. Turn inside out.	●	●			
	 The textile can be gently dry-cleaned using hydrocarbon.	●	●	●	●	●
	 The textile will withstand gentle professional wet cleaning. Turn inside out.	●	●	●	●	●
	 The textile may not be dry-cleaned.	●	●	●	●	●

**BEADS AND
PENDANTS**

**NACRE
PEARLS**

**FASHION AND FASHION
JEWELLERY COMPONENTS**

Beads

Pendants

Cup Chains

Plastic
Bandings

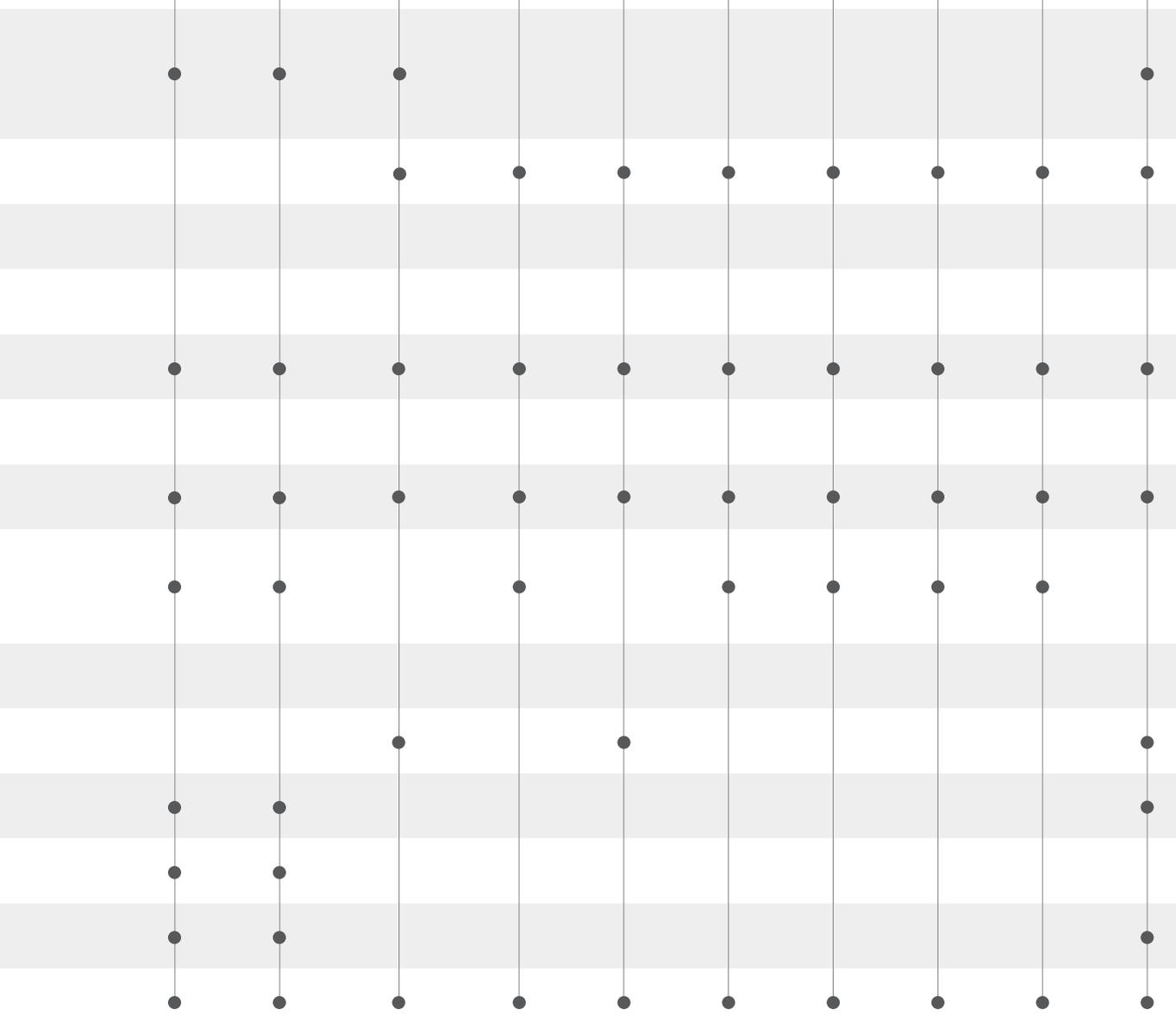
Metal
Bandings

Rondelles
and Balls

Fancy
Rondelles

Stones in
Settings

Crystal
Threads



Preciosa Components

A Member of the Preciosa Group

Preciosa Group is a global leader in products *manufactured from crystal*. From the world famous Czech Beads and Crystal Components used in fashion industry, to tailor made Lighting projects for luxury hotels, royal palaces and yachts, the true craftsmanship of crystal production has been present in Bohemia since 16th century.

PreciosaComponents.com