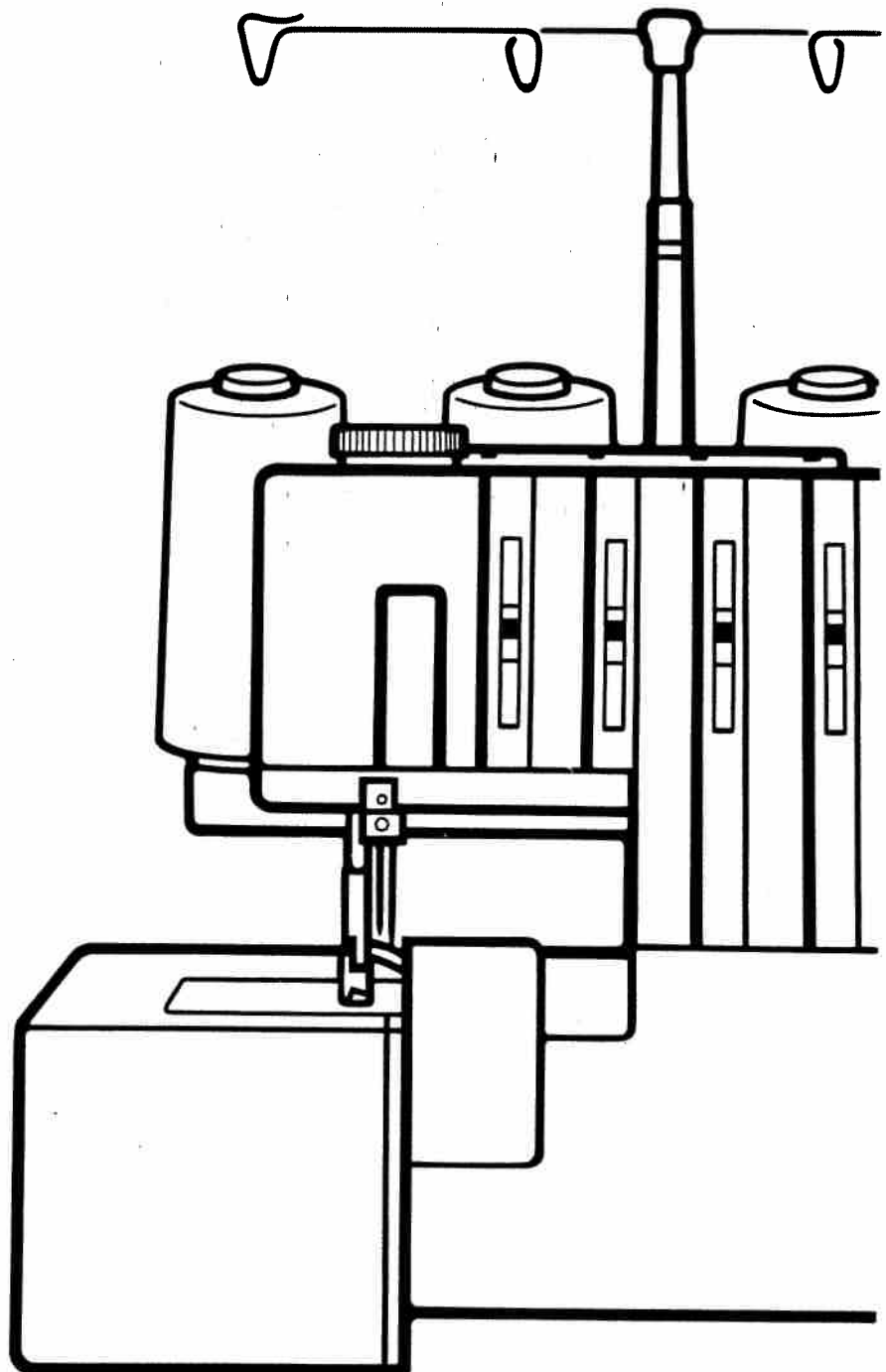


HANDBOOK FOR HUSKYLOCK SEWING MACHINE

MODELS 560ED/560D/560/
460D/460



Husqvarna



CONGRATULATIONS ON CHOOSING A HUSKYLOCK!

Your machine is a high quality, easy-to-use product. To fully enjoy all the features incorporated, however, we suggest that you study this booklet.

If you need more information regarding the use of your Huskylock, your Husqvarna dealer is always happy to be of service.

Enjoy Yourself!

TABLE OF CONTENTS

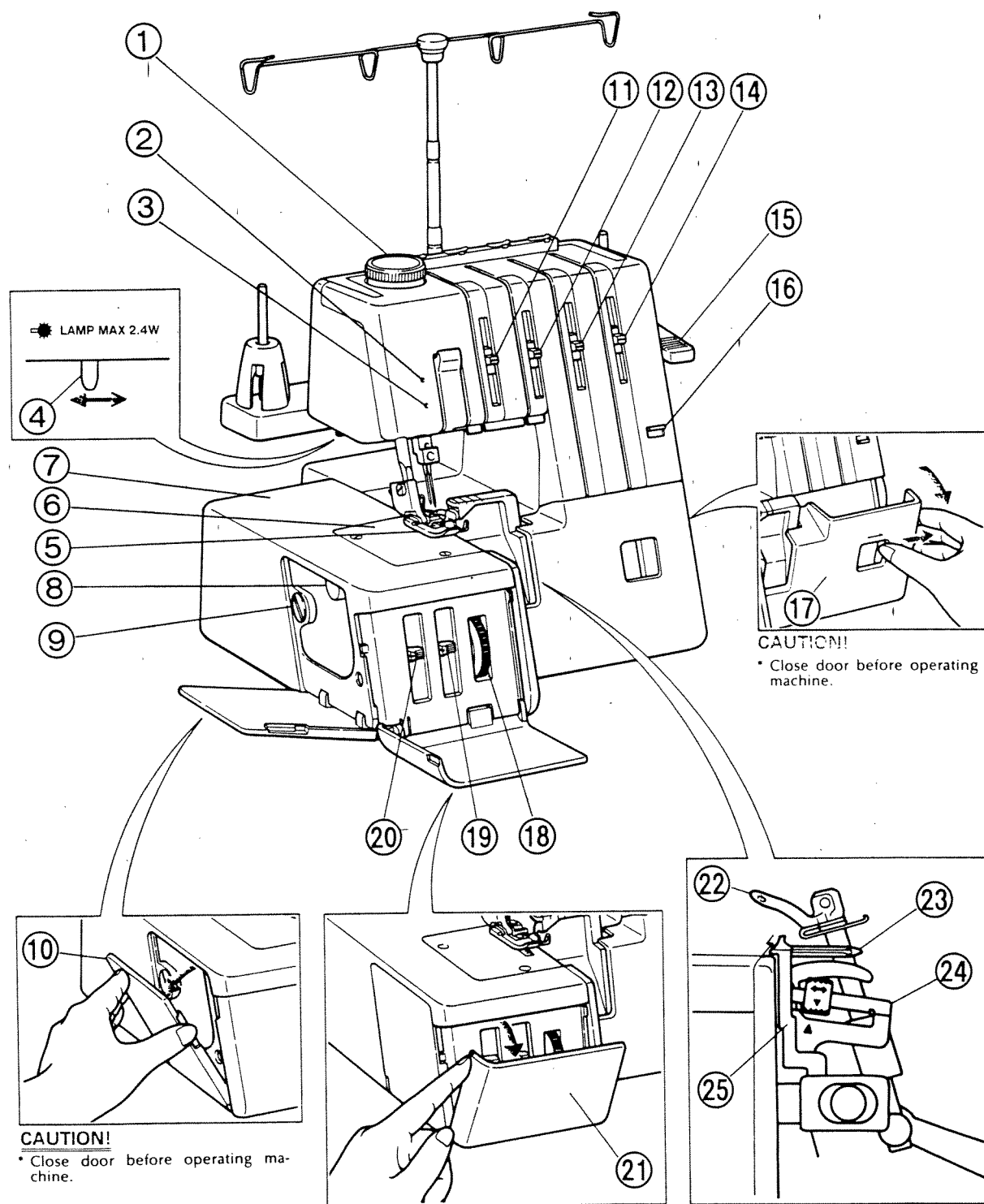
NAMES OF PARTS AND THEIR FUNCTIONS	1-2
NOTE Turning direction of motor	
ELECTRONIC FUNCTIONS	3
ACCESSORIES	4
NEEDLE	5
NOTE Two-needle models	
MOTOR	6
SETTING UP YOUR MACHINE	7
NOTE How to use the thread spool cap and the net.	
THREADING	8-11
Before threading...	
NOTE Threading order	
Threading overlooper	
NOTE If overlooper thread breaks during sewing	
Threading underlooper	
NOTE If underlooper thread breaks during sewing	
Threading needles	
SEWING	12
To start sewing	
Operation	
To remove the work	
Chaining-off	
If threads break during sewing	
STITCH SELECTION	13-14
NOTE Optional stitches	
RATIO CHART OF SEWING MATERIAL, THREAD AND NEEDLE	15
THREAD TENSION	16
Thread tension control levers	
NOTE Order of thread tension adjustment	
CHART OF THREAD TENSION ADJUSTMENT	17-20
STITCH LENGTH AND STITCH WIDTH	21
Stitch length	
Stitch width	
STITCH WIDTH AND CUTTING WIDTH FINE ADJUSTMENT	
MECHANISM	22
DIFFERENTIAL FEED MECHANISM	23
PRESSER FOOT PRESSURE	25
STITCH TONGUE	25
NOTE Don't touch the stitch tongue changing knob	
PERFORMANCE PROBLEMS FAULT-FINDING	26
CHANGING THE LIGHT BULB	28
RETRACTING THE BLADE	28
MAINTENANCE	29
MACHINE SPECIFICATION	30

CAUTION!

WHEN THREADING, REPLACING NEEDLE OR LIGHT BULB, BE SURE TO TURN OFF THE MAIN POWER SWITCH OF THE MACHINE.

WHEN THE MACHINE IS NOT IN USE, IT IS RECOMMENDED THAT THE ELECTRIC SUPPLY PLUG IS DISCONNECTED FROM THE WALL SOCKET TO AVOID ANY POSSIBLE HAZARDS.

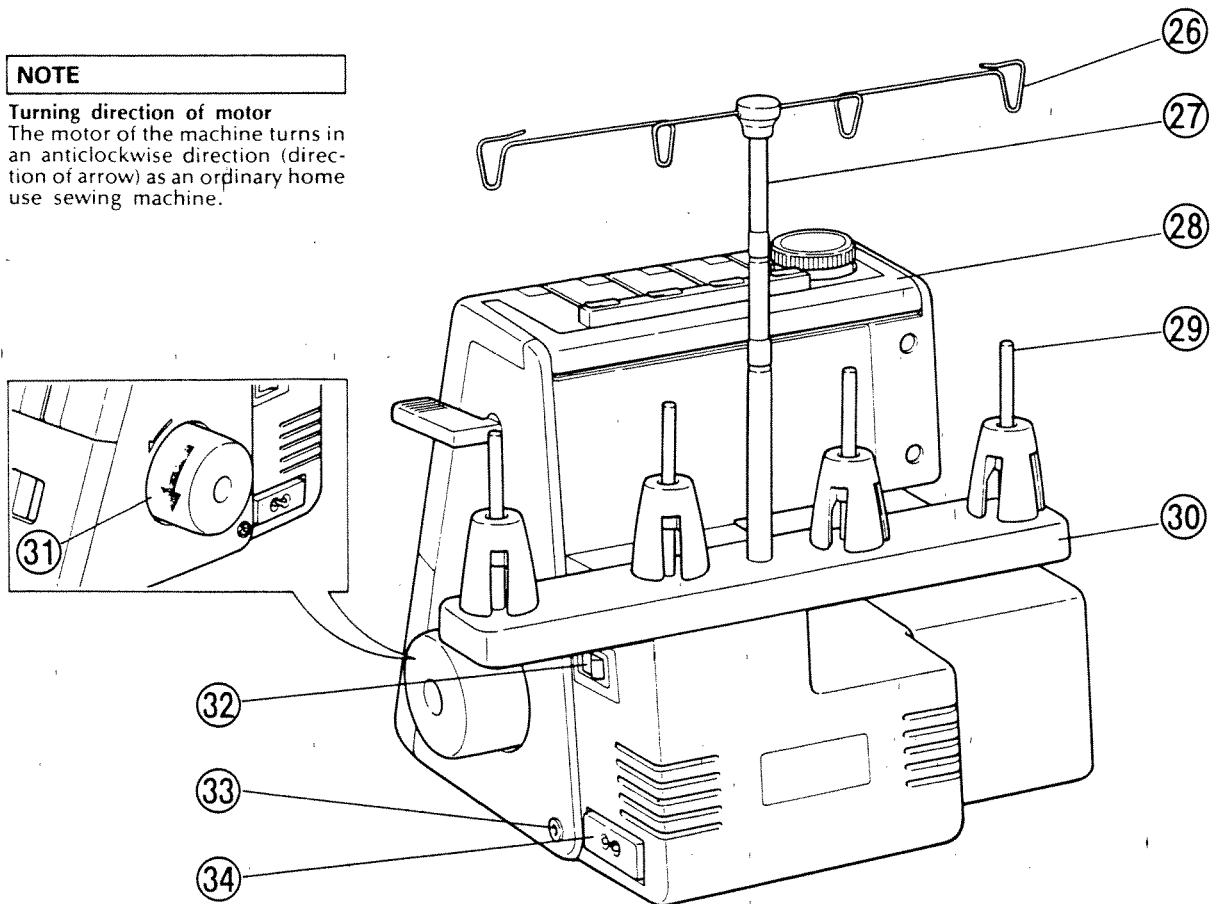
NAMES OF PARTS AND THEIR FUNCTIONS



NOTE

Turning direction of motor

The motor of the machine turns in an anticlockwise direction (direction of arrow) as an ordinary home use sewing machine.

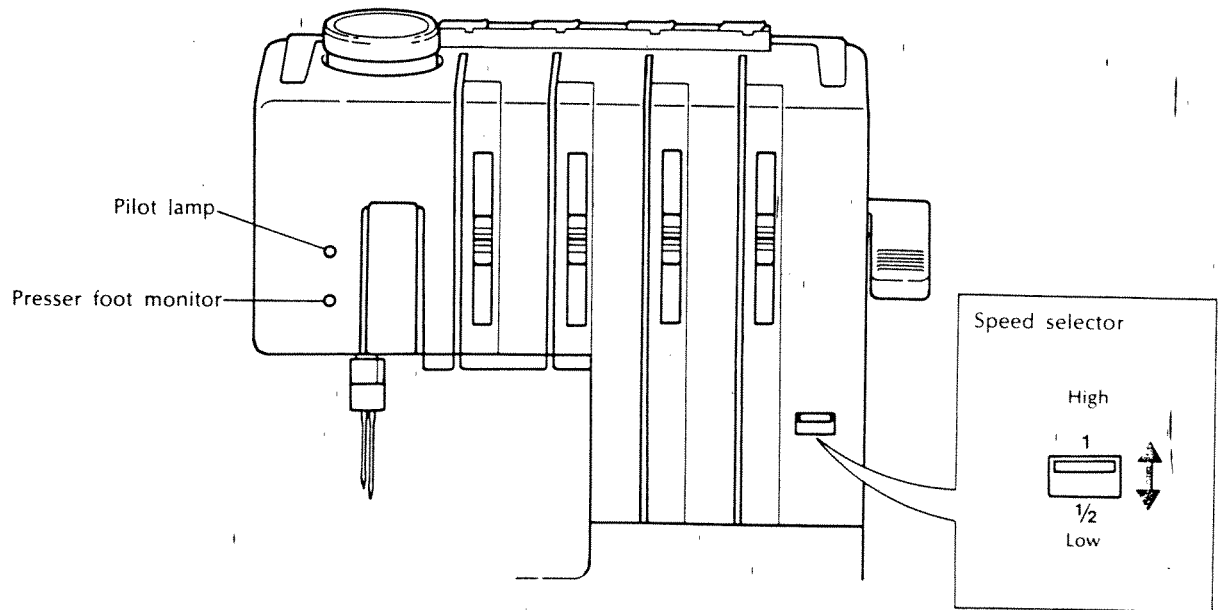


- ① Pressure adjustment dial
- ② Pilot lamp (560ED)
- ③ Presser foot monitor (560ED)
- ④ Light switch
- ⑤ Presser foot
- ⑥ Needle plate
- ⑦ Material plate cover
- ⑧ Blade retracting knob
- ⑨ Material plate cover set screw
- ⑩ Side cover
- ⑪ Thread tension lever for left needle thread (yellow)
- ⑫ Thread tension lever for right needle thread (red) (560/560D/560ED)

- ⑬ Thread tension lever for overlooper thread (green)
- ⑭ Thread tension lever for underlooper thread (blue)
- ⑮ Presser foot lever
- ⑯ Speed selector (560ED)
- ⑰ Front cover
- ⑱ Stitch width control dial
- ⑲ Stitch length control lever
- ⑳ Differential ratio control lever (460D/560D/560ED)
- ㉑ Control cover
- ㉒ Overlooper
- ㉓ Underlooper

- ㉔ Underlooper threading mechanism
- ㉕ Movable stitch tongue
- ㉖ Thread holder
- ㉗ Thread guide pole
- ㉘ Handle
- ㉙ Reel pin
- ㉚ Reel support
- ㉛ Handwheel
- ㉜ Main power switch
- ㉝ Controller jack (560ED)
- ㉞ Power cord socket

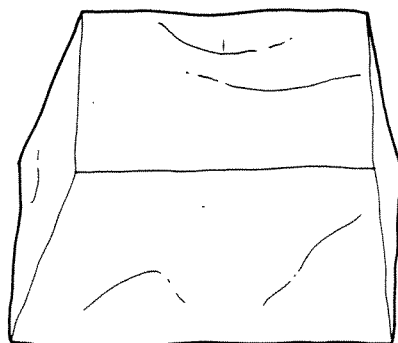
ELECTRONIC FUNCTIONS (560ED)



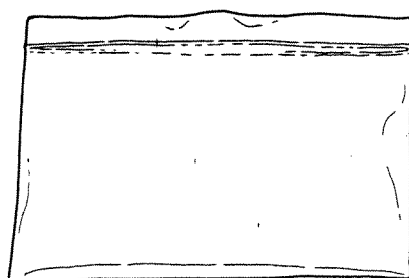
560ED has following electronic functions:

- 1) Electronic speed control in machine body
 - a. Two speed selection by speed selector (1500/700 spm)
 - b. Excellent needle penetration also at low speed
 - c. Steady speed control
- 2) LED monitor
 - a. Pilot lamp
 - Main power
 - Alarm for overload protectionWhen the machine is locked, the pilot lamp flashes with sound. At the same time, the machine stops automatically to avoid overload.
 - b. Presser foot monitor
Flashes when presser foot is in upper position. In this case, machine does not run even if you depress foot controller.

ACCESSORIES



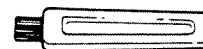
SOFT COVER



ACCESSORY BAG



OILER



CLEANING BRUSH



NET
(560, 560D, 560ED: 4 PCS)
(460, 460D: 3 PCS)



THREAD SPOOL CAP
(560, 560D, 560ED: 4 PCS)
(460, 460D: 3 PCS)



TWEEZERS



SCREW DRIVER (460, 460D)



NEEDLE SET
SCHMETZ 130/705H #70: 2 PCS
SCHMETZ 130/705H #80: 2 PCS

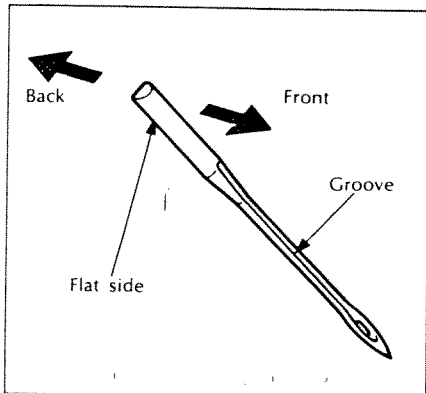


SCREW DRIVER
(560, 560D, 560ED)

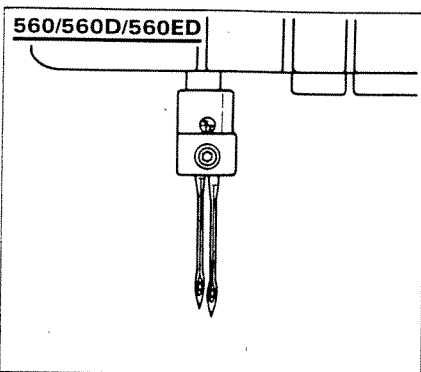


HEXAGONAL WRENCH (560, 560D, 560ED)

NEEDLE



Home use needle (SCHMETZ 130/705H) should be used.



To remove the needle

- 1) Turn the main power switch to off.
- 2) Turn the handwheel anticlockwise by hand until the needle is in its highest position.
- 3) Loosen the needle set screw with screw driver (460/460D) or hexagonal wrench (560/560D/560ED) and remove the needle.

To insert the needle

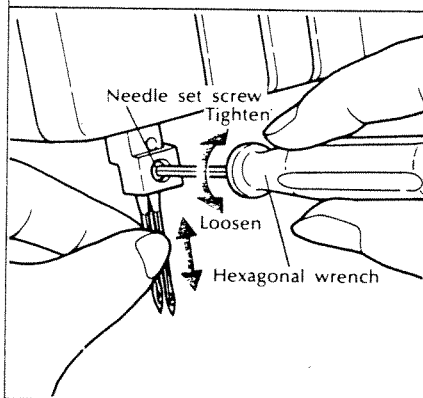
- 1) Turn the main power switch to off.
- 2) Turn the handwheel until the needle bar is in its highest position.
- 3) Hold the needle with its flat side away from you and insert it as far as it goes.
- 4) Tighten the needle set screw securely.

NOTE

Two needle models (560ED, 560D, 560)

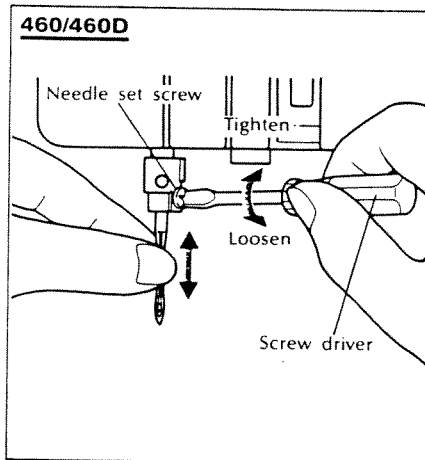
* On two-needle models, we suggest you hold the two needles by one hand and then you insert them at the same time.

* When the needles are inserted correctly, the right needle should be set slightly lower than the left one.



CAUTION!

The needle set screw holds both needles. Bear this in mind when you loosen the set screw to exchange one or both needles.



MOTOR

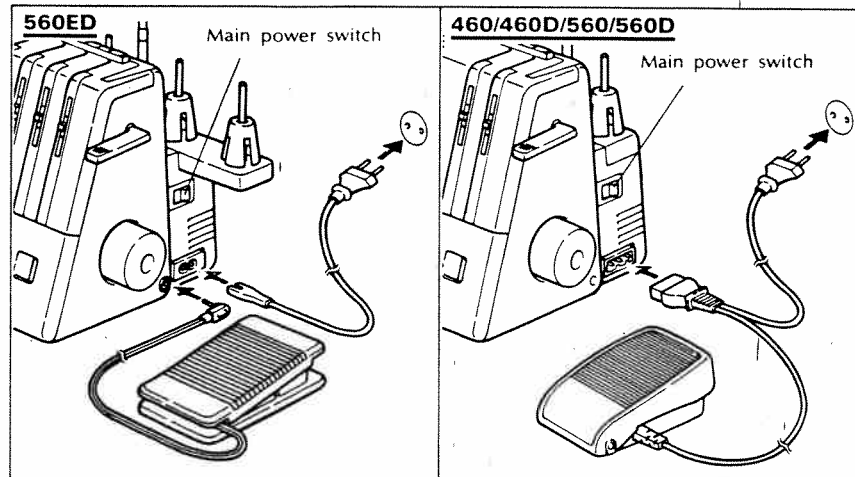
- * The maximum operating speed of this sewing machine is 1,500 stitches per minute, which is quite fast compared to the operating speed of 600 to 800 stitches per minute for the ordinary home sewing machine. It should be noted that the motor of this sewing machine turns in the same direction as the motor in an ordinary home sewing machine.
- * The bearings in the motor are made of special, sintered oil-impregnated alloy mounted in oil-soaked felt to withstand long hours of continuous operation.
- * Continuous operation of the sewing machine will slightly increase the temperature of the motor and foot controller, but this will in no way affect the performance.
The motor and foot controller are equipped with ventilating holes, which must not be covered with cloth or paper during use.
- * When the motor is running, sparks may be seen through the ventilating hole in the motor bracket on the side opposite the handwheel. These sparks are produced by the carbon brushes and the commutator, and are of no significance.

Safety regulation for domestic sewing machines in conformity with "CEE Publication No.10, Part II, Section C, Article 7.1".

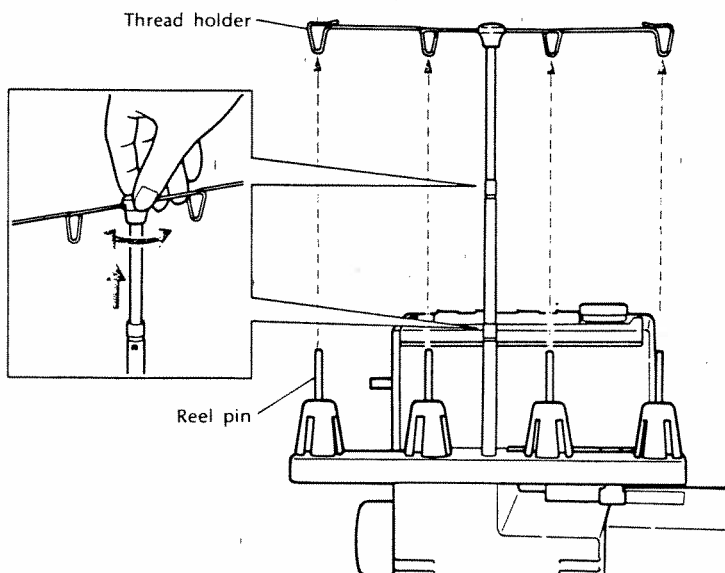
When the machine is not in use, or when threading, replacing needle or light bulb, the machine must be disconnected from the power supply by removing the plug from the wall socket. Use bulbs designed for max 8V/2.4W.

The machine has an interference suppressor for radio and television, complying with Directive No.82/499 E.E.C. and C.I.S.P.R.

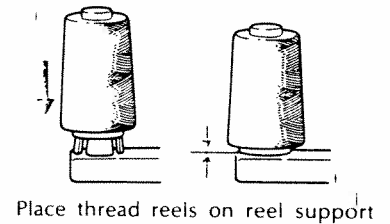
SETTING UP YOUR MACHINE



Connect the machine to the power supply.

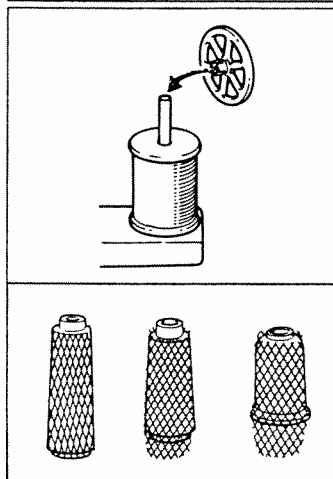


Raise the thread guide pole and set it by the positioning stopper at the joint of the upper and lower sections. Make sure that the thread holders are right above the reel support.



Place thread reels on reel support

NOTE



How to use thread spool cap and net

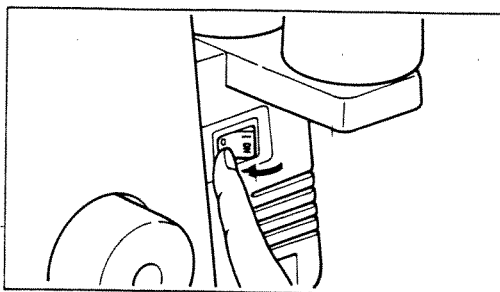
Thread spool cap

When you use a wooden thread reel, use the thread spool cap as illustrated.

Net

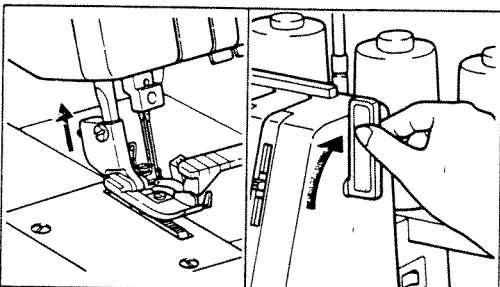
If you are sewing with loosely spun nylon thread, we recommend that you cover the spool with the net supplied to prevent the thread from slipping off the spool. Adapt the net to the shape of the spool, as per illustration.

THREADING



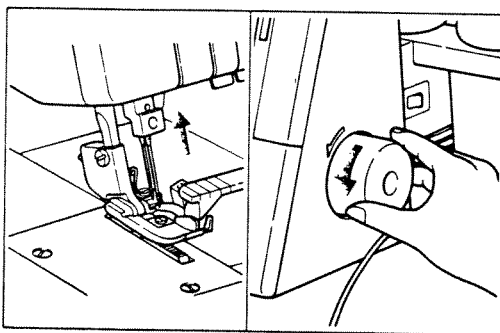
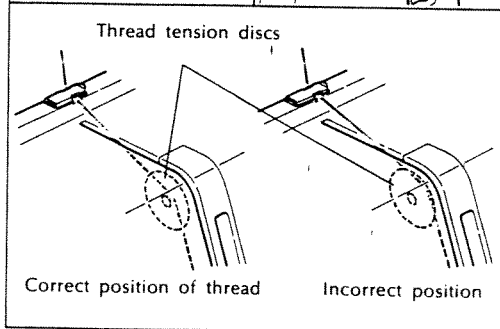
Before threading...

- 1) Turn off the main power switch for safety.



- 2) Raise the presser foot by means of the presser foot lever.

When the presser foot is raised, the two thread tension discs in the thread tension control panel are released so that thread runs clearly between them. Otherwise correct thread tension cannot be obtained.



- 3) Set the needle bar in its highest position by turning the handwheel toward you.

In this position, you can thread all parts, i.e. underlooper, overlooper, right and left needle, easily.

NOTE

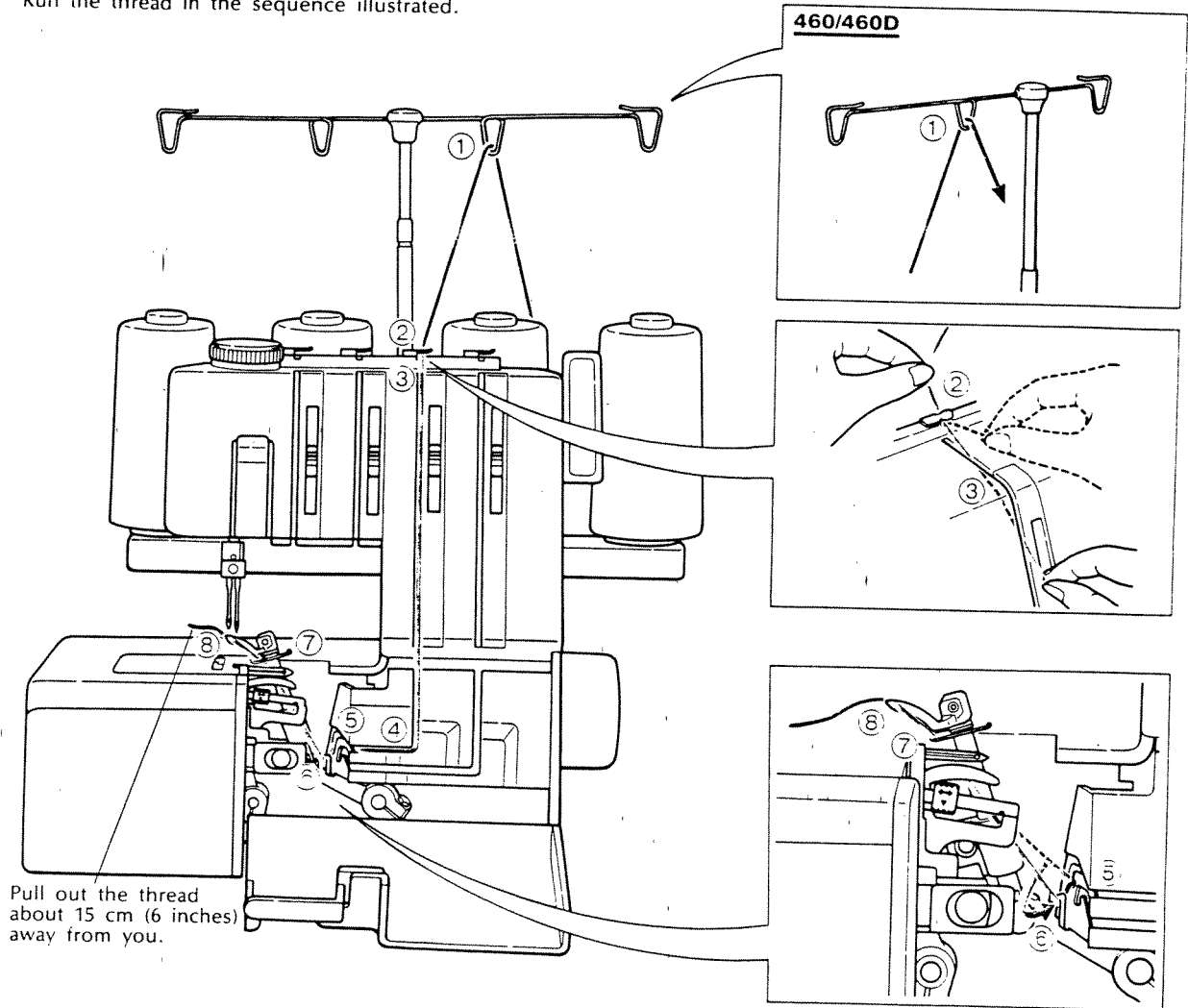
Threading order

Thread in the following order:

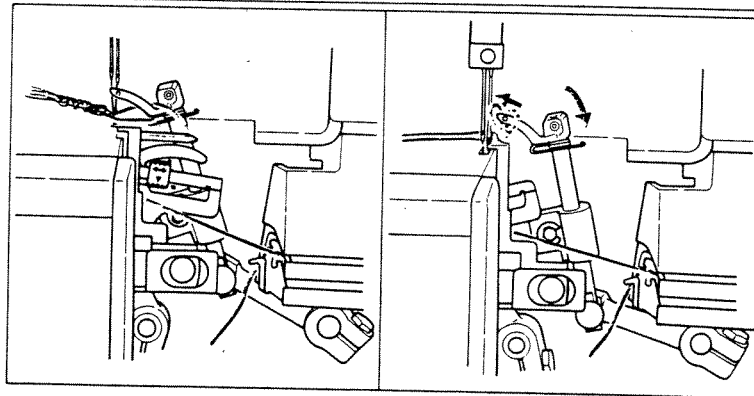
- 1) Overlooper thread (green)
↓
- 2) Underlooper thread (blue)
↓
- 3) Right needle thread (red)
(560/560D/560ED)
↓
- 4) Left needle thread (yellow)

Threading overlooper

Run the thread in the sequence illustrated.



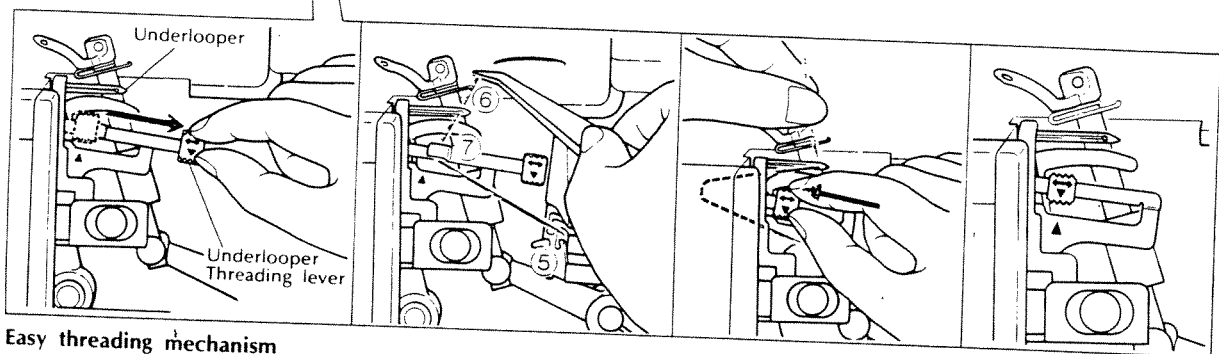
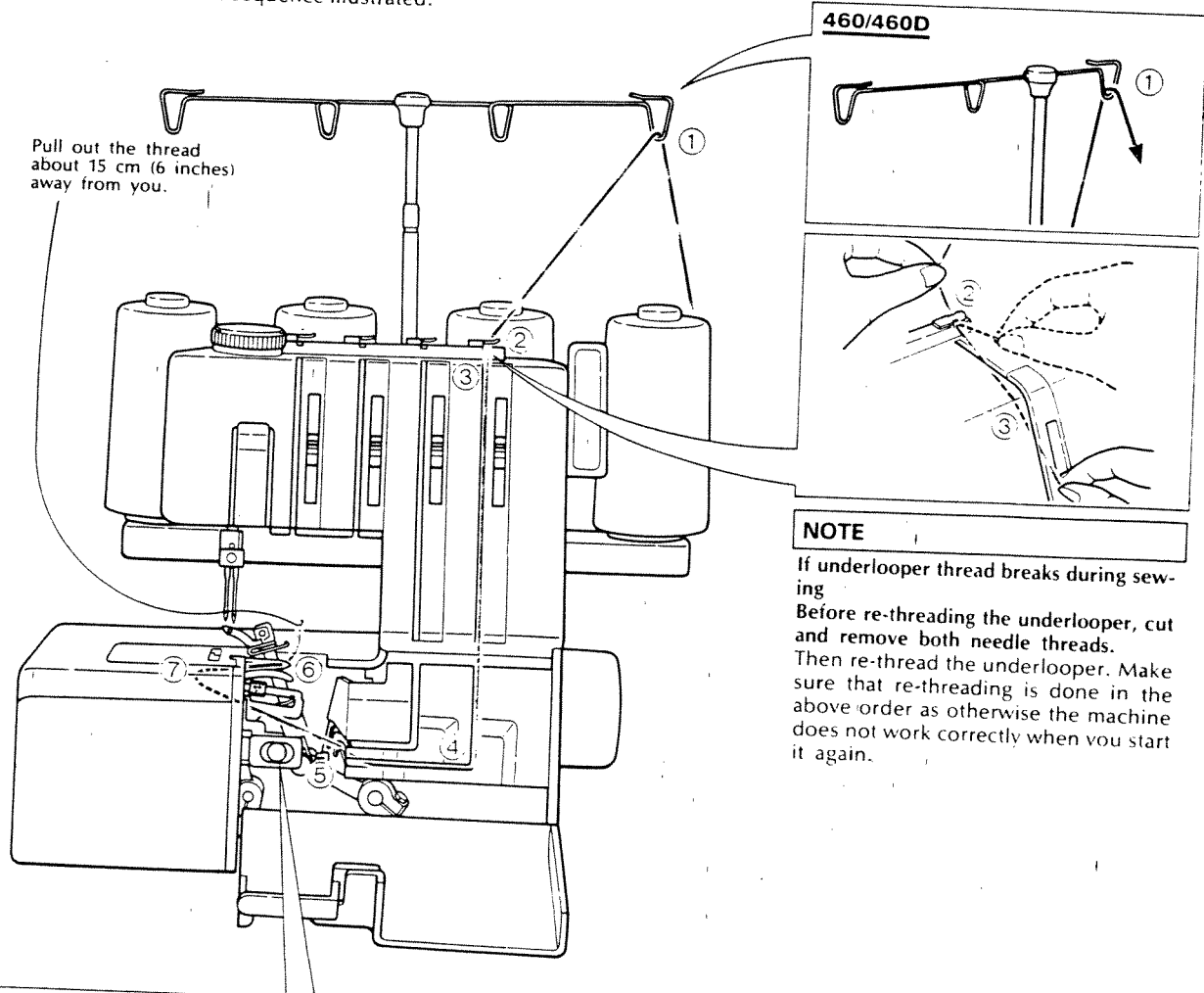
NOTE



If overlooper thread breaks during sewing Underlooper thread sometimes hangs on overlooper. In such a case, lower the overlooper by turning the handwheel and take the underlooper thread off from overlooper. Then re-thread the overlooper.

Threading underlooper

Run the thread in the sequence illustrated.



Easy threading mechanism

- Pull out the underlooper threading lever.
- Thread the underlooper and position the thread on hook of the underlooper threading lever.
- Push the underlooper threading lever back to its basic position while holding the end of the thread.

CAUTION!

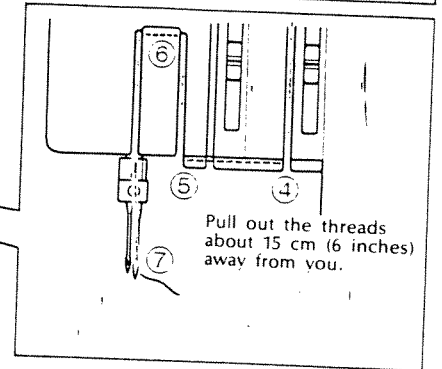
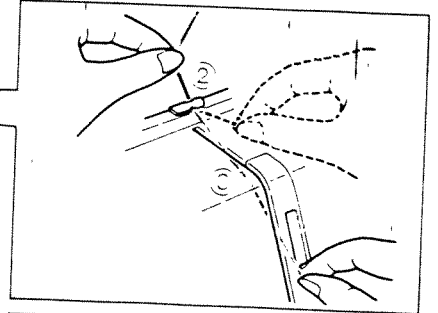
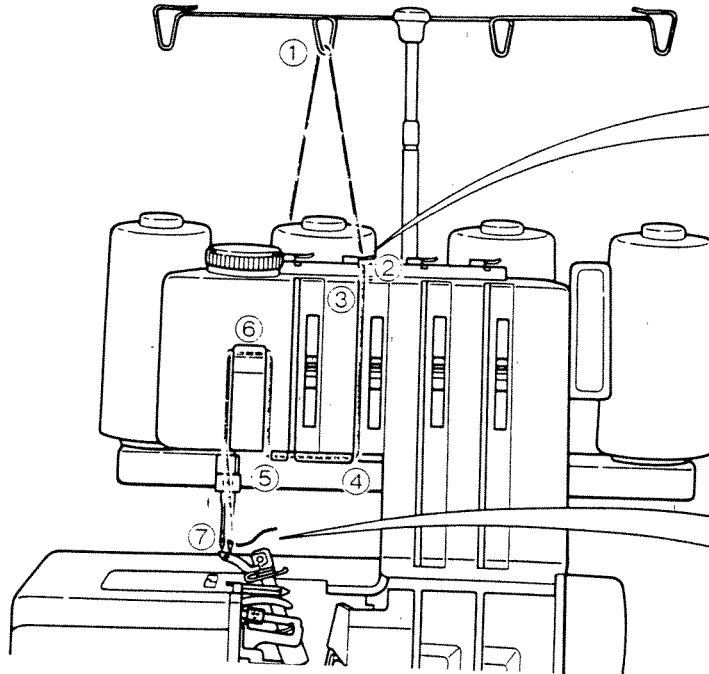
When pushing the underlooper threading lever, always make sure that the two red triangle marks meet each other as per illustration.

Threading needles

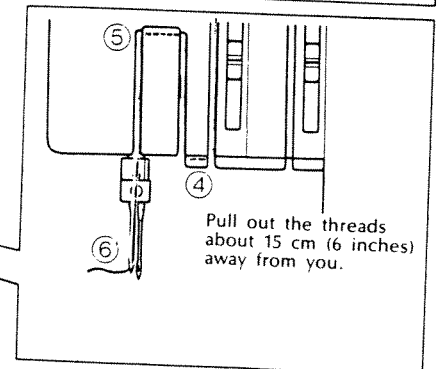
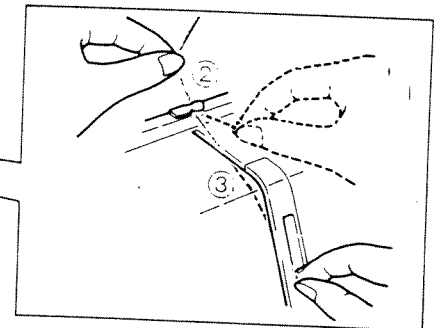
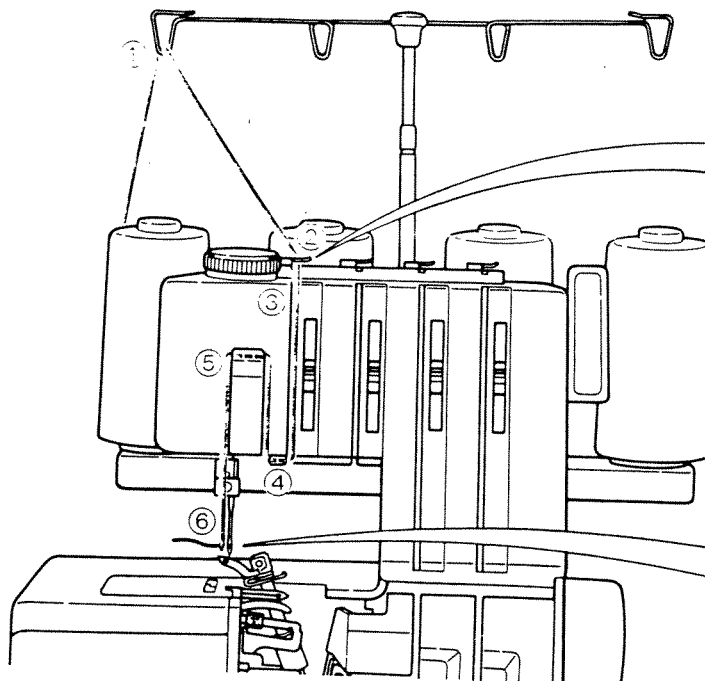
CAUTION!

* Thread the needles after threading of underlooper and overlooper.

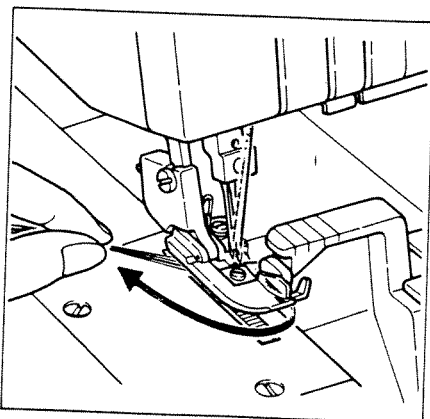
1) Right needle thread (560/560D/560ED)



2) Left needle thread (560/560D/560ED AND 460/460D)

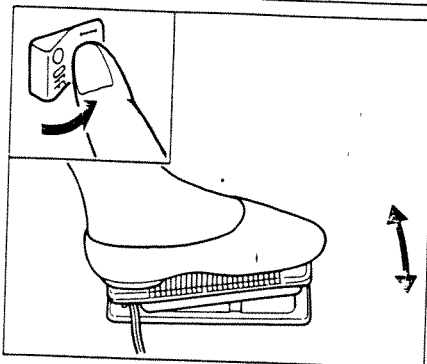


SEWING



To start sewing

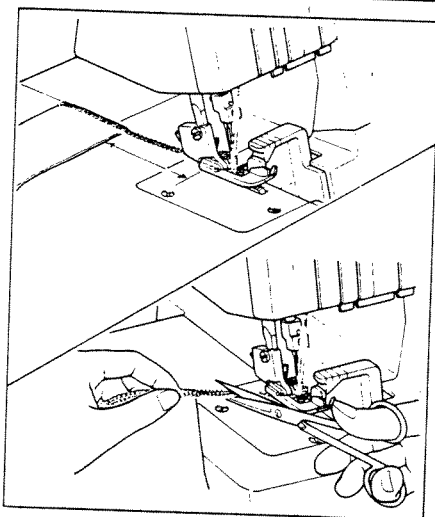
- * Thread the machine and pull the threads about 15 cm (6 inches) away from you behind the presser foot.
- * Place a spare piece of the fabric you intend to use under the presser foot and sew a few stitches by turning the handwheel towards you by hand.
- * Check the stitch formation produced to see if it is uniform. If not, re-check that the threading has been carried out correctly.



Operation

- * Turn on the main power switch and lamp switch.
- * When the pedal is lightly depressed the machine runs at low speed and as it is depressed further the machine will increase speed.
- * With the spare piece of fabric under the presser foot, lower the presser foot and test-sew at low speed.

On model 560ED the machine does not run if the presser foot is in its upper position even if you depress the foot controller. The monitor flashes with sound telling you that the presser foot should be lowered.

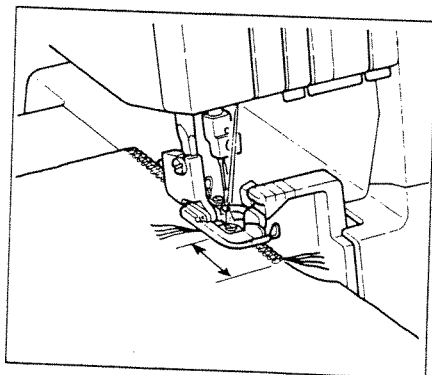


To remove the work

- * After you reach the end of the fabric continue sewing for about 5 cm to obtain chaining-off. Then trim off the stitches with a pair of scissors.

Chaining-off

- * After sewing, hold the foot control depressed slightly for a while (chaining-off). The threads will entwine themselves into a chain and be fed forward automatically. If feeding for chaining-off is not enough, pull the thread gently.



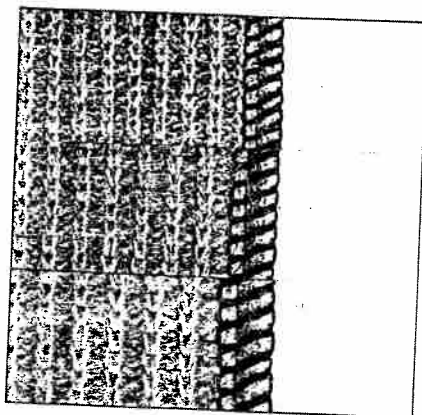
If threads break during sewing

- * Remove the fabric and re-thread correctly (refer to page 8-11, "Threading"). Put the fabric back under the presser foot and sew 3-5 cm over the previous stitches.

STITCH SELECTION

560/560D/560ED

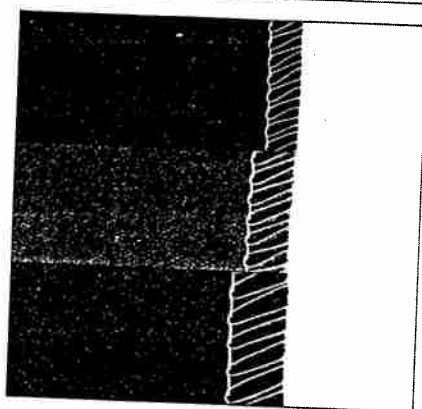
*These machines can form three kinds of stitches in simple steps as follows:



1. Four-thread overlock stitch (5, 6, 7 mm)

Use all four threads and two needles for producing four-thread overlock stitches, which will neatly fit all kinds of materials, especially knitted ones.

Use: Ideal for sewing knitted garments

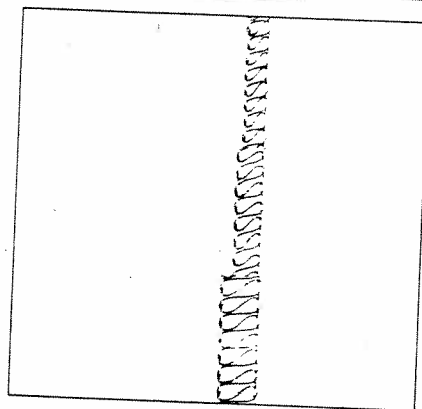


2. Three-thread overlock stitch (5, 6, 7 mm)

Use three threads and left needle, producing 5, 6, or 7 mm seams, which will fit all kinds of materials.

Remove right needle when sewing this overlock stitch.

Use: For overlock stitching and sewing suits, blouses, slacks, etc.

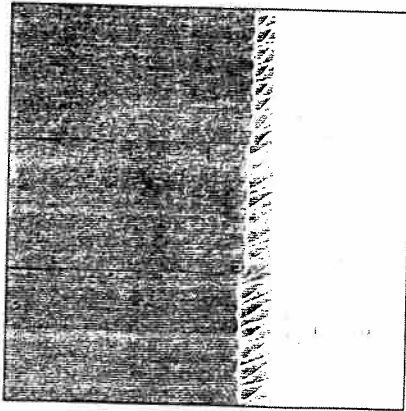


3. Three-thread overlock stitch (2.8, 3.8, 4.8 mm)

Use three threads and right needle, producing 2.8, 3.8 and 4.8 mm seams.

Remove left needle when sewing this overlock stitch.

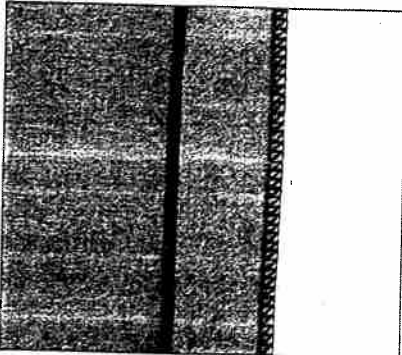
460/460D



Three-thread overlock stitch (3-5 mm)
Use three threads and one needle, producing 3-5 mm seams, which will fit all kinds of materials.
Use: For overlock stitching and sewing suits, blouses, slacks, etc.

NOTE

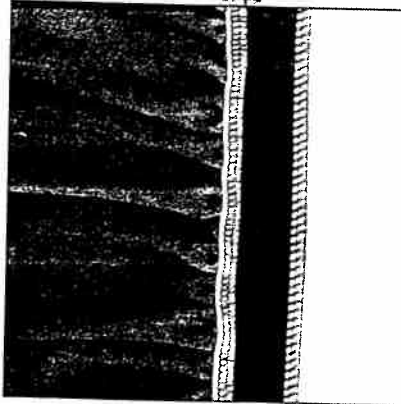
Optional stitches



Narrow/Rolled hemming stitches



Blind stitch



Overlock stitch with elastic tape

RATIO CHART OF SEWING MATERIAL THREAD AND NEEDLE

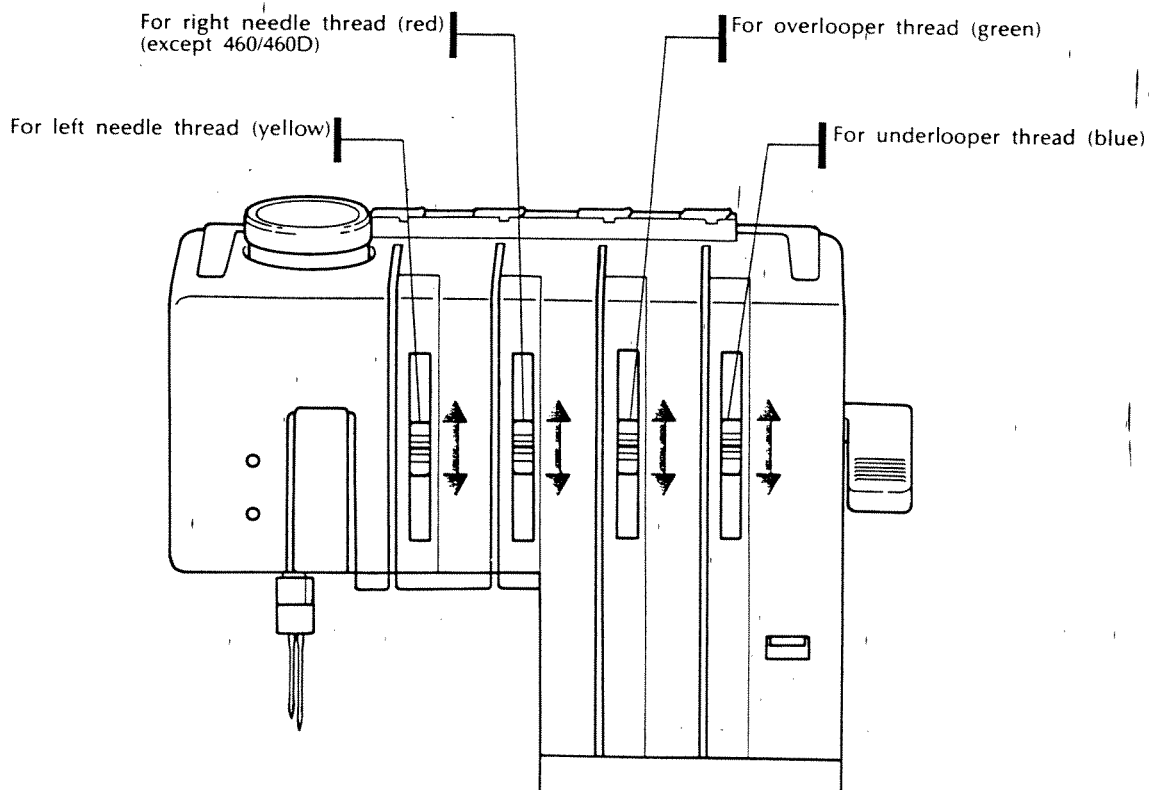
Materials		Stitch	Thread	Stitch length (mm)	Needle
Light material	Georgette Crepe de chine Lawn Organdie Tricot	Overlock	NEEDLE THREAD Overlock thread 120-150 LOOPER THREAD Overlock thread 120-150 Textured thread	2.0-3.0	SCHMETZ 130/705 H 70
		(Optional) Narrow/ Rolled hem	NEEDLE THREAD Overlock thread 120-150 LOOPER THREAD Overlock thread 120-150 Textured thread	Less than 2.0	SCHMETZ 130/705 H 70
Medium material	Poplin Gingham (Broad) Sucker Gabardine Serge Knitted	Overlock	NEEDLE THREAD Overlock thread 120-150 LOOPER THREAD Overlock thread 120-150 Textured thread	2.5-3.5	SCHMETZ 130/705 H 80 Ball point needle in accessories
Heavy material	Cashmere Tweed Denim Jersey	Overlock	NEEDLE THREAD Sewing thread 80-100 Overlock thread 120-150 LOOPER THREAD Overlock thread 120-150	3.0-4.0	SCHMETZ 130/705 H 90

CAUTION!

When you carry the machine with threads threaded, please push the spool down at the lowest position and wind threads on each spool.

THREAD TENSION

Thread tension control levers



Tension control

Sewing is possible at position "5" under almost any circumstances. If you find it impossible, adjust according to the drawing.

* The thread tension of this machine can be adjusted by the thread tension adjustment levers for the two (one) needle thread(s), the overlooper thread and the underlooper thread. The correct thread tension varies with the kind of fabric, the thickness of the thread etc. Adjust the thread tension as required in each particular case. Move slide lever upwards to increase tension and downwards to decrease it.

Whenever you change fabric, thread or stitch width, be sure to adjust the thread tension. See Page 17-20 "Chart of Thread Tension Adjustment".

NOTE

Order of thread tension adjustment.

When you adjust the thread tension, do it in the following order;

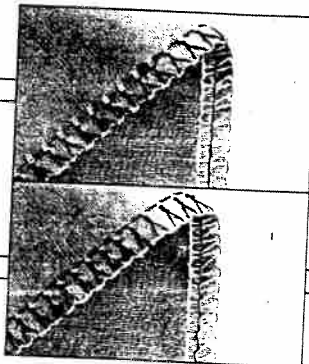
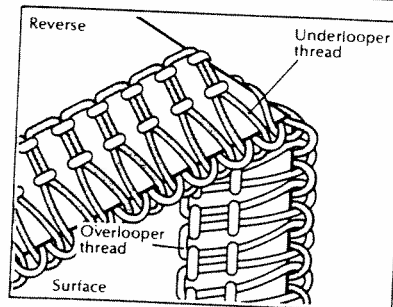
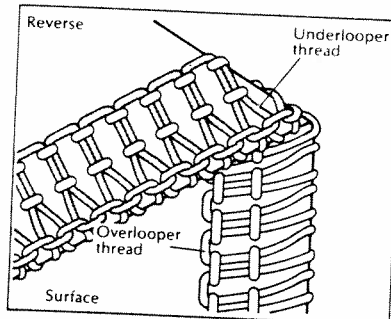
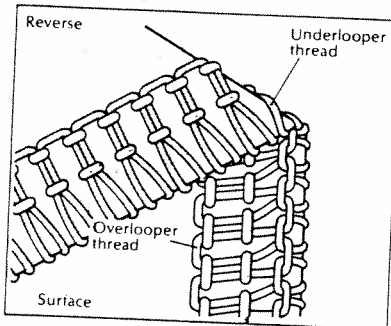
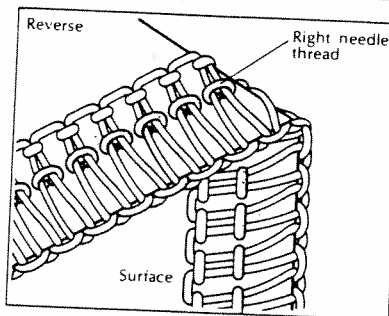
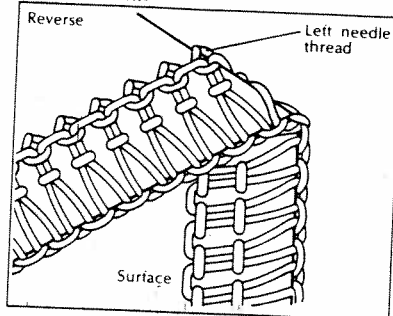
- 1) Left needle thread
- 2) Right needle thread (except 430/430D)
- 3) Overlooper thread
- 4) Underlooper thread

This is the easiest way to obtain correct thread tension.

CHART OF THREAD TENSION ADJUSTMENT

560/560D/560ED

In this case...



Left needle thread is slack.

Right needle thread is slack.

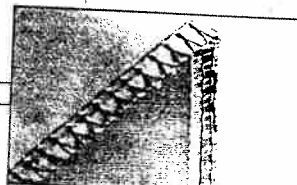


Fabric puckers



Left needle thread is tight.

Right needle thread is tight.



Overlooper thread is tight.



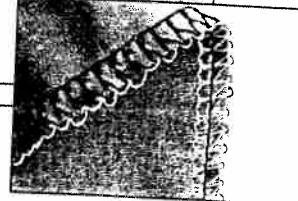
Underlooper thread is slack.



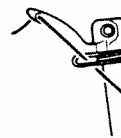
Overlooper thread is slack.

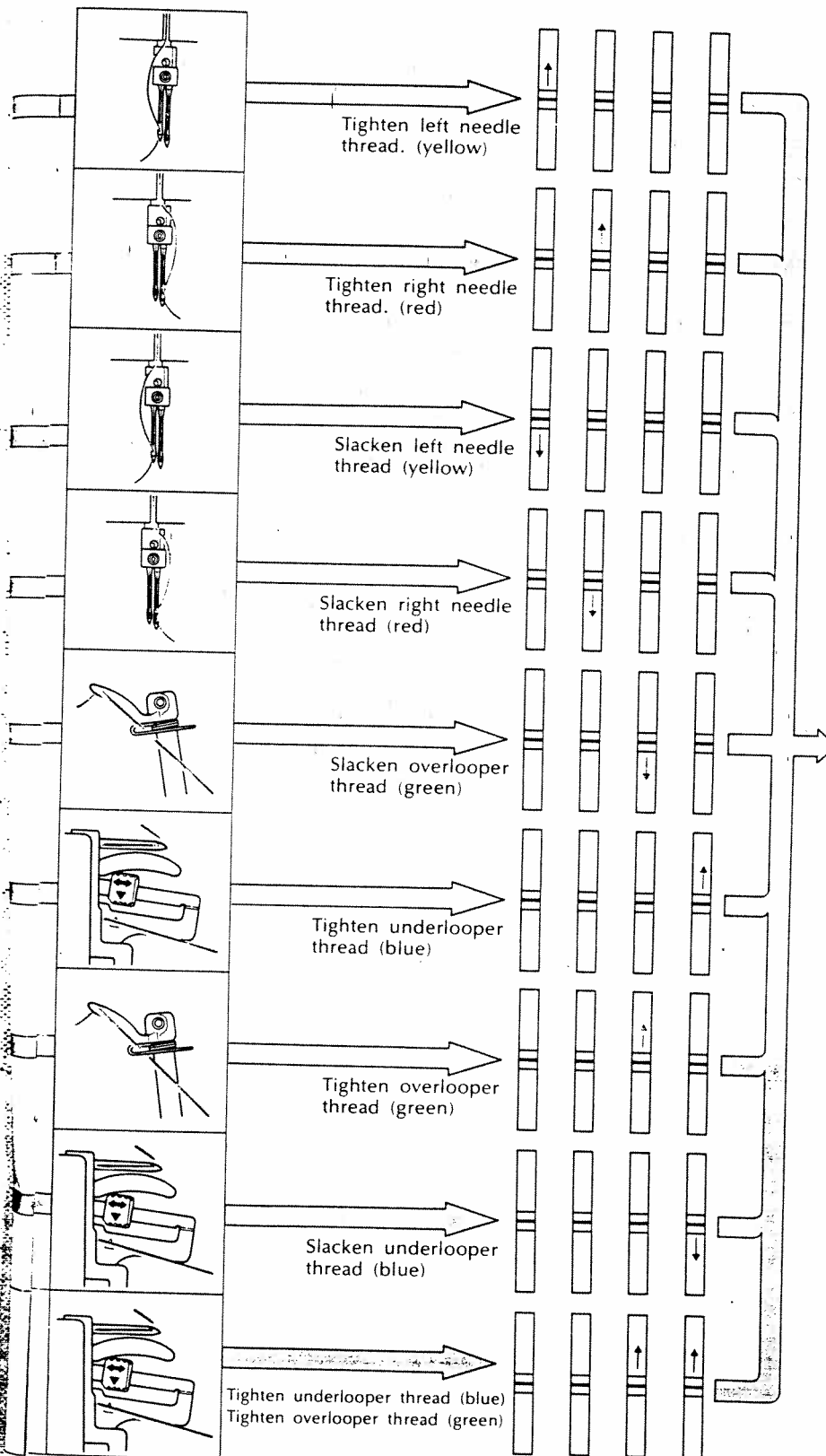


Underlooper thread is tight.



Overlooper thread is slack.
Underlooper thread is slack.





Correct thread tension

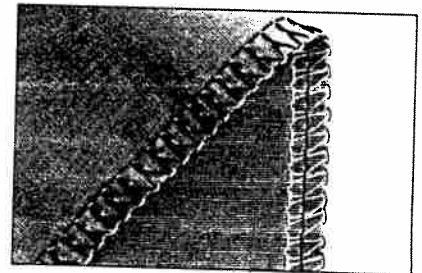
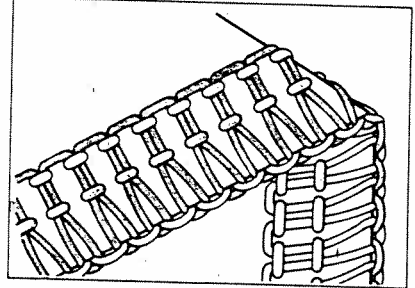
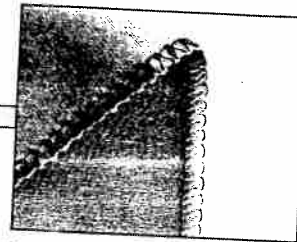
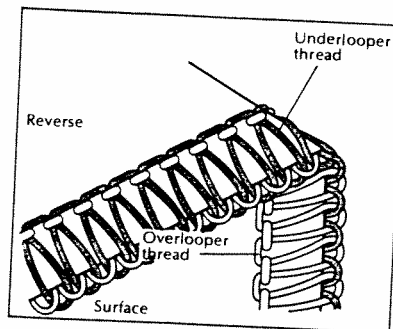
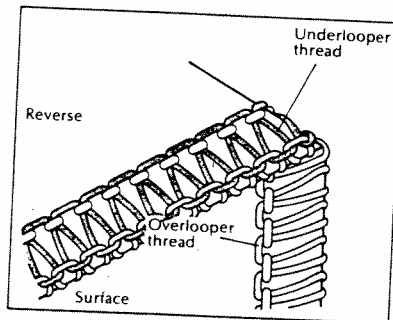
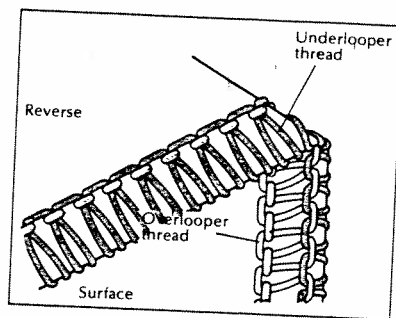
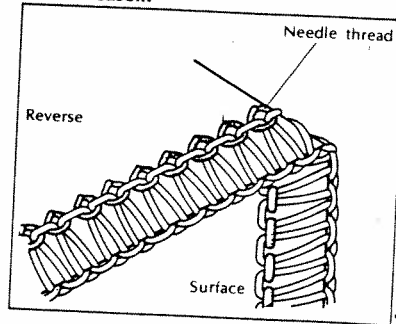


CHART OF THREAD TENSION ADJUSTMENT

460/460D

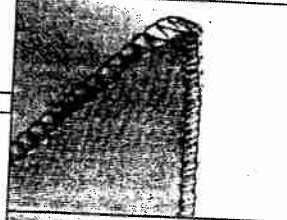
In this case...



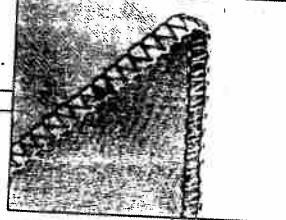
Needle thread is slack.



Fabric puckers



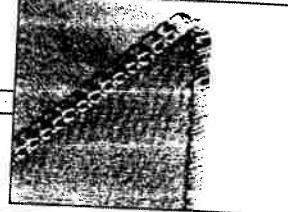
Overlooper thread is tight.



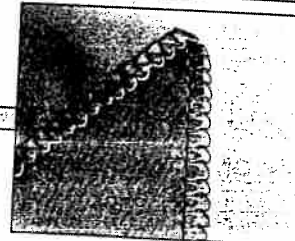
Underlooper thread is slack.



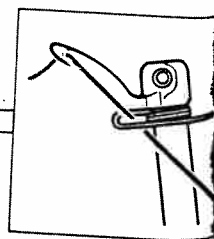
Overlooper thread is slack.

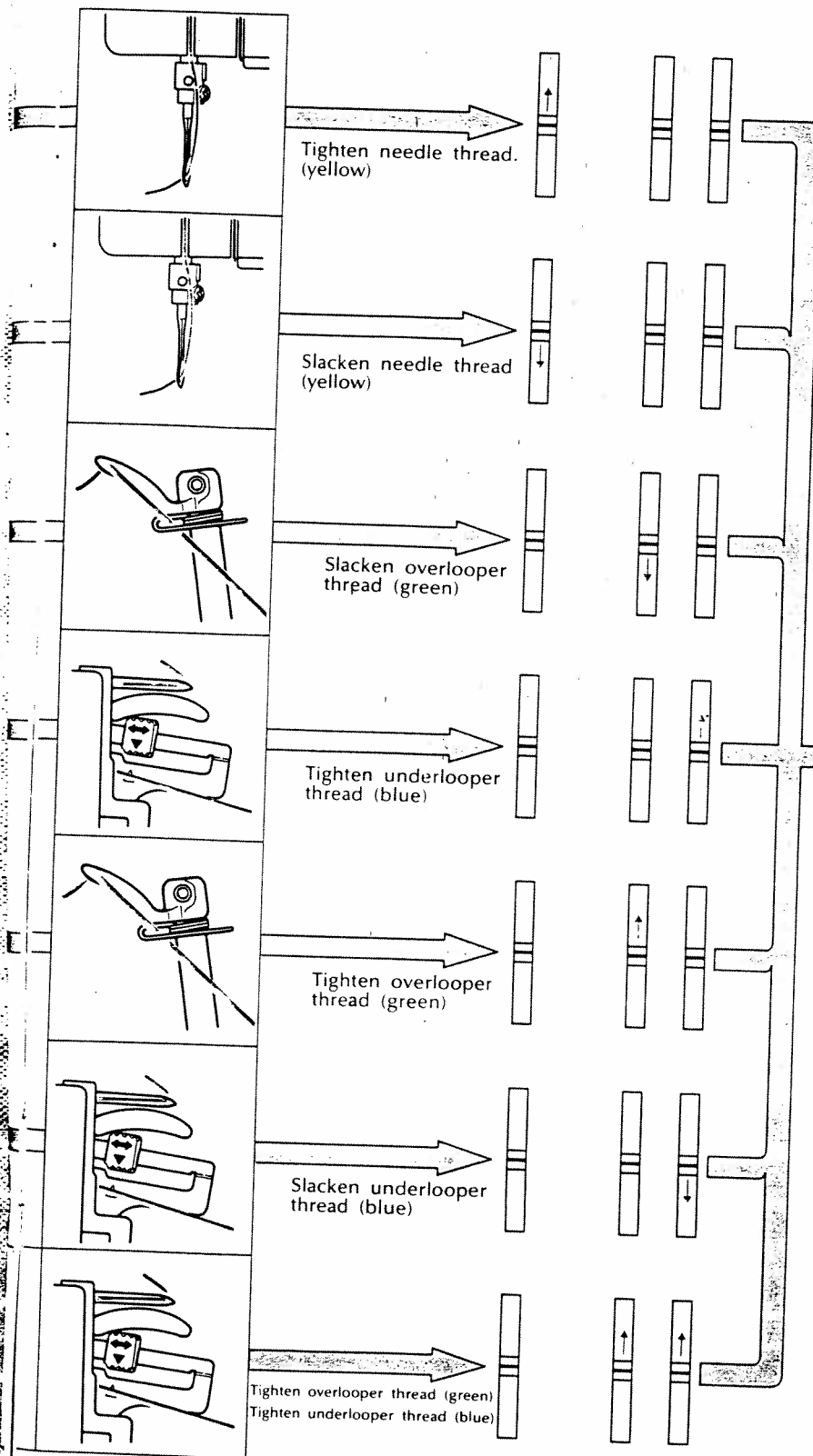


Underlooper thread is tight.

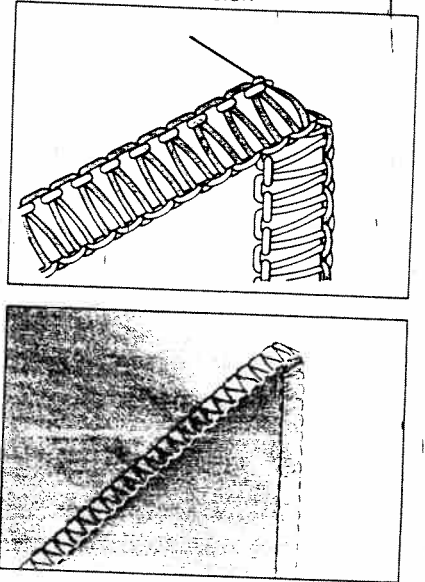


Overlooper thread is slack.
Underlooper thread is slack.



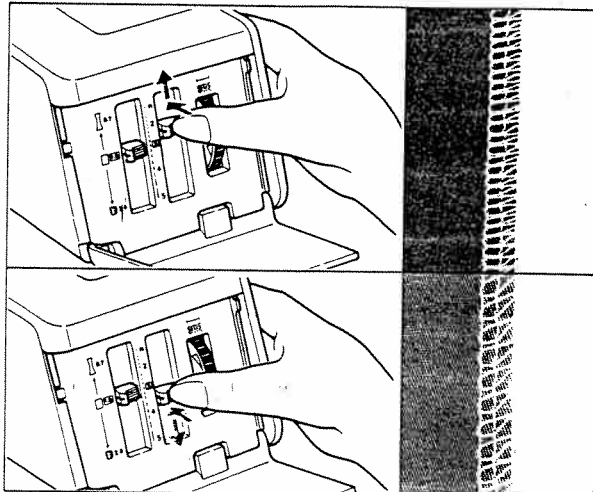


Correct thread tension



STITCH LENGTH AND STITCH WIDTH

Stitch Length



Stitch Length

Open the control cover, then set the stitch length control lever in the proper position.

Minimum 1 mm (position R)

Maximum 5 mm (position 5)

* 1–2 mm for narrow/rolled hem (optional)

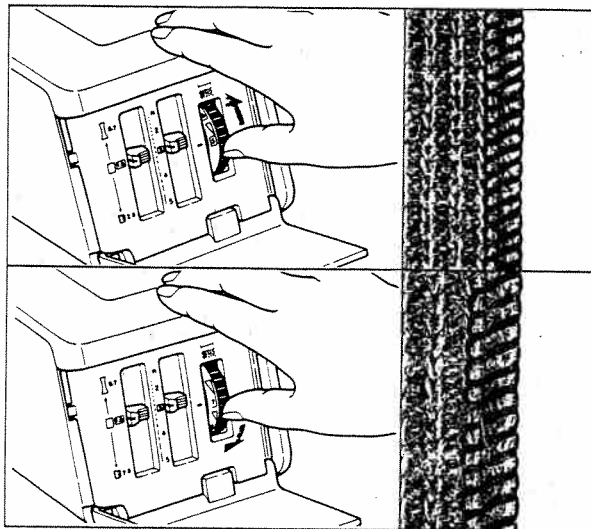
Stitch Width

The stitch width can be adjusted through turning the stitch width control dial inside the control cover.

CAUTION!

When adjusting the stitch width control dial, always raise the presser foot lever.

Stitch Width

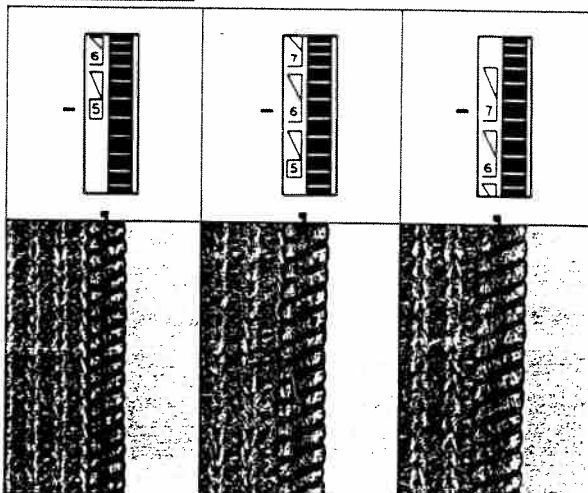


REMARK



Position "R" is used for narrow/rolled hemming stitch. In this case, optional special presser foot/attachment is necessary.

560/560D/560ED



560/560D/560ED

Dial No.	R	5	6	7
4 thread-stitch	-	5 mm	6 mm	7 mm
3 thread-stitch by left needle	Narrow/Rolled hemming	5 mm	6 mm	7 mm
3 thread-stitch by right needle	-	2.8 mm	3.8 mm	4.8 mm

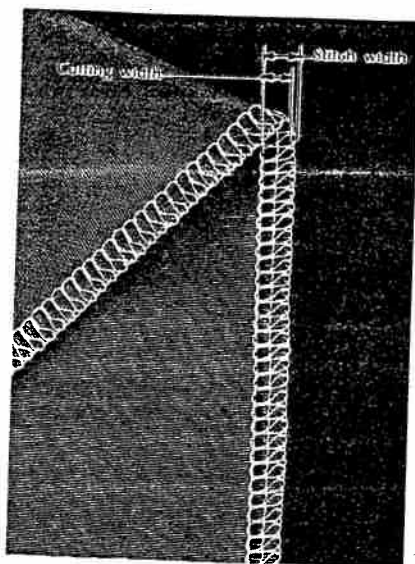
Narrow/Rolled hemming with optional foot

460/460D

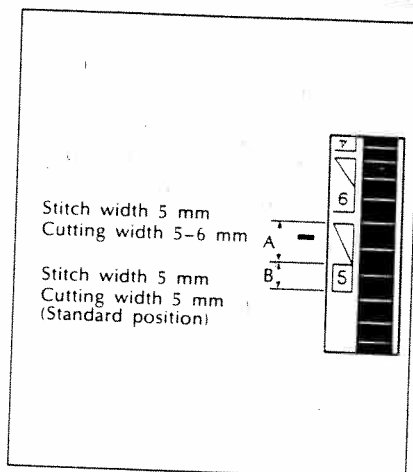
Min. 3 mm–Max 5 mm

Narrow/Rolled hemming with optional foot and needle plate

STITCH WIDTH AND CUTTING WIDTH FINE ADJUSTMENT MECHANISM

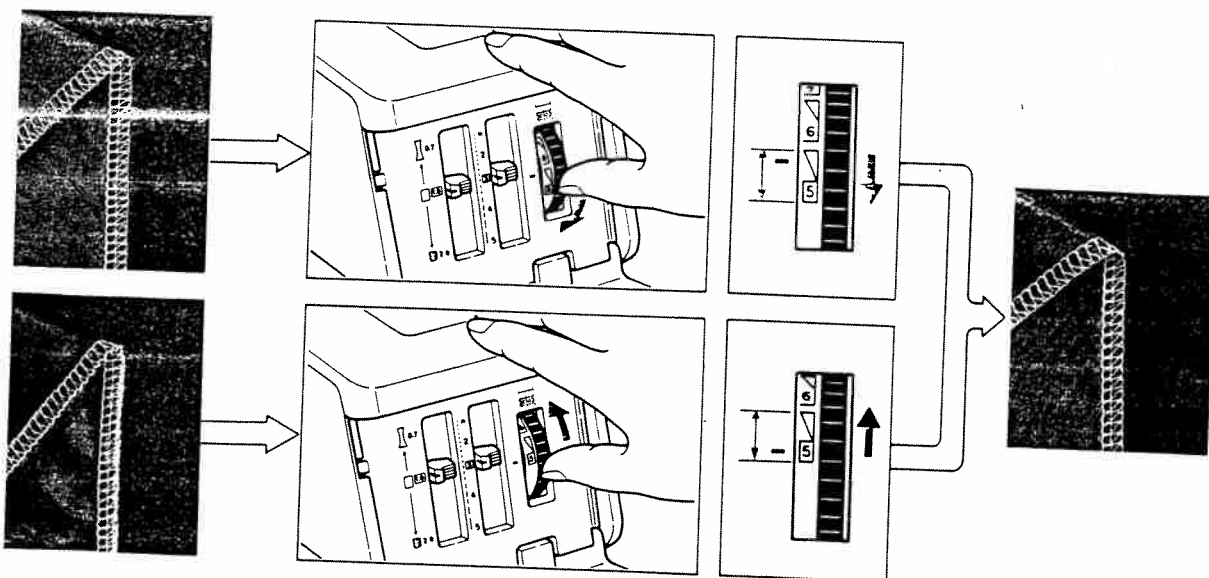


When you sew elastic materials like e.g. knitted garments, you sometimes will find that the garments are not properly overcast because of contraction of the material after cutting. When this occurs you can eliminate the problem by fine adjustment of the stitch width and increasing the cutting width. This unique Homelock feature will ensure a satisfactory sewing result also on knitted materials.



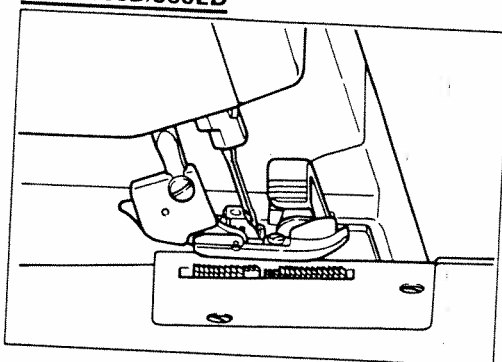
How to adjust?

When you turn the stitch width control dial, the stitch width can be set at 5, 6 or 7 mm while the cutting width is increased gradually from 5 to 7 mm. If you want to sew 5 mm stitch width but 5,5 mm cutting width when sewing elastic materials, you only set the stitch width control dial within "A" area as illustrated. This will result in correct overcasting in elastic materials.



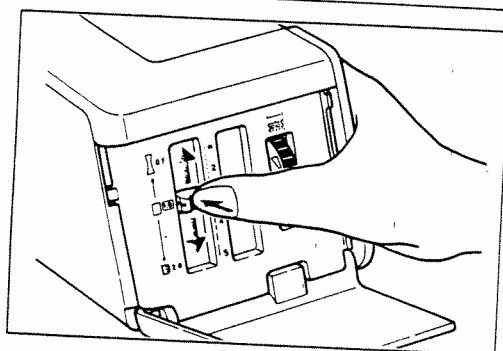
DIFFERENTIAL FEED MECHANISM

460D/560D/560ED



What is "differential feed ratio"?

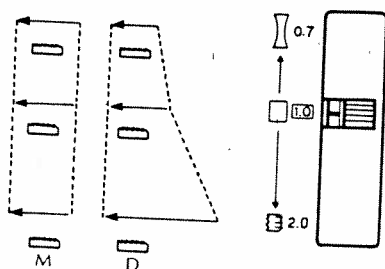
The machine is equipped with two feeders, of which the front one (the differential feeder) can be adjusted to feed more or less in relation to the rear one (the main feeder). It is adjustable between 0.7–2.0. The exact adjustment is dependent on the thickness and elasticity of the material. The stitch length also affects the adjustment. The longer the stitch the more material is being fed forwards.



How to adjust the differential feed ratio

- 1) Open the control cover.
- 2) Adjust the feed ratio as required by means of the differential ratio control lever.
- 3) Close the control cover.

Adjustment example

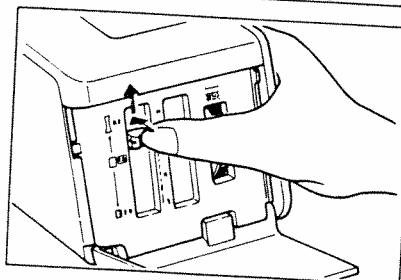
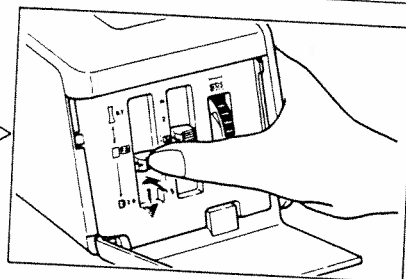
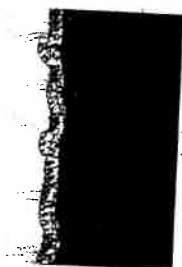


REMARK

M Main feeder
D Differential feeder
← Direction of feeding

Stretch material
Adjustment to 0.7 result in a stretched edge
Adjustment to 2.0 prevents the edge from stretching

Non-stretch material
Adjustment to 0.7 results in a straight edge
Adjustment to 2.0 results in puckering

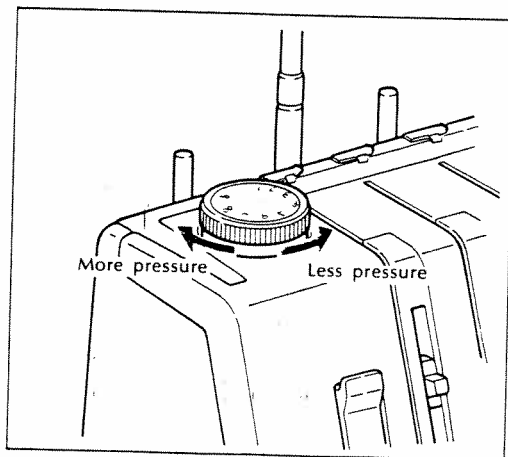


Correct Stitch

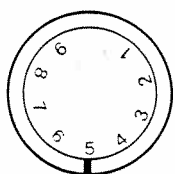


Variation

PRESSER FOOT PRESSURE



* The pressure of the presser foot can be adjusted by turning the pressure adjustment dial. Since the machine has already been adjusted to a pressure suitable for light and medium fabrics, no further adjustment is necessary except when sewing very heavy or very light and elastic material.



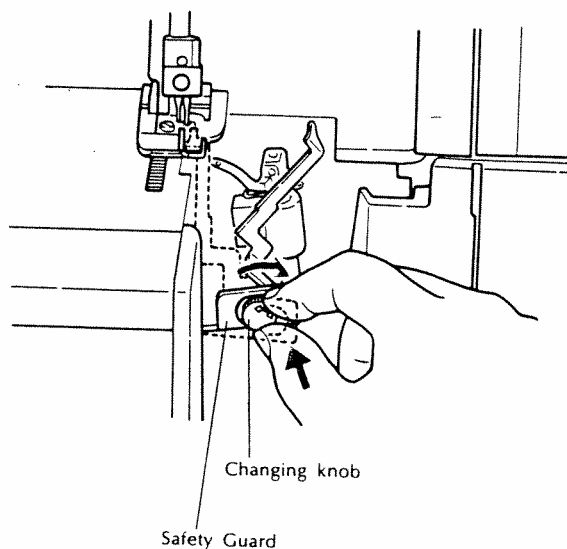
Standard position

Light material,
Elastic material → Decrease
Heavy material → Increase

STITCH TONGUE

NOTE

560/560D/560ED



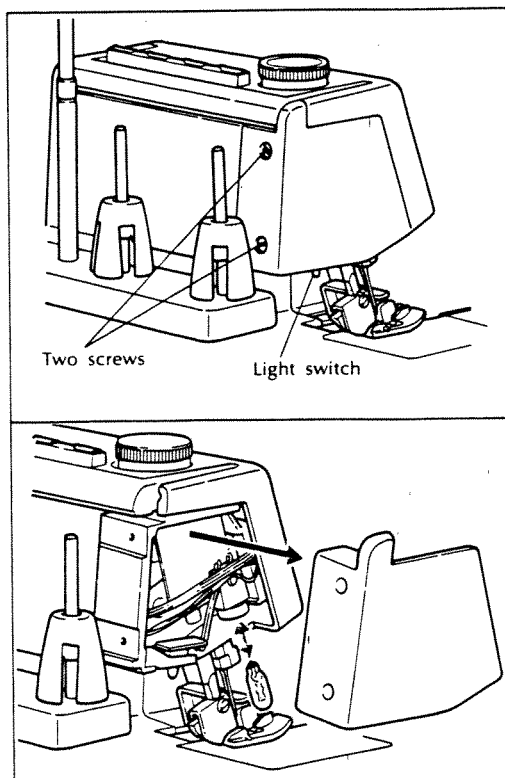
DON'T TOUCH THE STITCH TONGUE CHANGING KNOB. (560, 560D, 560ED)

You can retract the stitch tongue using the changing knob.

However this mechanism is used only for the narrow/rolled hemming stitch (optional). Therefore don't touch the changing knob during normal operation.

* In case the overlooper is not in its lowest position, you cannot push the safety guard.

CHANGING THE LIGHT BULB



CHANGING THE LIGHT BULB

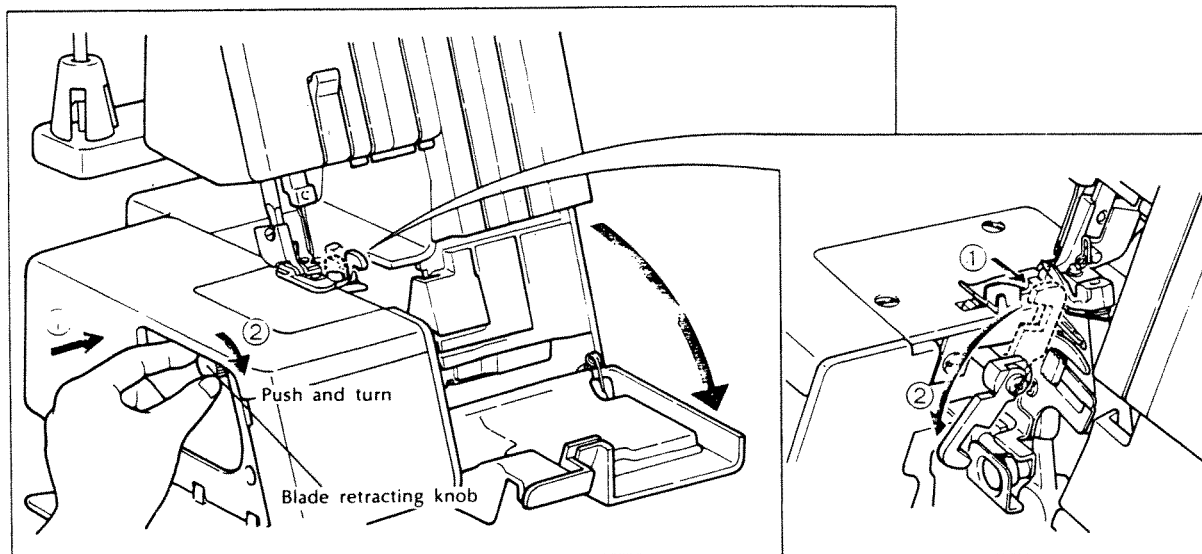
Remove the cover as illustrated. Pull out the light bulb, insert the new bulb and replace the cover.

Use correct light bulb.

Maximum Rated input of bulb: 8V, 2.4W

Recording #: X50228001

RETRACTING THE BLADE



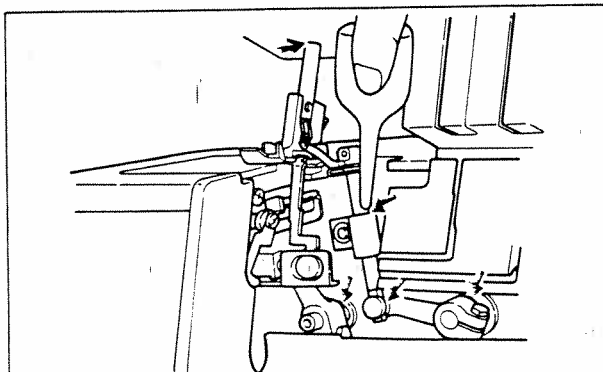
In case you wish to sew without cutting, set the needle above the needle plate and retract the blade by means of retracting knob.

CAUTION!

Make sure that the seam allowance on material is not wider than the stitch width you have chosen on the machine. The reason is that if the seam allowance is wider the overlooper and needle can be damaged.

* Close door before operating machine.

MAINTENANCE

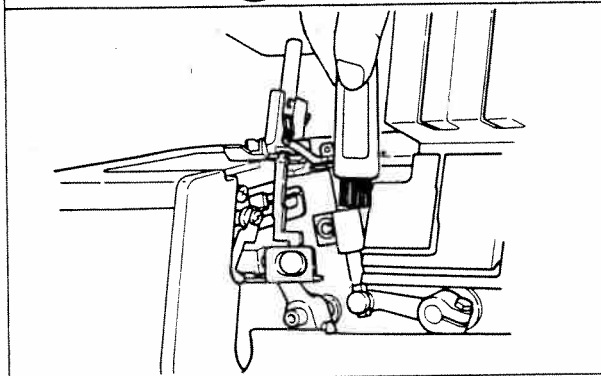
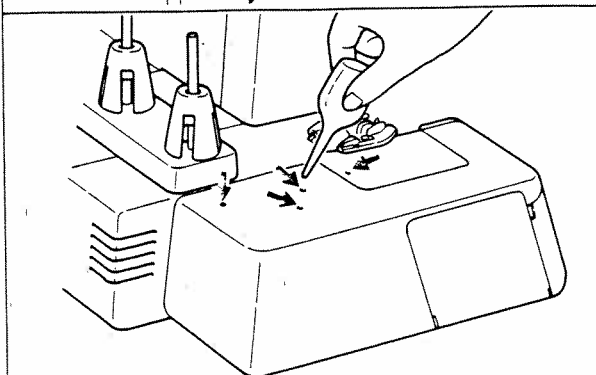


Oiling

For smooth and silent operation the moving parts of the machine should be oiled periodically. (See illustration.)

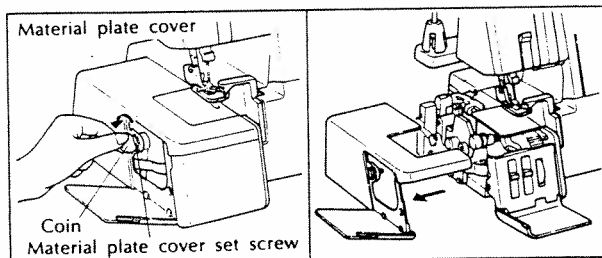
REMARKS:

1. OIL ONCE OR TWICE A MONTH IF THE MACHINE IS USED NORMALLY. IF THE MACHINE IS USED MORE OFTEN, OIL ONCE A WEEK. ALWAYS USE HIGH QUALITY SEWING MACHINE OIL.
2. After oiling, run the machine without thread. Wipe off excess oil with a scrap piece of cloth to avoid oil stains.



Cleaning

Open front cover (see page 1, ⑪) and clean up mechanical parts inside the cover by brush periodically.



REMARKS

Cloth plate cover can be taken off by loosening one screw per illustration, but it is necessary for service at dealers.

PERFORMANCE PROBLEMS FAULT-FINDING

Problem	Probable cause	Possible correction
1. Does not feed.	Presser foot pressure too weak.	Turn pressure adjustment dial clockwise to increase presser foot pressure. (See page 25)
2. Needle breaks.	(1) Needle bent, or needle tip blunt.	Insert new needle. (See page 5)
	(2) Needles incorrectly set.	Re-set needle. (See page 5)
	(3) Fabric has been pulled.	Do not press or pull fabric—guide it gently.
3. Thread breaks.	(1) Improper threading	Re-thread machine (See page 8~11)
	(2) Thread tangled.	Check spool pin, thread holders, etc. and remove tangled thread.
	(3) Thread tension too tight.	See page 16~20 "Thread tension"
	(4) Needle incorrectly set.	Re-set needle. (See page 5)
	(5) Wrong needle used.	Use sewing machine needles—SCHMETZ 130/705H
4. Skipped stitches	(1) Needle bent, or needle tip blunt.	Insert new needle. (See page 5)
	(2) Needle incorrectly set.	Re-set needle. (See page 5)
	(3) Wrong needle used.	Use sewing machine needles—SCHMETZ 130/705H
	(4) Improper threading	Re-thread machine. (See page 8~11)
	(5) Presser foot pressure too weak.	Turn pressure adjustment dial clockwise to increase presser foot pressure. (See page 25)
5. Stitches not uniform.	Thread tension not adjusted properly.	See page 16~20 "Thread tension".
6. Fabric puckers.	(1) Thread tension too tight.	Decrease thread tension when sewing light-weight or fine fabric. (See page 16~20)
	(2) Improper threading or thread tangled.	Re-thread machine. (See page 8~11)
Machine does not work. (Monitor flashes, 560ED)	(1) Presser foot is in upper position (560ED).	Lower the presser foot (560ED). (See page 3)
	(2) Machine is locked by thread tangle.	Remove tangled thread. Check and re-thread machine. (See page 8~11)