## **PROLOGUE**

Thanking you for your purchase our products sincerely, please reading the manual book before operation, the book introduce some points how to operate, maintenance, and safe. Please keep it carefully for reading in the further; you will be not informed if the file has been revised. Please set sample as standard.

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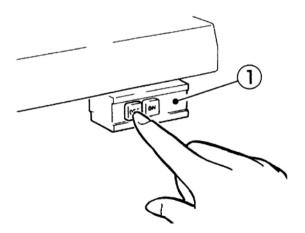
#### **OBSERVE THESE SAFETY PRECAUTIONS**

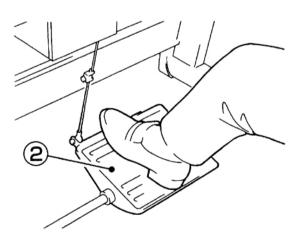
Though Our takes the utmost care to produce safe sewing machines and devices, operstors should follow these basic safety rules.

- To prevent accidents, do not remove safety devices or parts while operating the machine.
- Do not leave tools or other unnecessary objects on the machine table while operating the machine.
- Before maintenance, adjusting, cleaning, threading or replacing the needle, and to prevent accidents, be sure the power is turned off. Check that the machine will not operate when the pedal is pressed.

#### Note

In case a clutch type motor is used, it will keep on rotating by inertia after turning off power supply. ① If the machine pedal ② is stepped on inadvertently, it is dangerous because the machine will move unexpectedly.keep on stepping on the pedal ② until the machine comes to a stop after turning off power supply.

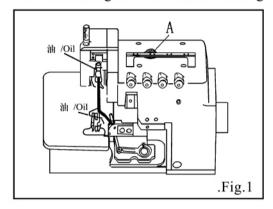


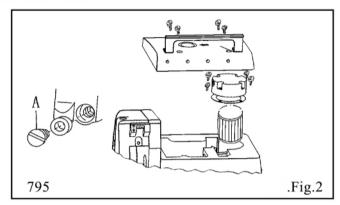


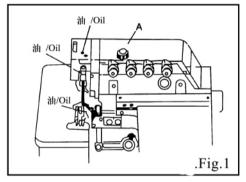
- Turn the power off before leaving the machine table.
- In the event of a power failure, be sure to turn the machine off.
- Check that the machine is securely groundee.

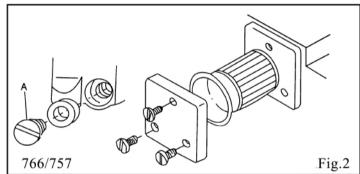
### TO THE OPERATERS

ATTENTION:Because this is an super high speed machine. DO not run it before filling. Oil and/making sure the correct turning direction of motor.









### How to install the machine

- (1) Install the machine according to the table cut-out diagram, Cushion Rubber and Rest Board as enclosed. In case of semi-submerged, the distance between Needle plate top surface and Table Top is about 100mm, and for fully-submerged is about 5mm.
- (2) Setting the pedal of clutch motor to the left side and the pedal of presser foot lift at right ride.
- (3) Install the cloth waste chute, thread stand as parts list.
- (4) Be sure the motor turning direction is clockwise. And the belt can be pressed inware about 10mm.

NOTE: The dimensions of motor pulley and sewing speed are show in Table 1.

Tab.1

| Machine speed | Motor pulley diameter (mm) |      |  |  |
|---------------|----------------------------|------|--|--|
| (S.P.M)       | 60Hz                       | 50Hz |  |  |
| 5500          | 90                         | 110  |  |  |
| 6000          | 95                         | 115  |  |  |

## HOW TO OPERATE THE NEW MACHINE

Please run the new machine in the first four at 20% less speed than maximum. Then replace the new oil and thereafter the machine may be operated up to maximum speed.

### LUBRICATION AND DRAINAGE

#### (1) Lubrication Fig.1

·Remove Screw A and fill in enclosed ultra high speed lubricate oil (or simlar to Mobil# 10,Esso#32) until the oil surface between two lines of oil Level Sight Window, Then replace Screw A.

·When the machine is operated for the first time it was idle for a long time ,please be sure to oil the top of the needle holder , guide , upper looper guide etc. before operating the machine.

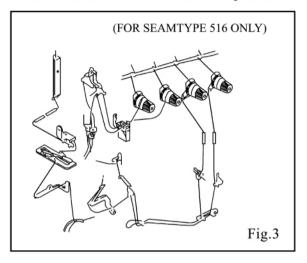
### (2) Drainage Fig.2

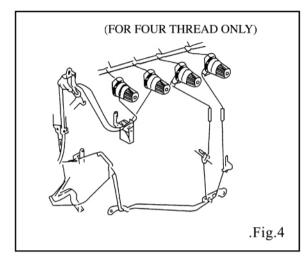
- ·Remove Screw A and drain out the oil then replace Screw A.
- ·For keeping the good lubrication and machine life. please replace the new oil when the new machine has been operating over four weeks, And after that, change oil every four months.
- ·This machine has been fixed with oil filler .please clean it every month or replace a new one if necessary .

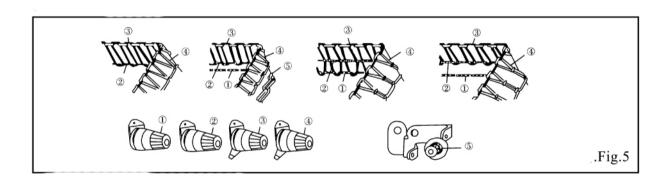
#### (3) Needle Cooling Lubrication-Silicon oil.

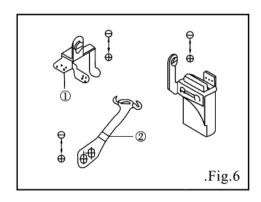
## THREADING THE MACHINE FIG3.4

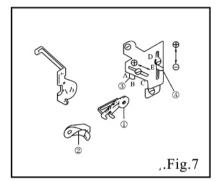
Refer to the sewing type you need for correct threading. Any incorrect threading may cause thread break, uneven stitches or skip stitches etc.

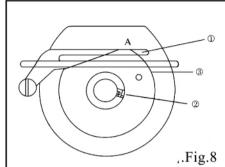












### THREAD TENSION

The thread tension be adjusted according to sewing fabric, thickness, sewing thread, seam width stitch length etc. Therefore the pressure of the Tension Nuts or Thread Guides must be adjusted in each individual case.

#### (1) Tension Nut Adjustment.Fig.5

- •The tension Nut ① controls the double chain needle thread or left side overlock needle thread.
- •The Tension Nut ③ controls the double chain looper thread.
- •The Tension Nut 2 controls the overlock needle thread.
- •The Tension Nut 3 controls the upper looper thread.
- •The Tension Nut 4 controls the lower looper thread.

#### (2) Needle thread control.Fig.6

In case of sewing type 504, 512, &514, push thread guide ① and ② to lowest point. and up to highest point of sewing type 503,505.

Note: the  $\oplus$  direction is for more needle thread tension, otherwise it is for less needle thread tension.

#### (3) Looper thread control.Fig.7

·For sewing type 512, when upper looper is extremely left, push take-up ① and ② at the position as the chain line.

In case of sewing type 503 and 505, when upper looper moves to lowest, set take-up ① and ② at the position as the continuous line.

- ·Adjust thread guide 3 as follows:
- a) Point A for stretchy thread is used.
- b) Point B for seaming and blind stitch hemming.
- c) Point C for seaming type 512.
- ·Adjust thread guide @ as follow,

- d) Point D for stretchy thread is used.
- e) Point E for seaming and blind stitch hemming.

Note: The direction is for more thread in sewing seam, and the direction is for less thread in sewing seam.

#### (4) Chain looper thread cam control.Fig.7

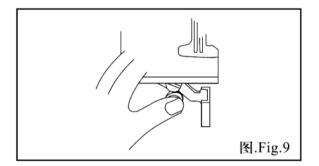
When the needle moves to its highest position, the right corner of the thread cam ③ matchs with the upper surface of thread guide bracket ①.

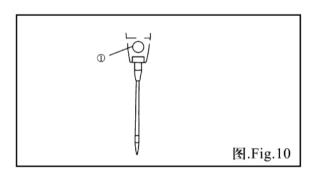
Screw 2 and adjust the thread cam 3 as clockwise is late for timing of looper thread cam.

### STITCH LENGTH ADJUSTMENT FIG.9TAB2

The stitch length adjustment is made according to the sewing fabric, differential feed ratio etc.

- · Keep pushing the Push Botton enter deep inside .
- Keep pressing the Push Botton and match the desired stitch length which is show on the pulley with the indicating point of Belt Cover.





Tab.2

|                 |              |     |     | 1-  | Pulley | scale |     |     |
|-----------------|--------------|-----|-----|-----|--------|-------|-----|-----|
| Maxi diff ratio | Machine type | 1   | 2   | 3   | 4      | 5     | 6   | 7   |
| 1:2             | Seaming      | 1   | 1.5 | 2   | 2.5    | 3     | 3.5 | 3.8 |
| 1:3             | Shirring     | 0.7 | 1   | 1.4 | 1.7    | 2     | 2.3 | 2.5 |
| 1:1.3           | Serging      | 1.6 | 2.3 | 3.1 | 3.9    | 4.7   | 5.4 | 5.9 |
| 1:4             | Special      | 0.6 | 0.9 | 1.2 | 1.5    | 1.8   | 2.1 | 1   |

### **N**EEDLE REPLACEMENT FIG.10

- •Please use DC × 27 or equivalent needle size.
- ·Loosen Screw ① and remove the old needle .
- ·Insert the needle which long groove faces you and push it up deep into the needle hole until it stops and tighten Screw 1.

## **DIFFERENTIAL FEED RATIO ADJUSTMENT(FIG.11TAB.3)**

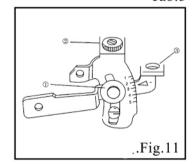
The differential feed ratio is the ratio of movements between Main Feed Dog and Differential Feed Dog , when the movement of Main Feed Dog is bigger than Differential Feed Dog , the fabric be stretched in sewing Otherwise the fabric be shrinked.

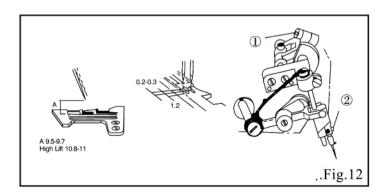
·Loosen Nut 1 then turn Screw 2 in clockwise for stretching the fabric and in reverse direction for shrinking the fabric then tighten Nut 1.

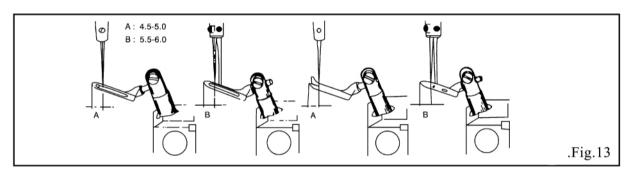
NOTE: When the surface of adjusting Level ③ be set at the scale ② the differential feed ratio is 1:1, and if it be set over the scale its ratio can be adjustable up to 1:0.7.

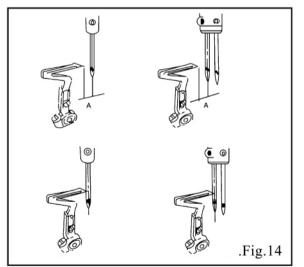
Tab.3

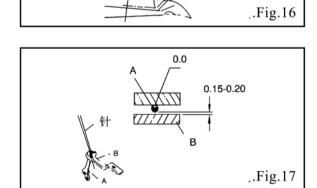
| Scale                      |     | 1     | 2     | 3     | 4     | 5     |
|----------------------------|-----|-------|-------|-------|-------|-------|
| 2.259                      | 1:3 |       | 1:0.7 | 1:0.9 | 1:1.1 | 1:13  |
| D:00 4:1                   | 1:2 | 1:0.7 | 1:1   | 1:1.4 | 1:1.7 | 1:2   |
| Differential<br>Feed ratio | 1:3 | 1:1   | 1:1.5 | 1:2   | 1:2.5 | 1:3   |
| reed ratio                 | 1:4 | 1:1.1 | 1:1.6 | 1:2.3 | 1:2.8 | 1:3.3 |



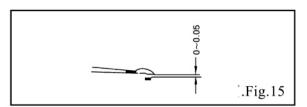


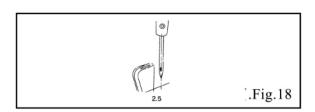






B 0.2 A 0.5





### PARTS RELATION AND TIMING

#### (1) Needle and Needle Plate Fig.12

When the Needle moves to the highest position, the distance between needle point (left needle if two needle) and Needle Plate is 9.5-9.7mm for standard lift machine or 10.8-11.0mm for high lift machine. Each needle must centers in each needle slot of Needle plate. The right needle must be ahead about 0.2-0.3mm than left needle. And the distance between the needle point (right needle if two needle).

To needle slot of Needle Plate or Presser Foot is 1.2mm.

- ·Slightly loosen Screw ① of Needle Drive Crank.
- ·Rotate the Pulley to check if needle center in each needle slot of Needle Plate. or you may loosen Screw ② and adjust Needle Holder .
- ·Rotate the Pulley for removing the needle to the highest position, tap the Needle Holder Guide until the correct needle height is obtained.
- ·Tighten Screw ①.

#### (2) Upper Looper (Spreader) and Needle Fig.13

·When the Upper (spreader) moves to the extremely left, the distance between the point of looper (spreader) and center line of needle is 4.5-5.0, for 1 needle (spreader) to center line of left needle is 5.5-6.0mm for 2 needle machine.

#### (3) Lower Looper and Needle Fig.14.15

- ·When the Lower Looper moves to the extremely left, the distance between looper point and center line of needle (left needle if 2 needle) is 3.4-3.6mm for high lift machine.
- ·When the Lower Looper moves to the center line of needle (left needle if 2 needle), the gap between needle and looper is 0-0.05mm.

#### (4) Upper Looper and Lower Lopper Fig.16

When the Upper and Lower Looer is crossed.

#### (5) Needle and Needle Guard Fig.17

When the Lower Looper point is opposite the center line of Needle (left needle if 2 needle), the gap between Needle and rear Needle Guard A is 0mm. when Needle moves to the lowest position, the gap between Needle and front Needle Guard B is 0.15-0.2mm.

#### (6) Chain Looper and Needle Fig.18

The Chain Looper must be fixed into the lowest position of its holder and when the Chain Looper moves to the extremely left, the distance between the looper point and center line of needle is 2.5mm.

# **N**EEDLE BREAK

| NO. | REASON                                 | CORRECT                                     |
|-----|--|---|
| 1   | Needle installed wrong                 | Reset needle correctly                      |
| 2   | Wrong needle size                      | Use properly needle for fabric and thread   |
| 3   | Needle is bended                       | Replace new needle                          |
| 4   | Wrong relation with Needle Guars       | Readjust Needle Guard                       |
| 5   | Wrong relation with looper             | Readjust looper                             |
| 6   | Needle does not center the needle slot | Readjust the needle plate and presser point |
|     | of needle Plate or Presser Foot        |   |

# THREAD BREAK

| NO. | REASON                                  | CORRECT                                   |
|-----|---|---|
| 1   | Inferior quality of thread              | Use good quality thread                   |
| 2   | Thread is thicker than Needle hole      | Use proper Needle for fabric and thread   |
| 3   | Wrong threading                         | Rethreading correctly                     |
| 4   | Thread tension is too strong            | Readjust thread tension nut               |
| 5   | Needle installed wrong                  | Reset needle correctly                    |
| 6   | Thread Stand installed wrong            | Reset thread stand for threading smoothly |
| 7   | Over heat of Needle: (1).NO silicon oil | (1)fill in Silicone oil                   |
|     | (2)Wrong setting of Needle Guard        | (2) Readjust Needle Guard                 |
| 8   | Thread Disc or Guide is burred          | Grind off polish or replace new one       |
| 9   | Wrong relation of Needle and Looper     | Readjust Needle and Looper                |
| 10  | Needle, Looper, Needle Plate and Guide  | Grind off, polish or replace new one      |
|     | is burred                               |   |

# **S**KIP STITHCES

| NO. | REASON  | CORRECT                     |
|-----|---|-----------------------------|
| 1   | Wrong relation of Needle and Looper             | Readjust Needle and Looper  |
| 2   | Wrong threading                                 | Rethreading correctly       |
| 3   | Needle installed wrong                          | Reset Needle correctly      |
| 4   | Inadequate thread tension or tension too strong | Readjust Thread Tension Nut |
| 5   | Looper point is damaged                         | Replace new one             |
| 6   | Needle is bended                                | Replace new one             |
| 7   | Wrong installed Needle Guard                    | Readjust Needle Guard       |

# LOOSEN STITCHES

| NO. | REASON                                    | CORRECT                     |
|-----|---|-----------------------------|
| 1   | Wrong threading                           | Rethreading correctly       |
| 2   | Thread is thicker than Needle hole        | Use proper Needle           |
| 3   | Tension Disc do not press thread properly | Reset Tension Disc Properly |
| 4   | Needle thread is not lubricated           | Fill silicon oil            |
| 5   | Wrong setting of Needle and Loopers       | Readjust Needle and Loopers |

# **UNEVEN STITCHES**

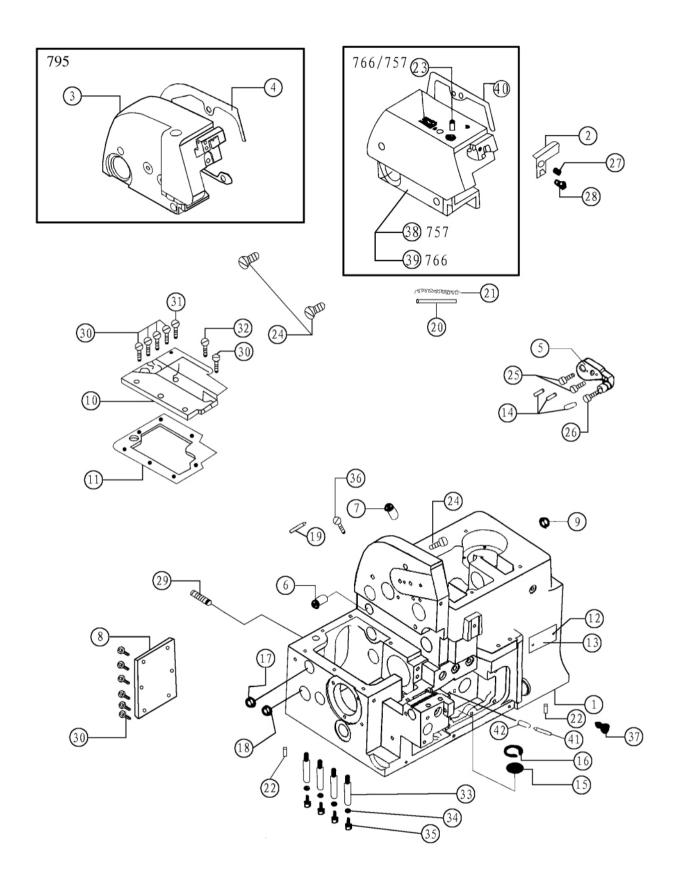
| NO. | REASON                                | CORRECT                               |
|-----|---------------------------------------|---------------------------------------|
| 1   | Wrong threading                       | Rethreading correctly                 |
| 2   | Thread Stand installed wrong          | Reset Thread for threading smoothly   |
| 3   | Lower Knife installed wrong           | Readjust Lower Knife                  |
| 4   | Knives do not trim neatly (1)Knives   | Correct as follow (1)Readjust Knives; |
|     | installed wrong; (2) Dull lower Knife | (2)Sharpen or replace new Knives      |
| 5   | Thread Disc or Guide is burred        | Grind off, polish or replace new one  |
| 6   | Needle Point is damaged               | Replace new Needle                    |
| 7   | Inadequate heigh of Feed Dogs         | Readjust Feed Dogs.                   |
| 8   | Inadequate thread tension             | Readjust Thread Tension Nut           |

# **W**RINKLED STITCHES

| NO. | REASON                               | CORRECT                                  |
|-----|--------------------------------------|--|
| 1   | Thread tension is too strong         | Readjust Thread Tension Nut              |
| 2   | Inadequate pressure of Presser Foot  | Readjust Presser Foot pressure           |
| 3   | Inadequate height of Feed Dogs       | Readjust Feed Dogs                       |
| 4   | Knives do not trim neatly            | Readjust Knives or sharpen Knives        |
| 5   | Differential feed is not matched     | Readjust differential feed ratio         |
| 6   | Needle is too thick                  | Use Proper Needle for fabric and thread  |
| 7   | Seam width is too narrow against the | Readjust seam width or replace chain off |
|     | chain - off finger of Needle Plan.   | finger.                                  |

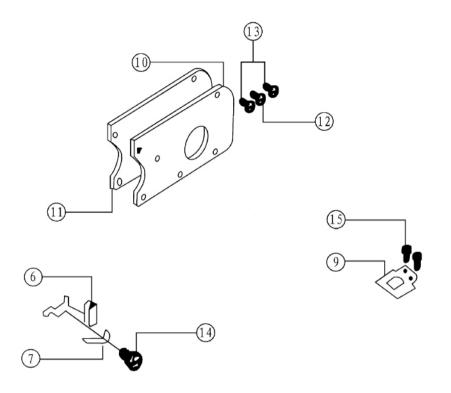
# THERAD CHAIN DOES NOT COME OUT SMOOTHLY

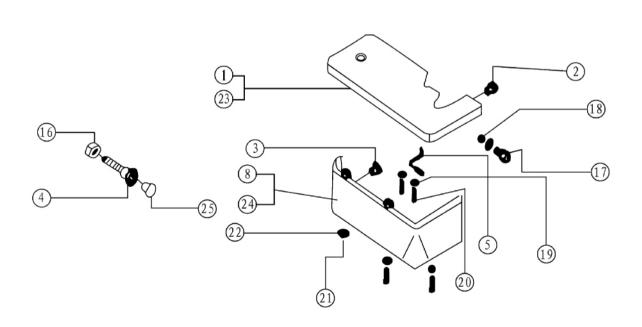
| NO. | REASON                                   | CORRECT                              |
|-----|--|--------------------------------------|
| 1   | Presser Foot installed wrong             | Reset Presser Foot correctly         |
| 2   | Inadequate timing of Looper Thread Cam   | Readjust Looper thread Cam           |
| 3   | Double Chain Looper installed wrong      | Reset Double Chain Looper correctly  |
| 4   | Wrong threading                          | Rethreading correctly                |
| 5   | Inadequate or too strong thread tension  | Readjust Thread Tension Nut          |
| 6   | Wrong relation of Needle and looper      | Readjust Needle and Looper           |
| 7   | Needle Plate Thread Disc or Presser foot | Grind off, polish or replace new one |
|     | is burred                                |                                      |
| 8   | Thread tension disk is rough             | Polish thread tension disk           |



# Frame Assembly

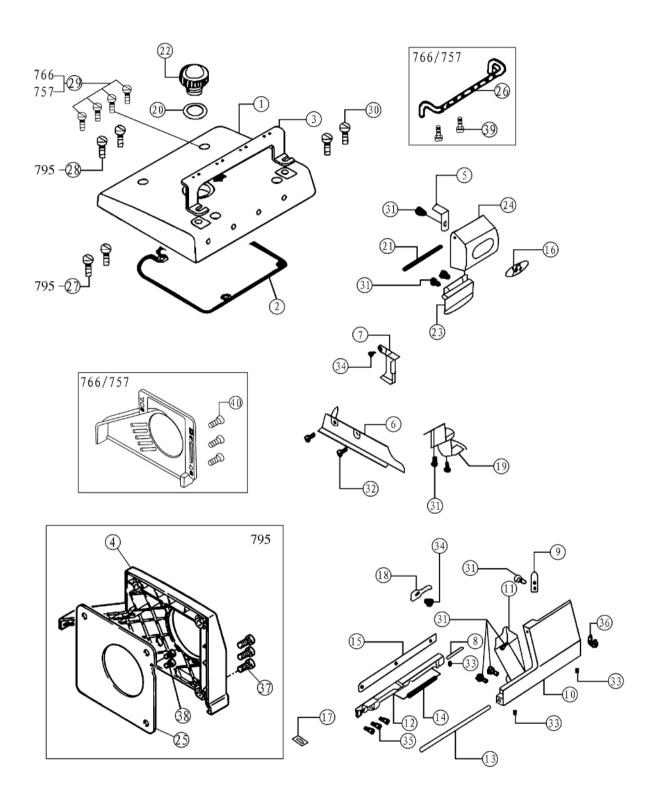
|     |           |          |                           | (Number)     |             |             |
|-----|-----------|----------|---------------------------|--------------|-------------|-------------|
|     | David NO  | Ref.Part | Description               |              |             |             |
| NO. | Part NO.  | NO.      | Ţ.                        | Three-thread | Four-thread | Five-thread |
| 1   | 300031    |          | Machine frame             | 1            | 1           | 1           |
|     | 300741    |          | Machine frame             | 1            | 1           | 1           |
|     | 300811    |          | Machine frame             | 1            | 1           | 1           |
| 2   | 20112001  | KA04E1   | Needle thread cover plate | 1            | 1           | 1           |
| 3   | 300082    |          | Left upper cover          | 1            | 1           | 1           |
| 4   | 20122001  |          | Left upper cover pad      | 1            | 1           | 1           |
| 5   | 20101003  | KA09     | Needle plate              | 1            | 1           | 1           |
| 6   | 20122002  | KA14     | Rear oil adhesive         | 1            | 1           | 1           |
| 7   | 20122003  | KA22     | Oil seal                  | 1            | 1           | 1           |
| 8   | 20112002  | KA25     | Rear cover                | 1            | 1           | 1           |
| 9   | 20122005  | KA26     | Oil cover                 | 1            | 1           | 1           |
| 10  | 20101004  | KA27     | Cover                     | 1            | 1           | 1           |
| 11  | 20122007  | KA29     | Cover washer              | 1            | 1           | 1           |
| 12  | R03001    | KA33     | Rivet                     | 2            | 2           | 2           |
| 13  | 20137001  |          | Machine model plate       | 1            | 1           | 1           |
| 14  | P01003    | KA39     | Pin                       | 3            | 3           | 3           |
| 15  | 20112003  | KA40     | Oil screen                | 1            | 1           | 1           |
| 16  | H01003    | KA42     | Snap ring                 | 1            | 1           | 1           |
| 17  | 20122008  | KA21     | Oil seal I                | 2            | 2           | 1           |
| 18  | 20122009  | KA24     | Oil seal II               | 1            | 1           | 1           |
| 19  | 20626004  | 240190   | Oil amount adjusting pin  | 1            | 1           | 1           |
| 20  | 20121019  |          | Oil tube                  | 1            | 1           | 1           |
| 21  | 20127001  |          | Spring                    | 1            | 1           | 1           |
| 22  | 20126001  |          | Pin                       | 2            | 2           | 2           |
| 23  | 20121019  | KA12     | Oil tube                  | 1            | 1           | 1           |
| 24  | 201S11028 | SK292    | Screw                     | 3            | 3           | 3           |
| 25  | 201S11027 | SK290    | Screw                     | 2            | 2           | 2           |
| 26  | 201S11029 | SK299    | Screw                     | 1            | 1           | 1           |
| 27  | S10005    | SK216    | Screw M3 × 3              | 1            | 1           | 1           |
| 28  | 201S11033 | SK357    | Screw                     | 1            | 1           | 1           |
| 29  | 201S14002 | SK268    | Screw                     | 1            | 1           | 1           |
| 30  | 201S11016 | SK257    | Screw                     | 11           | 11          | 11          |
| 31  | 201S12005 | SK261    | Screw                     | 1            | 1           | 1           |
| 32  | 201S12006 | SK280    | Screw                     | 1            | 1           | 1           |
| 33  | 201S30006 | SK401    | Screw                     | 4            | 4           | 4           |
| 34  | 20128023  | WK23     | Washer                    | 4            | 4           | 4           |
| 35  | 201S13002 | SK400    | Screw                     | 4            | 4           | 4           |
| 36  | 201S11021 | SK272    | Screw                     | 1            | 1           | 1           |
| 37  | 201S11039 | SK308    | Screw                     | 1            | 1           | 1           |
| 38  | 300070    | KA04F    | Front oncde cover         | 1            | 1           | 1           |
| 39  | 300080    | KA04F    | Front oncde cover         | 1            | 1           | 1           |
| 40  | 20222001  | KA06F    | Front oncde cover pad     | 1            | 1           | 1           |
| 41  | P01003    |          | Pin                       | 1            | 1           | 1           |
| 42  | 20523003  |          | Oil wick                  | 1            | 1           | 1           |





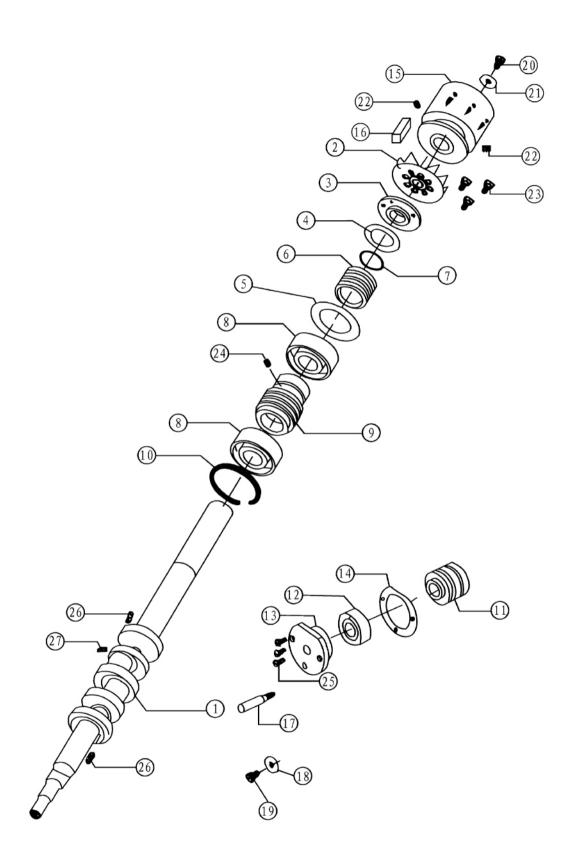
## **Cloth Plate Assemblies**

|     |            |          |                                   | -            | (Numb       | er)         |
|-----|------------|----------|-----------------------------------|--------------|-------------|-------------|
|     | Part NO.   | Ref.Part | Description                       | 7, 12        |             |             |
| NO. | rait NO.   | NO.      |                                   | Three-thread | Four-thread | Five-thread |
| 1   | 2011200400 | KB01E    | Cloth plate                       | 1            | 1           | 0           |
| 2   | 20122012   | KB05     | Rubber bushing                    | 1            | 1           | 1           |
| 3   | 20122013   | KB05E    | Rubber bushing                    | 1            | 1           | 1           |
| 4   | 201S30011  | KB06E-1  | Screw                             | 1            | 1           | 1           |
| 5   | 20127003   | KB12B    | Spring                            | 1            | 1           | 1           |
| 6   | 20112011   | KB15B    | Cloth plate slider cover          | 1            | 1           | 1           |
| 7   | 20127004   | KB17     | Cloth plate cover spring          | 1            | 1           | 1           |
| 8   | 20111001   | KB22F    | Cloth plate lower plate           | 1            | 1           | 0           |
| 9   | 20111003   | KB29     | Washer                            | 1            | 1           | 1           |
| 10  | 20112012   | KB31D-1  | Upper looper sealing plate        | 1            | 1           | 1           |
| 11  | 20122015   | KB31D-2  | Upper looper sealing plate washer | 1            | 1           | 1           |
| 12  | 201S11018  | SK262    | Screw                             | 1            | 1           | 1           |
| 13  | 201S11016  | SK257    | Screw                             | 2            | 2           | 2           |
| 14  | 201S20003  | SK279    | Screw                             | 1            | 1           | 1           |
| 15  | 201S17004  | SK217    | Screw                             | 2            | 2           | 2           |
| 16  | 201S16003  | NK26     | Nut                               | 1            | 1           | 1           |
| 17  | 201S30007  | SK403    | Screw                             | 1            | 1           | 1           |
| 18  | 201S16001  | NK23     | Nut                               | 1            | 1           | 1           |
| 19  | W01005     | WK06     | Washer 3                          | 2            | 2           | 2           |
| 20  | 201S11005  | SK221    | Screw                             | 2            | 2           | 2           |
| 21  | 201S11037  | SK560    | Screw                             | 3            | 3           | 3           |
| 22  | 20128019   | WK05     | Washer                            | 3            | 3           | 3           |
| 23  | 2011200500 | KB02E    | Cloth plate                       | 0            | 0           | 1           |
| 24  | 20111002   | KB23F    | Cloth plate lower plate           | 0            | 0           | 1           |
| 25  | 20122011   | KB03     | Rubber bushing                    | 1            | 1           | 1           |



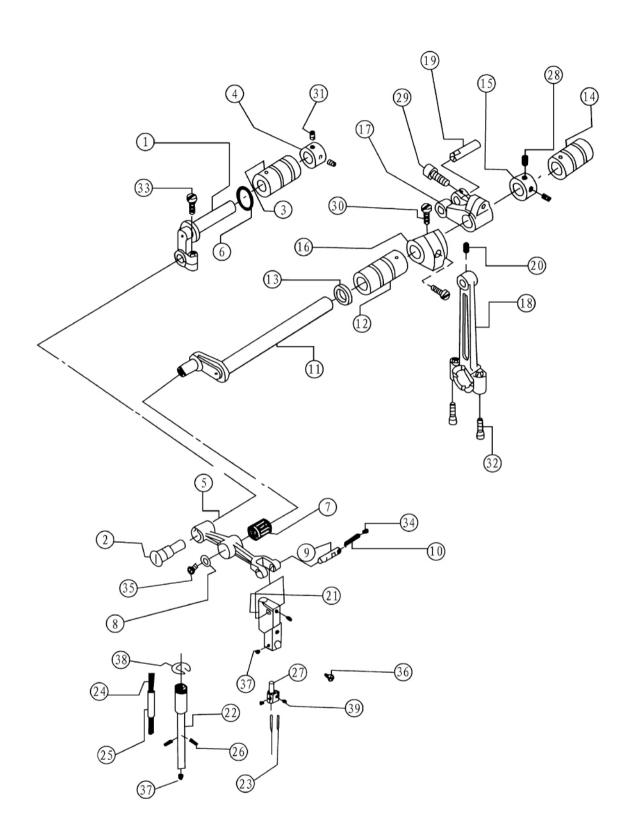
## **Cover Assemblies**

|     |           |           |   | (Number)     |             |             |  |
|-----|-----------|-----------|---|--------------|-------------|-------------|--|
|     | R         | Ref.Part  | Description                                   |              |             |             |  |
| NO. | Part NO.  | NO.       | Description                                   | Three-thread | Four-thread | Five-thread |  |
| 1   | 300083    |           | Unner cover                                   | 1            | 1           | 1           |  |
| 1   | 300072    | KC01F     | Upper cover Upper cover                       | 1            | 1           | 1           |  |
|     | 300475    |           |   | 1            | 1           | 1           |  |
|     | 3000473   |           | Upper cover                                   | 1            | 1           | 1           |  |
| 2   | 20122016  |           | Upper cover                                   | 1            | 1           | 1           |  |
|     | 20322003  | KC03      | Upper cover washer Upper cover washer         | 1            | 1           | 1           |  |
| 3   | 20112013  |           |   | 1            | 1           | 1           |  |
|     | 20112013  |           | Thread guide supporter Thread guide supporter | 1            | 1           | 1           |  |
| 4   | 20611003  | 209550-PB | Belt cover                                    | 1            | 1           | 1           |  |
| -   | 20211001  | KC09F     |   | 1            | 1           | 1           |  |
|     | 20311001  |           | Belt cover                                    | 1            |             |             |  |
| 5   |           |           | Belt cover                                    | +            | 1           | 1           |  |
|     | 20112014  | KC13      | Thread cover spring                           | 1            | 1           | 1           |  |
| 6   | 20112015  | KC15      | Cloth guide plate                             | 1            | 1           | 1           |  |
| 7   | 20112016  | KC17      | Oil guide II                                  | 1            | 1           | 1           |  |
| 8   | 20126003  | KC18      | Pin   | 1            | 1           | 1           |  |
| 9   | 20112017  | KC20      | Front spring                                  | 1            | 1           | 1           |  |
| 10  | 300073    | KC21E     | Front cover                                   | 1            | 1           | 1           |  |
| 11  | 20112018  | KC22B     | Front cover guard                             | 1            | 1           | 0           |  |
|     | 20112019  | KC23B     | Front cover guard                             | 0            | 0           | 1           |  |
| 12  | 20101007  | KC24B     | Front cover hinge                             | 1            | 1           | 1           |  |
| 13  | 20126004  | KC25B     | Hinge pin                                     | 1            | 1           | 1           |  |
| 14  | 20127005  | KC28      | Front cover hinge spring                      | 1            | 1           | 1           |  |
| 15  | 20122017  | KC29      | Front cover hinge washer                      | 1            | 1           | 1           |  |
| 16  | 20137002  |           | Trade mark plate                              | 1            | 1           | 1           |  |
| 17  | 20131064  | KC39-4    | Oil flow sindow                               | 2            | 2           | 2           |  |
| 18  | 20112020  | KC36      | Front cover snap guard                        | 1            | 1           | 1           |  |
| 19  | 20112021  | KC55B     | Oil guard                                     | 1            | 1           | 1           |  |
| 20  | 20122018  | KC58      | Oil level gauge washer                        | 1            | 1           | 1           |  |
| 21  | 20126005  | KC62      | Pin   | 1            | 1           | 1           |  |
| 22  | 20111005  |           | Oil level gauge plate                         | 1            | 1           | 1           |  |
|     | 20211002  | KF67      | Oil level gauge plate                         | 1            | 1           | 1           |  |
| 23  | 20111006  |           | Oil sight                                     | 1            | 1           | 1           |  |
|     | 20211003  | KC69F     | Oil sight                                     | 1            | 1           | 1           |  |
| 24  | 20111018  |           | Upper cover                                   | 1            | 1           | 1           |  |
| 25  | 20612005  | 209551    | Right frame plate                             | 1            | 1           | 1           |  |
| 26  | 20313001  | KC05E     | Thread guide supporter                        | 1            | 1           | 1           |  |
| 27  | 201S11015 | SK256     | Scrrew  | 2            | 2           | 2           |  |
| 28  | 201S11025 | SK278     | Scrrew  | 2            | 2           | 2           |  |
| 29  | 201S11036 | SK503     | Scrrew  | 4            | 4           | 4           |  |
| 30  | 206S11005 | 4009      | Scrrew  | 2            | 2           | 2           |  |
| 31  | 201S11009 | SK233     | Scrrew  | 9            | 9           | 9           |  |
| 32  | 201S11018 | SK262     | Scrrew  | 2            | 2           | 2           |  |
| 33  | 201S15001 | SK235     | Scrrew  | 3            | 3           | 3           |  |
| 34  | 201S11014 | SK250     | Scrrew  | 2            | 2           | 2           |  |
| 35  | 201S11038 | SK576     | Scrrew  | 3            | 3           | 3           |  |
| 36  | H05002    | FK03      | Snap spring                                   | 1            | 1           | 1           |  |
| 37  | S01013    | 7176      | Scrrew  | 3            | 3           | 3           |  |
| 38  | S01010    | 7019      | Scrrew  | 2            | 2           | 2           |  |
| 39  | S01010    | 7019      | Scrrew  | 2            | 2           | 2           |  |
| 40  | 201S11024 | SK257     | Scrrew  | 3            | 3           | 3           |  |



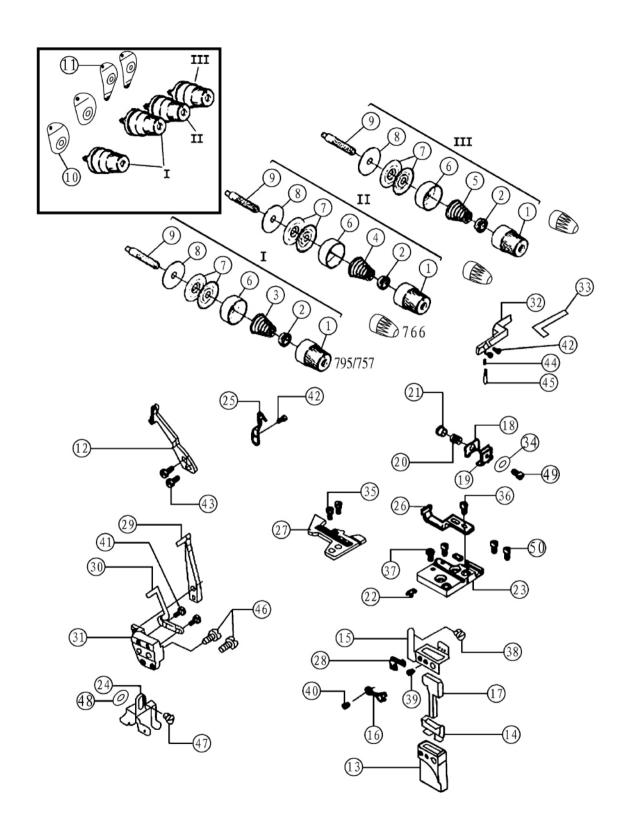
## **Main Shaft Assemblies**

|     |           |                 |                          | (Number)     |             |              |  |
|-----|-----------|-----------------|--------------------------|--------------|-------------|--------------|--|
| NO. | Part NO.  | Ref.Part<br>NO. | Description              | Thurs down d | Farmathan d | Fire these d |  |
|     |           |                 |                          |              | Four-thread | Five-thread  |  |
| 1   | 20102001  | KD01            | Main shaft               | 1            | 1           | 1            |  |
| 2   | 20111008  | KD09            | wheel                    | 1            | 1           | 1            |  |
| 3   | 20101008  | KD10D           | Rear shaft bearing cover | 1            | 1           | 1            |  |
| 4   | 20122019  | KD12D           | Washer                   | 1            | 1           | 1            |  |
| 5   | 20128002  | KD13            | Main shaft spring washer | 1            | 1           | 1            |  |
| 6   | 20103002  | KD14            | Main shaft bysgubg asm   | 1            | 1           | 1            |  |
| 7   | O01003    | KD15            | Seal ring                | 1            | 1           | 1            |  |
| 8   | B03001    | KD16            | Bearing                  | 2            | 2           | 2            |  |
| 9   | 20125001  | KD17            | Oil pump worm            | 1            | 1           | 1            |  |
| 10  | 20129001  | KD20            | Snap spring              | 1            | 1           | 1            |  |
| 11  | 20103003  | KD21            | Main shaft left bushing  | 1            | 1           | 1            |  |
| 12  | B04001    | KD22            | Bearing                  | 1            | 1           | 1            |  |
| 13  | 20101009  | KD27D           | Bearing cover            | 1            | 1           | 0            |  |
|     | 20101010  | KD26D           | Bearing cover            | 0            | 0           | 1            |  |
| 14  | 20122020  | KD28D           | Bearing cover washer     | 1            | 1           | 1            |  |
| 15  | 20101044  |                 | Pulley                   | 1            | 1           | 1            |  |
| 16  | 20101012  |                 | Key                      | 1            | 1           | 1            |  |
| 17  | 20126006  | KD33            | Bulgy pulley shaft       | 0            | 0           | 1            |  |
| 18  | 30128008  | 240102          | washer                   | 1            | 1           | 0            |  |
| 19  | 201S11040 | 777-5361        | Screw                    | 1            | 1           | 0            |  |
| 20  | 201S11034 | SK374           | Screw                    | 1            | 1           | 1            |  |
| 21  | 20128024  | WK24            | washer                   | 1            | 1           | 1            |  |
| 22  | 201S15004 | SK347           | Screw                    | 2            | 2           | 2            |  |
| 23  | 201S11016 | SK257           | Screw                    | 3            | 3           | 3            |  |
| 24  | 201S14002 | SK270           | Screw                    | 1            | 1           | 1            |  |
| 25  | 201S11012 | SK241           | Screw                    | 3            | 3           | 3            |  |
| 26  | 201S15005 | SK396           | Screw                    | 2            | 2           | 2            |  |
| 27  | 201S15001 | SK235           | Screw                    | 1            | 1           | 1            |  |



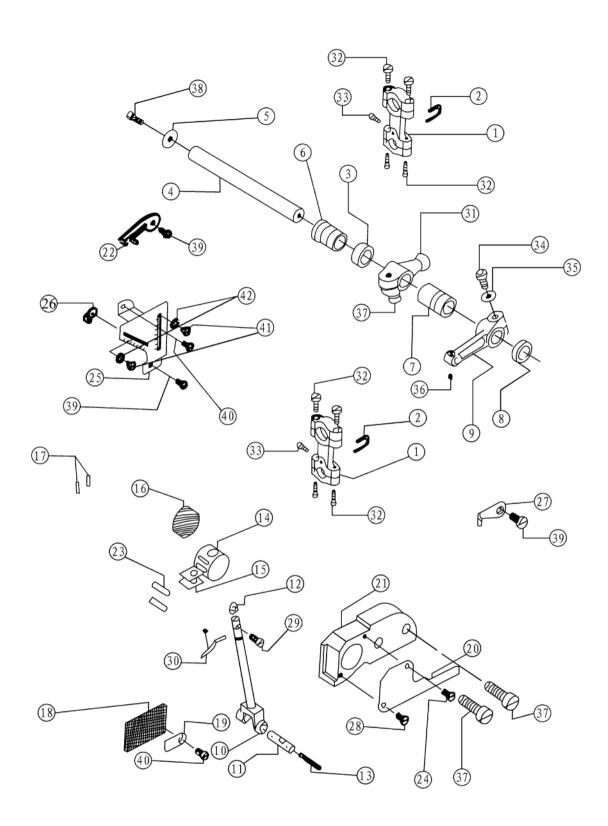
## **Needle Bar Assemblies**

|     |            | 7               |                                     | Number)      |             |             |  |
|-----|------------|-----------------|-------------------------------------|--------------|-------------|-------------|--|
| NO. | Part NO.   | Ref.Part<br>NO. | Description                         | Three-thread | Four-thread | Five-thread |  |
| 1   | 20102002   | KFO1F           | Needle bar driving frame rock shaft | 1            | 1           | 1           |  |
| 2   | 20126007   | KFO2            | Eccentric shaft                     | 1            | 1           | 1           |  |
| 3   | 20103004   | KFO5            | Needle bar shaft bushing back       | 1            | 1           | 1           |  |
| 4   | 20108001   | KFO7            | Snap ring                           | 1            | 1           | 1           |  |
| 5   | 20104001   | KFO9            | Throat driving crank                | 1            | 1           | 1           |  |
| 6   | 20122022   | KF38            | Oil seal                            | 1            | 1           | 1           |  |
| 7   | B07006     | KF11            | Needle bearing                      | 1            | 1           | 1           |  |
| 8   | 20128004   | KF12            | Washer ring                         | 1            | 1           | 1           |  |
| 9   | 20126008   | KF14            | Throat clip guide ping              | 1            | 1           | 1           |  |
| 10  | 20123021   | KF16            | Oil wick                            | 1            | 1           | 1           |  |
| 11  | 20102003   | KF17            | Throat bar rock crank               | 1            | 1           | 1           |  |
| 12  | 20103005   | KF18            | Needle driving shaft bearing        | 1            | 1           | 1           |  |
| 13  | 20122021   | KF19            | Seal ring                           | 2            | 2           | 2           |  |
| 14  | 20103006   | KF20            | Needle driving shaft bearing        | 1            | 1           | 1           |  |
| 15  | 20108002   | KF21            | Snap ring                           | 2            | 2           | 2           |  |
| 16  | 20101013   | KF23            | Balance block                       | 1            | 1           | 1           |  |
| 17  | 20104002   | KF26            | Needle bar frame rock shaft crank   | 0            | 1           | 0           |  |
| 1,  | 20104003   | KF25            | Needle bar frame rock shaft crank   | 1            | 0           | 1           |  |
| 18  | 20105001   | KF28            | Needle bar connecting rod           | 1            | 1           | 1           |  |
| 19  | 20126009   | KF30            | Connecting link pin                 | 1            | 1           | 1           |  |
| 20  | 201S12005  | SK261           | Screw                               | 1            | 1           | 1           |  |
| 21  | 20101014   | KF32            | Throat clip guide bushing           | 1            | 1           | 1           |  |
| 22  | 2010200400 |                 | Needle bar                          | 1            | 1           | 1           |  |
| 23  | 20117012   | DC × 27         | Needle                              | 1            | 2           | 0           |  |
|     | 20117013   | DC × 27         | Needle                              | 0            | 0           | 2           |  |
|     | 20117014   | DC × 27         | Needle                              | 0            | 0           | 2           |  |
| 24  | 20123021   | KF35            | Oil wick                            | 1            | 1           | 1           |  |
| 25  | 20121020   | KF35-1          | Plastic tube                        | 1            | 1           | 1           |  |
| 26  | 20123005   | KF37            | Oil wick                            | 2            | 2           | 2           |  |
| 27  | 20134002   | KG142-E         | Needle clamp                        | 1            | 0           | 0           |  |
|     | 20134001   | KG131-E         | Needle clamp                        | 0            | 1           | 0           |  |
|     | 20134003   | KG153-E         | Needle clamp                        | 0            | 0           | 1           |  |
|     | 20134004   | KG155-E         | Needle clamp (for thick)            | 0            | 0           | 1           |  |
| 28  | 201S15003  | SK293           | Snap ring screw                     | 2            | 2           | 2           |  |
| 29  | 201S13003  | SK612           | Hexagon socket screw                | 1            | 1           | 1           |  |
| 30  | 201S30003  | SK291           | Balance block position screw        | 2            | 2           | 2           |  |
| 31  | 201S14002  | SK293           | Frame rock shaft set screw          | 3            | 3           | 3           |  |
| 32  | 201S20006  | SK385           | Shaft position screw                | 2            | 2           | 2           |  |
| 33  | 201S11026  | SK287           | Screw                               | 1            | 1           | 1           |  |
| 34  | 201S17001  | SK204           | Screw                               | 1            | 1           | 1           |  |
| 35  | 201S17004  | SK217           | Screw                               | 1            | 1           | 1           |  |
| 36  | S01022     | SK221           | Screw                               | 1            | 1           | 1           |  |
| 37  | S010005    | SK216           | Screw                               | 4            | 4           | 4           |  |
| 38  | H05008     | EK01            | Snap ring                           | 1            | 1           | 1           |  |
| 39  | 201S14001  | SK216           | Screw                               | 2            | 2           |             |  |



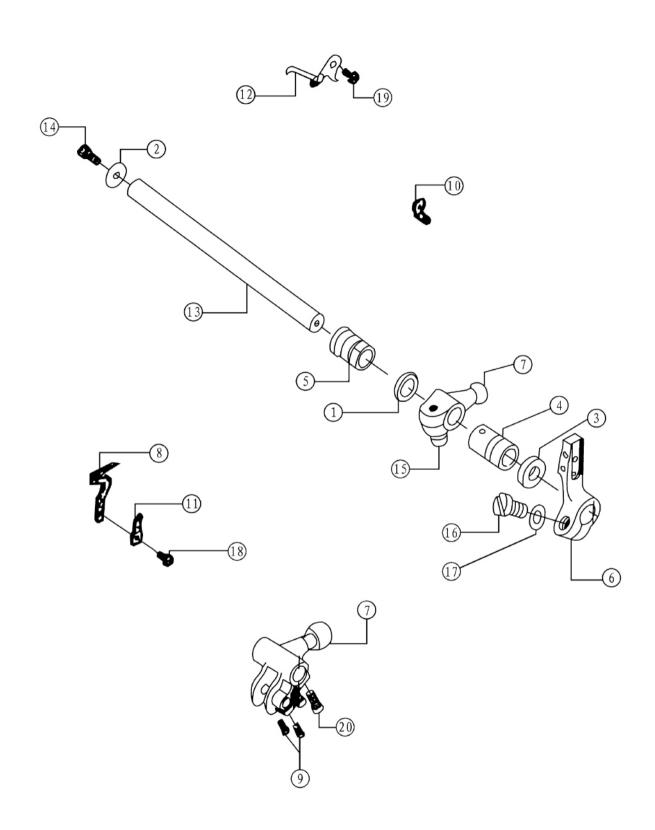
## **Thread Guide Assemblies**

|          | Part NO.               |                     |   | (Number)     |             |             |  |
|----------|------------------------|---------------------|---|--------------|-------------|-------------|--|
|          |                        | Ref.Part            | Description   |              |             |             |  |
| NO.      |                        | NO.                 | •   | Three-thread | Four-thread | Five-thread |  |
| 1        | 20111013               | 208447-UA           | Thread tension screw                                  | 3            | 4           | 4           |  |
|          | 20311002               | KG04F               | Thread tension screw                                  | 3            | 4           | 4           |  |
| 2        | 20111014               | 208448              | Thread tension spring                                 | 3            | 4           | 4           |  |
| 3        | 20127018               | 201037              | Thread tension spring                                 | 1            | 2           | 2           |  |
| 4        | 20127019               | 201068              | Thread tension spring                                 | 1            | 1           | 1           |  |
| 5        | 20127020               | 201086              | Thread tension spring                                 | 1            | 1           | 1           |  |
| 7        | 20111015               | 208450-UA<br>210319 | Thread tension spring                                 | 3            | 4           | 4           |  |
| 8        | 20123018               | 208449              | Thread tension disc Thread tension disc washer        | 6 3          | 8           | 8           |  |
| 9        | 201S30016              | 005082A             | Thread tension screw                                  | 3            | 4           | 4           |  |
| 10       | 20113001               | 209622              | Thread guide  | 1            | 2           | 2           |  |
|          | 20213001               | 209622              | Thread guide  | 1            | 2           | 2           |  |
| 11       | 20113002               | 202849              | Thread guide  | 2            | 2           | 2           |  |
|          | 20213002               | 202849              | Thread guide  | 2            | 2           | 2           |  |
| 12       | 20113003               | KG11F               | Upper thread take-up                                  | 1            | 1           | 0           |  |
| 12       | 20113004               | KG6F                | Upper thread take-up                                  | 0            | 0           | 1           |  |
| 13       | 20111009               | KG12<br>KG13        | Oil box   | 1            | 1           | 1           |  |
| 15       | 20112022               | KG13<br>KG14        | Oil felt<br>Thread guide                              | 1            | 1           | 1           |  |
| 16       | 20122023               | KG15D               | Oil box washer  | 1            | 1           | 1           |  |
| 17       | 20123006               | KG16                | Oil felt  | 1            | 1           | 1           |  |
| 18       | 20113006               | KG17                | Tension spring  | 1            | 1           | 1           |  |
| 19       | 20113007               | KG18                | Thread controller disc holder                         | 1            | 1           | 1           |  |
| 20       | 20127006               | KG19                | Spring  | 1            | 1           | 1           |  |
| 21       | 20103008               | KG21                | Thread controller disc guide bushing                  | 1            | 1           | 1           |  |
| 22       | 20101015               | KG24-1              | Throat plate positioning rod                          | 2            | 2           | 2           |  |
| 23       | 20101016               | KG24-2D             | Throat plate bracket                                  | 1            | 1           | 1           |  |
| 24       | 20113008               | KG54                | Thread mark guide                                     | 1            | 1           | 0           |  |
| 25       | 20113009               | KG42<br>KG59        | Thread mark guide                                     | 0            | 0           | 1           |  |
| 26       | 20117002               | KG471               | Teat needle guard Front needle guard                  | 1 1          | 0           | 0           |  |
| 20       | 20117003               | KG472               | Front needle guard                                    | 0            | 1           | 0           |  |
| 27       | 20115001               | E800                | Needle plate  | 1            | 0           | 0           |  |
|          | 20115002               | E919                | Needle plate  | 0            | 1           | 0           |  |
|          | 20115003               | E982                | Needle plate  | 0            | 0           | 1           |  |
|          | 20115004               |                     | Needle plate  | 1            | 0           | 0           |  |
|          | 20115005               |                     | Needle plate  | 0            | 1           | 0           |  |
|          | 20115006               |                     | Needle plate  | 1            | 0           | 0           |  |
|          | 20115007               |                     | Needle plate  | 0            | 0           | 1           |  |
|          | 20115008               |                     | Needle plate  | 0            | 0           | 1           |  |
| 28       | 20113009               | KG25                | Needle plate Thread guide                             | 0            | 0           | 0           |  |
| 29       | 20117005               | KG31D               | Needle guard I  | 0            | 0           | 1           |  |
| 30       | 20117006               | KG37                | Needle guard II                                       | 0            | 0           | 1           |  |
| 31       | 20101017               | KU18                | Needle guard bracket                                  | 1            | 1           | 0           |  |
|          | 20101018               | KG39                | Needle guard bracket                                  | 0            | 0           | 1           |  |
| 32       | 20101019               | KG26-E              | Snap plate  | 1            | 1           | 1           |  |
| 33       | 20122024               | KG46                | Snap plate washer                                     | 1            | 1           | 1           |  |
| 34       | W01011                 | KF31                | Washer  | 1            | 1           | 1           |  |
| 35<br>36 | 201517005              | SK260<br>SK230      | Throat screw  | 2            | 2           | 2           |  |
| 37       | 201S11008<br>201S11029 | SK230<br>SK299      | Front needle snap screw Throat plate bracket screw    | 1 2          | 2           | 2           |  |
| 38       | 201511029              | SK259               | Throat plate bracket screw  Thread guide holder screw | 1            | 1           | 1           |  |
| 39       | 201511014              | SK207               | Oil box set screw                                     | 1            | 1           | 1           |  |
| 40       | 201S20005              | SK359               | Oil box set screw                                     | 1            | 1           | 1           |  |
| 41       | 201S11003              | SK209               | Rear needle guard screw                               | 2            | 2           | 2           |  |
| 42       | 201S12009              | SK242               | Needle guard screw                                    | 3            | 3           | 3           |  |
| 43       | 201S11009              | SK233               | Thread take up screw                                  | 2            | 2           | 2           |  |
| 44       | 201S15001              | SK235               | Snap plate screw II                                   | 1            | 1           | 1           |  |
| 45       | 201S30010              | SK236               | Snap plate set screw                                  | 1            | 1           | 1           |  |
| 46       | 201811022              | SK275               | screw   | 2            | 2           | 2           |  |
| 47       | 201511018              | SK262               | screw<br>Washan                                       | 1            | 1           | 1           |  |
| 48       | 20128030<br>S01006     | KQ42<br>SK221       | Washer  | 1 1          | 1           | 1           |  |
| +7       | 1301000                | 513221              | screw   | 1            | 1           | 1           |  |



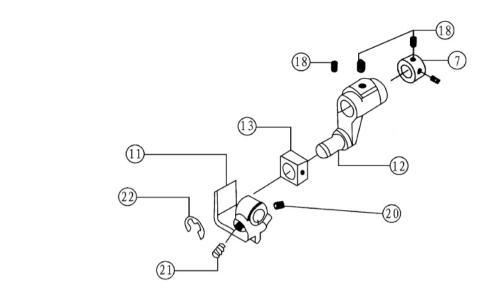
# **Upper Looper Assemblies**

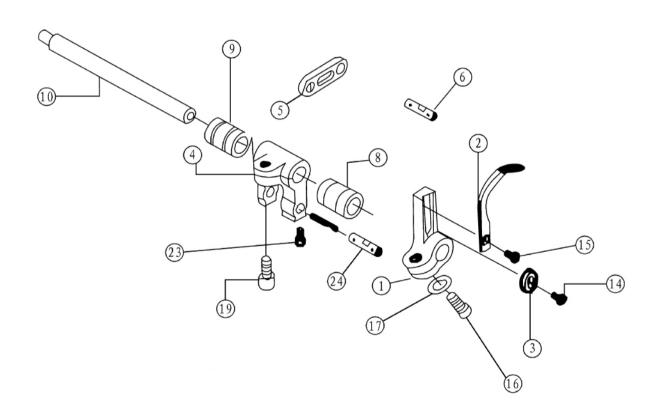
|     |           |          |                                      | (Number)     |             |             |  |
|-----|-----------|----------|--------------------------------------|--------------|-------------|-------------|--|
|     | David NO  | Ref.Part | Description                          |              |             | 3-107 571   |  |
| NO. | Part NO.  | NO.      |                                      | Three-thread | Four-thread | Five-thread |  |
| 1   | 20105002  | KJ01B    | Looper link                          | 2            | 2           | 2           |  |
| 2   | 20126010  | KJ06B    | Looper link holder                   | 2            | 2           | 2           |  |
| 3   | 20128005  | KJ13F    | Thickness washer                     | 1            | 1           | 1           |  |
| 4   | 20102006  | KJ15     | Upper looper shaft                   | 1            | 1           | 1           |  |
| 5   | 20128007  | KJ16     | Big washer                           | 1            | 1           | 1           |  |
| 6   | 20103009  | KJ19F    | Upper looper shaft rear bushing      | 1            | 1           | 1           |  |
| 7   | 20103010  | KJ20     | Upper looper shaft front bushing     | 1            | 1           | 1           |  |
| 8   | 20122025  | KJ21     | Upper looper shaft oil seal          | 1            | 1           | 1           |  |
| 9   | 20104004  | KJ22     | Upper looper shaft crank             | 1            | 1           | 1           |  |
| 10  | 20104005  | KJ26     | Upper looper shaft bar               | 1            | 1           | 1           |  |
| 11  | 20126011  | KJ27     | Connecting rod shaft pin             | 1            | 1           | 1           |  |
| 12  | 20112023  | KJ28     | Washer                               | 1            | 1           | 1           |  |
| 13  | 20123021  | KJ29     | Oil wick                             | 1            | 1           | 1           |  |
| 14  | 20109001  | KJ30F    | Upper looper slide block             | 1            | 1           | 1           |  |
| 15  | 20123008  | KJ33     | Oil felt                             | 2            | 2           | 2           |  |
| 16  | 20123009  | KJ34     | Oil felt                             | 1            | 1           | 1           |  |
| 17  | 20113013  | KJ58     | Thread tube                          | 2            | 2           | 2           |  |
| 18  | 20112024  | KJ39F    | Screen oil plate                     | 1            | 1           | 1           |  |
| 19  | 20112025  | KJ40F    | Felt plate                           | 1            | 1           | 1           |  |
| 20  | 20112026  | KJ41     | Thread holder snap plate             | 1            | 1           | 1           |  |
| 21  | 20101020  | KJ42E    | Upper looper shaft slide bar bracket | 1            | 1           | 1           |  |
| 22  | 20113014  | KJ68     | Tow for thread guide                 | 1            | 1           | 1           |  |
| 23  | 20523003  | KJ44     | Oil wick                             | 1            | 1           | 1           |  |
| 24  | 201S11005 | SK221    | Screw                                | 1            | 1           | 1           |  |
| 25  | 20112027  | KJ61D    | Thread amount regulating plate       | 1            | 1           | 1           |  |
| 26  | 20113011  | KJ63     | Upper looper thread guard            | 1            | 1           | 1           |  |
| 27  | 20113012  | KJ66D    | Upper looper shaft thread plate      | 1            | 1           | 1           |  |
| 28  | 201S17006 | SK451    | Screw                                | 1            | 1           | 1           |  |
| 29  | 201S11007 | SK229    | Upper looper set screw               | 1            | 1           | 1           |  |
| 30  | 20117007  | LP26     | Looper                               | 1            | 1           | 1           |  |
| 31  | 20104006  | KJ11B-E  | Upper looper crank bearing           | 0            | 1           | 1           |  |
|     | 20104007  | KG09B-E  | Upper looper crank bearing           | 1            | 0           | 0           |  |
| 32  | 201S20006 | SK385    | Shaft screw                          | 8            | 8           | 8           |  |
| 33  | 201S11035 | SK408    | Screw                                | 2            | 2           | 2           |  |
| 34  | 201S12007 | SK298    | Upper looper crank screw             | 1            | 1           | 1           |  |
| 35  | 20128021  | WK11     | Washer                               | 1            | 1           | 1           |  |
| 36  | S10005    | SK216    | Link pin set screw                   | 1            | 1           | 1           |  |
| 37  | 201S13003 | S102     | Nexagon socket screw                 | 3            | 3           | 3           |  |
| 38  | 201S12005 | SK261    | Upper looper shaft screw             | 1            | 1           | 1           |  |
| 39  | 201S11016 | SK257    | Thread guide screw                   | 3            | 3           | 3           |  |
| 40  | 201S11014 | SK262    | Screw                                | 2            | 2           | 2           |  |
| 41  | 201S11006 | SK223    | Thread guide screw                   | 2            | 2           | 2           |  |
| 42  | 20128020  | WK09     | Thread guide washer                  | 2            | 2           | 2           |  |



# **Lower Looper Assemblies**

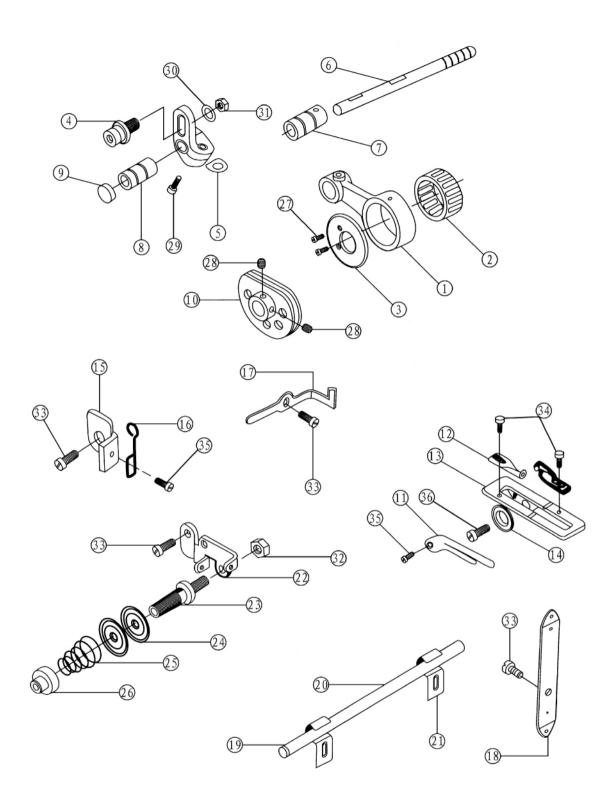
|     |           | ;        |                               |              | (Numb       | er)         |
|-----|-----------|----------|-------------------------------|--------------|-------------|-------------|
|     | David NO  | Ref.Part | Description                   |              | _           |             |
| NO. | Part NO.  | NO.      |                               | Three-thread | Four-thread | Five-thread |
| 1   | 20128009  | KJ13F    | Washer                        | 1            | 1           | 1           |
| 2   | 20128007  | KJ16     | Lower looper shaft washer     | 1            | 1           | 1           |
| 3   | 20622019  | KL20     | Oil seal                      | 1            | 1           | 1           |
| 4   | 20103011  | KL21     | Lower looper front bushing    | 1            | 1           | 1           |
| 5   | 20103015  | KN11     | Left horizontal shaft bushing | 1            | 1           | 1           |
| 6   | 20104008  | KL23-3   | Lower looper holder           | 1            | 1           | 0           |
|     | 20104025  |          | Lower looper holder           | 0            | 0           | 1           |
| 7   | 20104009  | KL612    | Lower looper crank            | 1            | 1           | 0           |
|     | 20104010  | KL09B    | Lower looper crank            | 0            | 0           | 1           |
| 8   | 20117008  | KL25     | Lower looper                  | 1            | 1           | 0           |
|     | 20117009  |          | Lower looper                  | 0            | 0           | 1           |
| 9   | 201S11007 | SK230    | Crank screw                   | 0            | 0           | 2           |
| 10  | 20113015  | KL38     | Thread guide                  | 1            | 1           | 1           |
| 11  | 20113016  | KL43     | Lower looper thread guide     | 1            | 1           | 1           |
| 12  | 20113017  | KL46     | Lower looper3-thread guide    | 1            | 1           | 1           |
| 13  | 20102007  | KL57     | Lower looper shaft            | 1            | 1           | 0           |
|     | 20102008  | KL16     | Lower looper shaft            | 0            | 0           | 1           |
| 14  | 201S12005 | SK261    | Low looper shaft screw        | 1            | 1           | 1           |
| 15  | 201S13003 | SK612    | Crank screw                   | 1            | 1           | 1           |
| 16  | 201S12007 | SK298    | Lower looper holder screw     | 1            | 1           | 1           |
| 17  | 20128021  | WK11     | Lower looper holder washer    | 2            | 2           | 2           |
| 18  | 206S11002 | SK241    | Lower looper                  | 1            | 1           | 1           |
| 19  | 201S11016 | SK257    | Thread guide screw            | 1            | 1           | 1           |
| 20  | 301S30013 | 200152   | Crank screw                   | 0            | 0           |             |





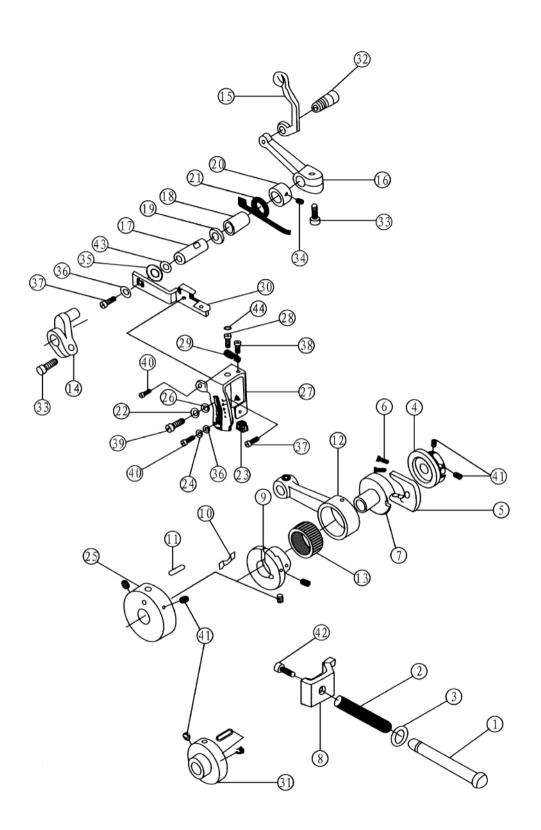
# **Front Looper Assemblies**

|     | -         |                   |                                  | (Number)     |             |             |  |
|-----|-----------|-------------------|----------------------------------|--------------|-------------|-------------|--|
| -   | David NO  | Part NO. Ref.Part | Ref.Part Description             |              |             |             |  |
| NO. | Part NO.  | NO.               |                                  | Three-thread | Four-thread | Five-thread |  |
| 1   | 20104011  | KM01              | Front looper shaft holder        | 0            | 0           | 1           |  |
| 2   | 20117010  | KM04              | Front looper                     | 0            | 0           | 1           |  |
| 3   | 20128014  | KM06              | Washer                           | 0            | 0           | 1           |  |
| 4   | 20104012  | KM08              | Front looper crank               | 0            | 0           | 1           |  |
| 5   | 20609017  | KM11              | Regulating plate                 | 0            | 0           | 1           |  |
| 6   | 20126013  | KM12              | Regulating plate pin             | 0            | 0           | 2           |  |
| 7   | 20108001  | KF07              | Snap ring                        | 0            | 0           | 1           |  |
| 8   | 20103013  | KM17              | Front looper shaft front bushing | 0            | 0           | 1           |  |
| 9   | 20103014  | KM18              | Front looper shaft rear bushing  | 0            | 0           | 1           |  |
| 10  | 20102009  | KM26              | Front looper shaft               | 0            | 0           | 1           |  |
| 11  | 20101021  | KM27D             | Driving lever                    | 0            | 0           | 1           |  |
| 12  | 20104013  | KM28              | Driving crank                    | 0            | 0           | 1           |  |
| 13  | 20109002  | KM29D             | Front looper slide block         | 0            | 0           | 1           |  |
| 14  | 201S11003 | SK209             | Thread guide screw               | 0            | 0           | 1           |  |
| 15  | 201S11008 | SK230             | Front looper guide set screw     | 0            | 0           | 1           |  |
| 16  | 201S12007 | SK298             | Front looper holder set screw    | 0            | 0           | 1           |  |
| 17  | 20128021  | WK11              | Washer                           | 0            | 0           | 1           |  |
| 18  | 201S12002 | SK251             | Front looper crank screw         | 0            | 0           | 4           |  |
| 19  | 201S13003 | SK612             | Crank holder set screw           | 0            | 0           | 1           |  |
| 20  | 201S14002 | SK270             | Driving lever set screw          | 0            | 0           | 1           |  |
| 21  | 201S30009 | SK499             | Driving lever set screw          | 0            | 0           | 1           |  |
| 22  | 20129003  | EK03              | Snap ring                        | 0            | 0           | 1           |  |
| 23  | 201S12005 | SK261             | Screw                            | 0            | 0           | 1           |  |
| 24  | 20126022  |                   | Regulating plate pin             | 0            | 0           | 1           |  |



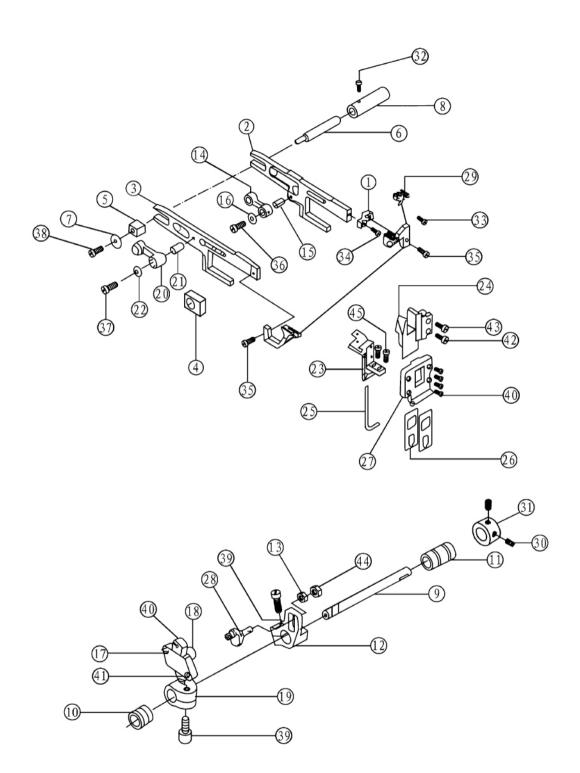
## **Cam Assemblies**

|     |            |          |                                | (Number)     |             |             |  |
|-----|------------|----------|--------------------------------|--------------|-------------|-------------|--|
|     | Part NO.   | Ref.Part | Description                    |              |             |             |  |
| NO. | rait No.   | NO.      |                                | Three-thread | Four-thread | Five-thread |  |
| 1   | 20105003   | KN01     | Horizontal shaft link          | 0            | 0           | 1           |  |
| 2   | 20124002   | KN02     | Needle bearing                 | 0            | 0           | 1           |  |
| 3   | 20112028   | KN03     | Snap ring                      | 0            | 0           | 1           |  |
| 4   | 20126014   | KN05     | Pin                            | 0            | 0           | 1           |  |
| 5   | 20104014   | KN08     | Horizontal shaft crank         | 0            | 0           | 1           |  |
| 6   | 20102010   | KN10     | Horizontal shaft               | 0            | 0           | 1           |  |
| 7   | 20103015   | KN11     | Left horizontal shaft bushing  | 0            | 0           | 1           |  |
| 8   | 20103016   | KN12     | Right horizontal shaft bushing | 0            | 0           | 1           |  |
| 9   | 20122028   | KN13     | Oil seal                       | 0            | 0           | 1           |  |
| 10  | 2011301800 | KM8      | Looper thread take-up cam      | 0            | 0           | 1           |  |
| 11  | 20113020   | KN20     | Thread guide                   | 0            | 0           | 1           |  |
| 12  | 20113021   | KN22     | Thread                         | 0            | 0           | 2           |  |
| 13  | 20112029   | KN24     | Bracket                        | 0            | 0           | 1           |  |
| 14  | 20128015   | KN26     | Flat spring                    | 0            | 0           | 1           |  |
| 15  | 20112030   | KN27     | Astrict position plate         | 0            | 0           | 1           |  |
| 16  | 20113022   | KN29     | Thread guide ring              | 0            | 0           | 1           |  |
| 17  | 20113023   | KN32     | Thread guide                   | 0            | 0           | 1           |  |
| 18  | 20113024   | KN34     | Thread guide                   | 0            | 0           | 1           |  |
| 19  | 20113025   | KN36-1   | Thread pipe cover              | 0            | 0           | 2           |  |
| 20  | 20113026   | KN36-2   | Thread pipe                    | 0            | 0           | 1           |  |
| 21  | 20112031   | KN37     | Bracket                        | 0            | 0           | 2           |  |
| 22  | 20112032   | KN38     | Bracket                        | 0            | 0           | 1           |  |
| 23  | 201S30012  | KN40     | Screw                          | 0            | 0           | 1           |  |
| 24  | 20112033   | KN42     | Tension disc                   | 0            | 0           | 2           |  |
| 25  | 20127007   | KN43     | Spring                         | 0            | 0           | 1           |  |
| 26  | 201S16007  | KN44     | Nut                            | 0            | 0           | 1           |  |
| 27  | 201S17001  | SK205    | Bearing snap ring screw        | 0            | 0           | 2           |  |
| 28  | 201S14001  | SK216    | Cam set screw                  | 0            | 0           | 2           |  |
| 29  | 201S13003  | SK612    | Crank set screw                | 0            | 0           | 1           |  |
| 30  | 20128033   | WK11     | Washer                         | 0            | 0           | 1           |  |
| 31  | 201S16002  | WK04     | Nut                            | 0            | 0           | 1           |  |
| 32  | 201S16003  | NK26     | Nut                            | 0            | 0           | 1           |  |
| 33  | 201S11014  | SK257    | Screw                          | 0            | 0           | 4           |  |
| 34  | 201S11001  | SK207    | Thread guide plate screw       | 0            | 0           | 2           |  |
| 35  | 201S11009  | SK233    | Thread guide plate screw       | 0            | 0           | 2           |  |
| 36  | 201S20001  | SK264    | Screw                          | 0            | 0           | 1           |  |



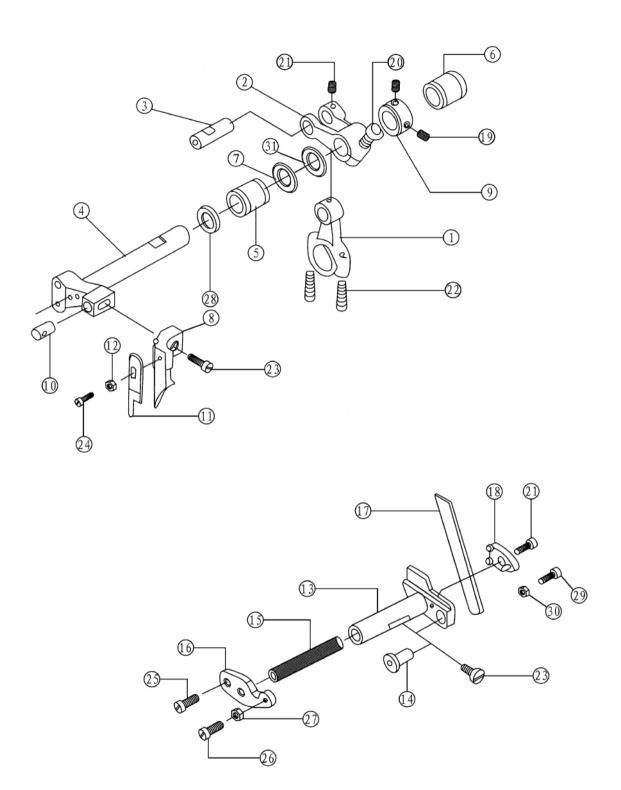
## **Different Feed Assemblies**

|     |            | 1               |                                       | (Number)     |             |             |  |
|-----|------------|-----------------|---------------------------------------|--------------|-------------|-------------|--|
| NO. | Part NO.   | Ref.Part<br>NO. | Description                           | Three-thread | Four-thread | Five-thread |  |
| 1   | 20102011   | KP01            | Stitch length regulating shaft        | 1            | 1           | 1           |  |
| 2   | 20127008   | KP02            | Spring Spring                         | 1            | 1           | 1           |  |
| 3   | O01016     | KP03            | Oil washer                            | 1            | 1           | 1           |  |
| 4   | 2011000100 | KP05D           | Stitch length regulation cam asm      | 1            | 1           | 1           |  |
| 5   | 20109004   | KP06D           | Stitch length regulating block        | 1            | 1           | 1           |  |
| 6   | 20127009   | KP08            | Stitch length regulating block spring | 2            | 2           | 2           |  |
| 7   | 20110002   | KP09D           | Stitch length cam                     | 1            | 1           | 1           |  |
| 8   | 20112034   | KP11            | Stitch length regulating plate        | 1            | 1           | 1           |  |
| 9   | 20110003   | KP13D           | Feed length cam                       | 1            | 1           | 1           |  |
| 10  | 20112035   | KP15            | Feed cam spring                       | 1            | 1           | 1           |  |
| 11  | P01004     | KP18-1          | Feed cam pin                          | 1            | 1           | 1           |  |
| 12  | 20105004   | KP21            | Feed link                             | 1            | 1           | 1           |  |
| 13  | B07007     | KP22            | Feed rod rolling pin bearing          | 1            | 1           | 1           |  |
| 14  | 20104015   | KP23            | Feed crank                            | 1            | 1           | 1           |  |
| 15  | 20105005   | KP25            | Differential link                     | 1            | 1           | 1           |  |
| 16  | 20104016   | KP28            | Differential crank                    | 1            | 1           | 1           |  |
| 17  | 20102012   | KP30B           | Differential shaft                    | 1            | 1           | 1           |  |
| 18  | 20103017   | KP31            | Differential shaft bearing            | 1            | 1           | 1           |  |
| 19  | 20122029   | KP32            | Oil seal                              | 1            | 1           | 1           |  |
| 20  | 20108005   | KP34            | Snap ring                             | 1            | 1           | 1           |  |
| 21  | 20127010   | KP35D           | Spring                                | 1            | 1           | 1           |  |
| 22  | 201S16008  | KP39            | Washer                                | 1            | 1           | 1           |  |
| 23  | 20109005   | KP43            | Regulating block                      | 1            | 1           | 1           |  |
| 24  | 20128027   | KP46            | Washer                                | 1            | 1           | 1           |  |
| 25  | 20110004   | KP59            | Feed bam                              | 1            | 1           | 0           |  |
| 26  | 20128028   | KP60            | Washer                                | 1            | 1           | 1           |  |
| 27  | 20112036   | KP62            | Differential regulation holder        | 1            | 1           | 1           |  |
| 28  | 201S30013  | KP63            | Regulating screw                      | 1            | 1           | 1           |  |
| 29  | 20127011   | KP64            | Regulating screw spring               | 1            | 1           | 1           |  |
| 30  | 20112037   | KP65B           | Differential regulating link          | 1            | 1           | 1           |  |
| 31  | 2010402300 | KP18-2          | Crank link cam                        | 0            | 0           | 1           |  |
| 32  | 201S20008  | SK452           | Differential link screw               | 1            | 1           | 1           |  |
| 33  | 201S13003  | SK612           | Differential crank screw              | 2            | 2           | 2           |  |
| 34  | 201S12002  | SK251           | Snap ring screw                       | 1            | 1           | 1           |  |
| 35  | 20128024   | WK24            | Washer                                | 1            | 1           | 1           |  |
| 36  | W01006     | WK01            | Washer                                | 2            | 2           | 2           |  |
| 37  | 201S11016  | SK262           | Differential position screw           | 1            | 1           | 1           |  |
| 38  | 201S11005  | SK221           | Spring screw 1  Spring screw 1        |              | 1           | 1           |  |
| 39  | 201S30005  | SK399           | Differential regulating screw         | 1            | 1           | 1           |  |
| 40  | 201S11018  | SK262           | Differential regulating screw         | 1            | 1           | 1           |  |
| 41  | 201S14002  | SK215           | Screw                                 | 4            | 4           | 4           |  |
| 42  | 201S12005  | SK261           | Screw                                 | 1            | 1           | 1           |  |
| 43  | 20122038   |                 | Washer                                | 1            | 1           | 1           |  |
| 44  | 20137004   |                 | Mard plate                            | 1            | 1           | 1           |  |



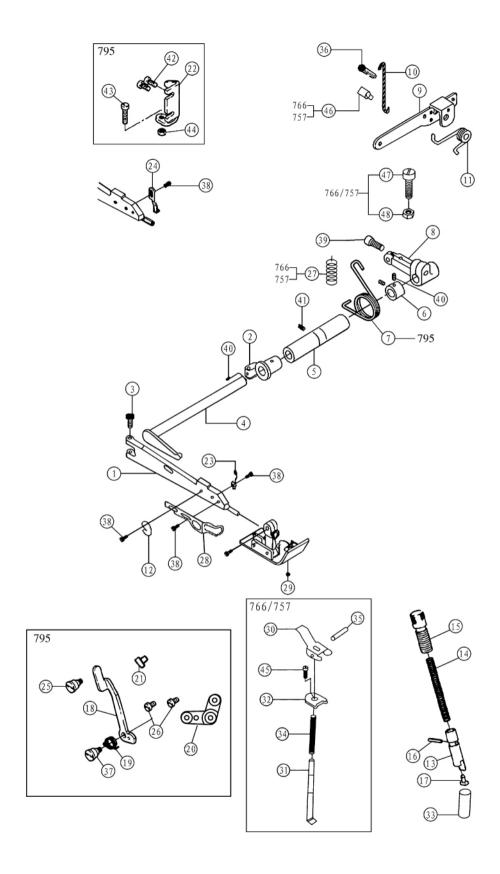
# **Feed Dog Assemblies**

|     |            |              |   | (Number)     |             |             |  |
|-----|------------|--------------|---|--------------|-------------|-------------|--|
|     | Part NO.   | Ref.Part     | Description   |              |             |             |  |
| NO. |            | NO.          | <b>p</b>  | Three-thread | Four thread | Five-thread |  |
|     | 20109006   | KQ05         | Dog link plate  |              |             |             |  |
| 2   | 20109000   | _            | Dog link plate Feed dog holder                            | 1            | 1           | 1           |  |
|     |            | KQ07         |   | 1            | 1           |             |  |
| 3   | 20106002   | KQ10         | Differential feed dog holder                              |              |             | 1           |  |
| 5   | 20109007   |              | Feed dog lift slide block                                 |              |             | 1           |  |
| 6   | 20109008   | KQ14         | Differential feed slide block Slide block eccentric shaft | 1            | 1           | 1           |  |
| 7   | 20102013   | KQ15         | Slide block eccentric shart  Slide block eccentric washer | 1            | 1           | 1           |  |
| 8   | 20112038   | KQ17         | Slide block eccentric shaft bushing                       | 1            | 1           | 1           |  |
| 9   | 20103018   | KQ19<br>KQ21 | Feed shaft  | 1            | 1           | 1           |  |
| 10  | 20102014   |              |   | 1            | 1           | 1           |  |
| 11  | 20103019   | KQ24         | Left feed shaft bushing                                   | 1            | 1           | 1           |  |
| 12  |            | KQ25         | Right feed shaft bushing                                  | 1            | 1           |             |  |
| 13  | 20104017   | KQ28         | Feed regulating crank                                     | 1            | 1           | 1           |  |
| 14  | 20128021   | KQ31         | Washer Earl day halder link                               | 1            | 1           | 1           |  |
|     | 20105006   | KQ33         | Feed dog holder link                                      | 1            |             |             |  |
| 15  | 20103021   | KQ34         | Feed dog holder link bushing                              |              | 1           | 1           |  |
| 16  | 20128029   | KQ35         | Differential feed dog holder link bushing                 | 1            | 1           | 1           |  |
| 17  | 20112039   | KQ37-1       | Crank slide block cover                                   | 1            | 1           | 1           |  |
| 18  | 20109010   | KQ37-2       | Crank slide block   | 1            | 1           | 1           |  |
| 19  | 20104018   | KQ37-3       | Feed regulating crank                                     | 1            | 1           | 1           |  |
| 20  | 20105007   | KQ40         | Differential feed dog holder link                         | 1            | 1           | 1           |  |
| 21  | 20103022   | KQ41         | Differential feed dog holder link bushing                 | 1            | 1           | 1           |  |
| 22  | 20128030   | KQ42         | holder link bushing washer                                | 2            | 2           | 2           |  |
| 23  | 20101023   | KQ46D        | Screw oil plate   | 1            | 1           | 1           |  |
| 24  | 20109011   | KQ47         | Feed dog carrier connection rod                           | 1            | 1           | 1           |  |
| 25  | 20122030   | KQ48         | Sealing connecting ring                                   | 1            | 1           | 1           |  |
| 26  | 20122031   | KQ49         | Adjustable oil seal                                       | 2            | 2           | 2           |  |
| 27  | 20109012   | KQ50         | Sealing connecting rod                                    | 1            | 1           | 1           |  |
| 28  | 20102015   | KQ90         | Feed dog link eccentric shaft                             | 1            | 1           | 1           |  |
| 29  | 2011401700 |              | Feed form   | 1            | 1           | 0           |  |
|     | 2011401800 |              | Feed form   | 1            | 0           | 0           |  |
|     | 2011401900 |              | Feed form   | 0            | 0           | 1           |  |
|     | 2011402000 |              | Feed form   | 0            | 0           | 1           |  |
| 30  | 201S15003  | SK293        | Snap ring screw   | 2            | 2           | 2           |  |
| 31  | 20108002   | KF21         | Snap ring   | 1            | 1           | 1           |  |
| 32  | 201S12002  | SK251        | Screw   | 1            | 1           | 1           |  |
| 33  | 201S11003  | SK209        | Screw   | 1            | 1           | 1           |  |
| 34  | 201S11012  | SK241        | Screw   | 1            | 1           | 1           |  |
| 35  | 201S11038  | SK576        | Main feed dog screw                                       | 2            | 2           | 2           |  |
| 36  | 201S12003  | SK253        | Screw   | 1            | 1           | 1           |  |
| 37  | 201S12004  |              | Screw   | 1            | 1           | 1           |  |
| 38  | 201S17003  | SK212        | Screw   | 1            | 1           | 1           |  |
| 39  | 201S13003  | SK612        | Crank screw   | 2            | 2           | 2           |  |
| 40  | 201S11005  | SK221        | Crank screw   | 4            | 4           | 4           |  |
| 41  | 201S11032  | SK343        | Crank slide block screw                                   | 2            | 2           | 2           |  |
| 42  | 201S11018  | SK262        | Tooth rocks screw II                                      | 1            | 1           | 1           |  |
| 43  | 201S11023  | SK277        | Tooth rocks screw I                                       | 1            | 1           | 1           |  |
| 44  | 201S16002  | NK25         | Nut   | 1            | 1           | 1           |  |
| 45  | 201S11016  | SK257        | Screw   | 2            | 2           | 2           |  |



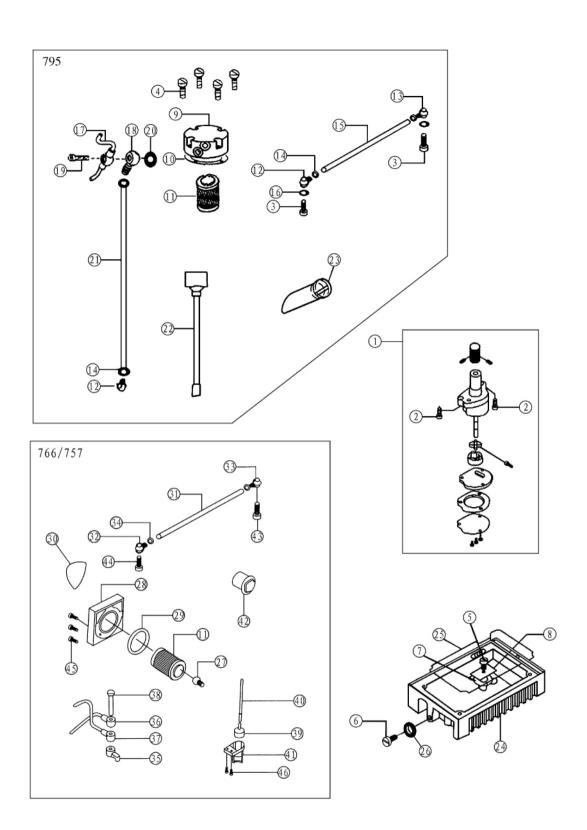
# **Trimming Assemblies**

|     |           |          | 8                                   |              | (Numb       | er)         |
|-----|-----------|----------|-------------------------------------|--------------|-------------|-------------|
|     | i         | Ref.Part | Description                         |              |             |             |
| NO. | Part NO.  | NO.      |                                     | Three-thread | Four-thread | Five-thread |
| 1   | 20105008  | KR01     | Upper knife driving connecting link | 1            | 1           | 1           |
| 2   | 20104019  | KR04     | Upper knife crank                   | 1            | 1           | 0           |
|     | 20104020  | KR03     | Upper knife crank                   | 0            | 0           | 1           |
| 3   | 20126015  | KR07     | Crank pin                           | 1            | 1           | 1           |
| 4   | 20102017  | KR09     | Upper knife frame rock shaft        | 1            | 1           | 1           |
| 5   | 20103023  | KR12     | Left shaft bushing                  | 1            | 1           | 1           |
| 6   | 20103024  | KR13     | Right shaft bushing                 | 1            | 1           | 1           |
| 7   | 20128031  | KR14     | Washer                              | 1            | 1           | 1           |
| 8   | 20101024  | KR20     | Upper knife holder                  | 1            | 1           | 0           |
|     | 20101025  | KR19     | Upper knife holder                  | 0            | 0           | 1           |
|     | 20101053  |          | Upper knife holder                  | 0            | 0           | 1           |
| 9   | 20108002  | KR21     | Snap ring                           | 1            | 1           | 1           |
| 10  | 20126016  | KR22     | Upper knife holder pin              | 1            | 1           | 1           |
| 11  | 20119001  | KR23     | Upper knife                         | 1            | 1           | 1           |
|     | 20119005  |          | Upper knife                         | 0            | 0           | 1           |
| 12  | 20128020  | WK09     | Washer                              | 1            | 1           | 1           |
| 13  | 20102018  | KR27     | Lower knife holder                  | 1            | 1           | 0           |
|     | 20102019  | KR26     | Lower knife holder                  | 0            | 0           | 1           |
|     | 20102023  |          | Lower knife holder                  | 1            | 1           | 0           |
| 14  | 20103025  | KR29     | Lower knife holder bushing          | 1            | 1           | 1           |
| 15  | 20127012  | KR32     | Lower knife holder spring           | 1            | 1           | 1           |
| 16  | 20112040  | KR33     | Lower knife holder                  | 1            | 1           | 1           |
| 17  | 20119002  | KR35     | Lower knife                         | 1            | 1           | 1           |
|     | 20119006  |          | Lower knife                         | 0            | 0           | 1           |
| 18  | 20101026  | KR36     | Lower knife holder lock plate       | 1            | 1           | 1           |
| 19  | 201S15003 | SK293    | Snap ring screw                     | 2            | 2           | 2           |
| 20  | 201S13003 | SK612    | Upper knife crank set screw         | 1            | 1           | 1           |
| 21  | 201S12005 | SK270    | Upper knife crank pin screw         | 2            | 2           | 2           |
| 22  | 201S20006 | SK385    | Connecting link screw               | 2            | 2           | 2           |
| 23  | 201S11022 | SK277    | Upper knife holder screw            | 2            | 2           | 2           |
| 24  | 201S12001 | SK246    | Upper knife screw                   | 1            | 1           | 1           |
| 25  | 201S11017 | SK262    | Lower knife snap plate screw        | 1            | 1           | 1           |
| 26  | 201S11012 | SK241    | Lower knife snap plate screw        | 1            | 1           | 1           |
| 27  | 201S16001 | NK23     | Lower knife snap plate screw        | 1            | 1           | 1           |
| 28  | 20122038  | KF19     | Oil seal                            | 1            | 1           | 1           |
| 29  | 201S11015 | SK256    | Lower knife holder screw            | 1            | 1           | 1           |
| 30  | W01006    | KQ35     | Washer                              | 1            | 1           | 0           |
|     | 20128025  |          | Washer                              | 0            | 0           | 1           |
| 31  | 20628014  | KR14     | Washer                              | 1            | 1           | 1           |



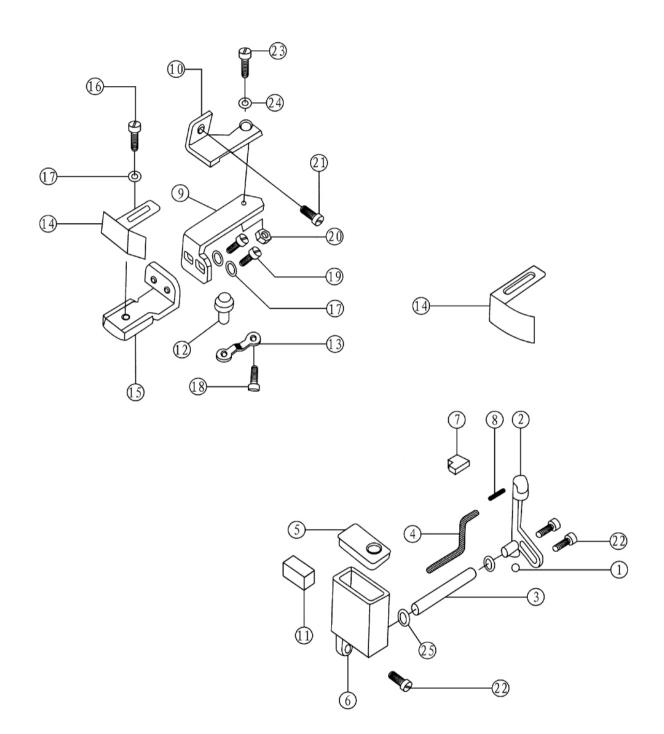
## **Presser foot Assemblies**

|     | 7                      |                 |  | (Number) |             |             |  |
|-----|------------------------|-----------------|--|----------|-------------|-------------|--|
| NO. | Part NO.               | Ref.Part        | Description                            |          |             | Fi - 1 - 1  |  |
|     |                        | NO.             |  |          | Four-thread | Five-thread |  |
| 1   | 20101027               | KS01            | Presser foot holder                    | 1        | 1           | 1           |  |
| 2   | 20103026               | KS02D           | Presser foot shaft bushing             | 1        | 1           | 1           |  |
| 3   | 201511004              | KS03            | Screw                                  | 1        | 1           | 1           |  |
| 4   | 20102020               | KS09            | Presser foot holder shaft              | 1        | 1           | 1           |  |
| 5   | 20103027               | KS10D           | Presser foot shaft bushing             | 1        | 1           | 1           |  |
| 7   | 20108006               | KS12            | Presser foot shaft snap ring           | 1        | 1           | 1           |  |
|     | 20127013               | KP35D           | Presser foot lifting spring            | 1        | 1           | 1           |  |
| 8   | 20104021               | KS14F<br>KS18   | Presser foot crank                     | 1        | 1           | 1           |  |
| 10  | 20112041               | KS20            | Presser foot lifting lever             | 1        | 1           | 1           |  |
|     | 20120018               | KS20            | Hook                                   | 1        | 1           | 1           |  |
| 11  | 2012/014               | KS21<br>KS24    | Spring                                 | 1        | 1           | 1           |  |
| 13  |                        | KS24<br>KS26-2D | Thread cutting knife                   | 1        | 1           | 1           |  |
|     | 20102021               | KS20-2D<br>KS27 | Presser bar                            | 1        | 1           | 1           |  |
| 14  | 20127015               |                 | Presser bar spring                     | 1        | 1           | 1           |  |
| 15  | 201S30014              | KS28            | Presser bar screw                      | 1        | 1           | 1           |  |
| 1.6 | 203S30001<br>203S20001 | KS28<br>SK439   | Presser bar screw                      | 1        | 1           | 1           |  |
| 16  |                        |                 | Screw                                  | 1        | 1           | 1           |  |
| 17  | 201S20009              | 274012          | Screw                                  | 1        | 1           | 1           |  |
| 17  | 20611006               | 274013          | Presser bar shockproof block           | 1        | 1           | 1           |  |
| 18  | 20112074               | 274017          | Presser foot lifting handle            | 1        | 1           | 1           |  |
| 19  | 20627010               | 274017          | Presser foot lifting handle spring     | 1        | 1           | 1           |  |
| 20  | 20101052               | 240122          | Presser foot lifting handle restricter | 1        | 1           | 1           |  |
| 21  | 30122018               | 240123          | Washer                                 | 1        | 1           | 1           |  |
| 22  | 20612031               | 209676          | Presser foot corner plate              | 1        | 1           | 1           |  |
| 23  | 20127016               | KS44            | Presser foot spring                    | 0        | 0           | 1           |  |
| 24  | 20112042               | KS54            | Presser foot holder connection plate   | 1        | 1           | 0           |  |
| 25  | 206S20007              |                 | Screw                                  | 1        | 1           | 1           |  |
| 26  | S02003                 | S157            | Screw                                  | 2        | 2           | 2           |  |
| 27  | 20327001               | KS13            | Presser foot lifting spring            | 1        | 1           | 1           |  |
| 28  | 20112045               | KS65            | Presser foot holder cover              | 1        | 1           | 1           |  |
| 29  | 20116001               | P253E-3         | Presser foot form                      | 1        | 0           | 0           |  |
|     | 20116002               | P253E-4         | Presser foot form                      | 0        | 1           | 0           |  |
|     | 20116003               | P504-A          | Presser foot form                      | 0        | 0           | 1           |  |
|     | 20116006               |                 | Presser foot form                      | 1        | 0           | 0           |  |
|     | 20116007               |                 | Presser foot form                      | 0        | 0           | 1           |  |
|     | 20516015               |                 | Presser foot form                      | 0        | 0           | 1           |  |
|     | 20116004               |                 | Presser foot form                      | 1        | 0           | 0           |  |
|     | 20116005               |                 | Presser foot form                      | 0        | 1           | 0           |  |
| 30  | 20312001               | KS29            | Presser foot lifting handle            | 1        | 1           | 1           |  |
| 31  | 20326001               | KS30D           | Presser foot lifting anh               | 1        | 1           | 1           |  |
| 32  | 20312002               | KS31E           | Presser foot lifting handle bracket    | 1        | 1           | 1           |  |
| 33  | 20103028               | KS32            | Presser bar bushing                    | 1        | 1           | 1           |  |
| 34  | 20327002               | KS34            | Presser foot lifting spring            | 1        | 1           | 1           |  |
| 35  | P03028                 |                 | Pin                                    | 1        | 1           | 1           |  |
| 36  | 201S20004              | SK296           | Set screw                              | 1        | 1           | 1           |  |
| 37  | 201S30020              |                 | Lifting handle screw                   | 1        | 1           | 1           |  |
| 38  | 201S11005              | SK221           | Screw                                  | 3        | 3           | 3           |  |
| 39  | 201S12007              | SK298           | Crank set screw                        | 1        | 1           | 1           |  |
| 4.5 | 201S13003              |                 | Crank set screw                        | 1        | 1           | 1           |  |
| 40  | S10005                 | 005292-HV       | Snap washer screw                      | 3        | 3           | 3           |  |
| 41  | 201S14002              |                 | Screw                                  | 1        | 1           | 1           |  |
| 42  | 201S11016              | SK257           | Set plate screw                        | 2        | 2           | 2           |  |
| 43  | S01023                 | 7175            | Screw                                  | 1        | 1           | 1           |  |
| 44  | 206S16005              |                 | Nut                                    | 1        | 1           | 1           |  |
| 45  | 201S11035              | SK408           | Screw                                  | 1        | 1           | 1           |  |
| 46  | 203S30002              | SK255           | Screw                                  | 1        | 1           | 1           |  |
| 47  | 203S12001              | SK331           | Screw                                  | 1        | 1           | 1           |  |
| 48  | 201S16003              | NK26            | Nut                                    | 1        | 1           | 1           |  |



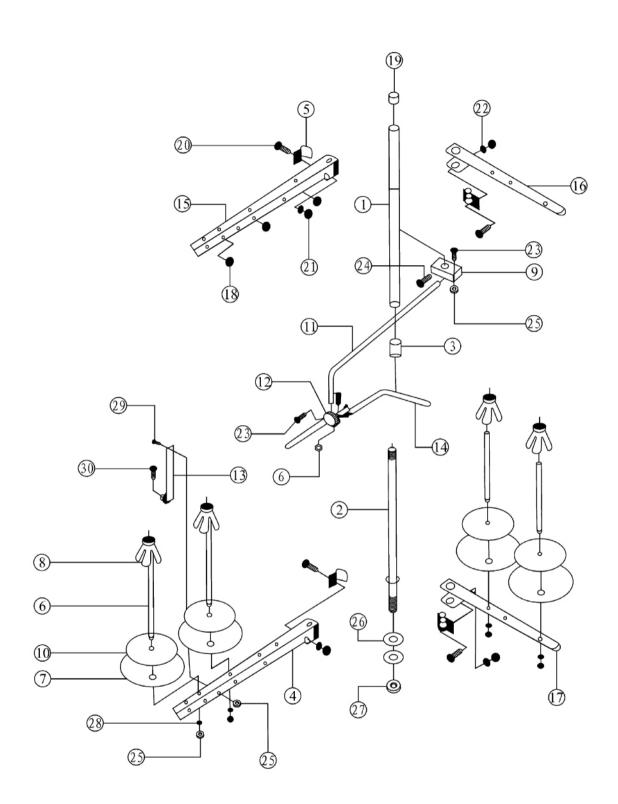
## **Lubrication Assemblies**

|     |                        |                      |                             | (Number)     |             |             |  |
|-----|------------------------|----------------------|-----------------------------|--------------|-------------|-------------|--|
|     | Part NO.               | Ref.Part Description |                             |              |             |             |  |
| NO. |                        | NO.                  | •                           | Three-thread | Four-thread | Five-thread |  |
| 1   | 20120001               |                      | Oil pump                    | 1            | 1           | 1           |  |
| 1   | 20320001               |                      | Oil pump                    | 1            | 1           | 1           |  |
| 2   | 201S11025              | SK278                | Oil pump screw              | 2            | 2           | 2           |  |
| 3   | 201S11023<br>201S30004 | SK304                | Oil tube joint screw 4 4    |              |             |             |  |
| 4   | 201530004<br>209S11019 |                      | Oil screen cover screw 4 4  |              |             | 4           |  |
| 5   | 201S11019              | SK265                | Oil pan magnet cover screw  | 1            | 1           | 1           |  |
| 6   | 201511017              | SK310                | Oil pan screw               | 1            | 1           | 1           |  |
| 7   | 10131001               |                      | Oil pan magnet              | 1            | 1           | 1           |  |
| 8   | 20112050               | KT58                 | Oil pan magnet cover        | 1            | 1           | 1           |  |
| 9   | 20101034               |                      | Oil clearer cover           | 1            | 1           | 1           |  |
| 10  | 20101034               |                      | Oil clearer cover seal ring | 1            | 1           | 1           |  |
| 11  | 20122032               | KT14-A               | Oil clearer Oil clearer     | 1            | 1           | 1           |  |
| 12  | 20136001               |                      | Oil tube joint I            | 2            | 2           | 2           |  |
| 13  | 20136002               |                      | Oil tube joint II           | 1            | 1           | 1           |  |
| 14  | 20130003               |                      | Oil tube shape ring         | 4            | 4           | 4           |  |
| 15  | 20129002               |                      | Oil tube                    | 1            | 1           | 1           |  |
| 16  | 2012100600             |                      | Washer                      | 3            | 3           | 3           |  |
| 17  |                        |                      |                             | _            |             |             |  |
| 1 / | 20136004               |                      | Double node oil manager     | 1            | 1           | 1           |  |
| 1.0 | 20121012               |                      | Double node oil manager     | 1            | 1           | 1           |  |
| 18  | 20136005               |                      | Oil tube joint              | 1            | 1           | 1           |  |
| 19  | 201S30015              |                      | oil manager screw           | 1            | 1           | 1           |  |
| 20  | 20122033               |                      | Washer                      | 4            | 4           | 4           |  |
| 21  | 2012100700             |                      | Oil tube                    | 1            | 1           | 1           |  |
| 22  | 20121016               | KA38                 | Oil back tube               | 1            | 1           | 1           |  |
| 23  | 20111010               |                      | Oil observer                | 1            | 1           | 1           |  |
| 24  | 20101035               | KT51B                | Oil pan                     | 1            | 1           | 1           |  |
| 25  | 20122035               | KT52B                | Oil pan washer              | 1            | 1           | 1           |  |
| 26  | 20122036               | KT56                 | Oil seal                    | 1            | 1           | 1           |  |
| 27  | 20121013               |                      | Oil cljerner joint          | 1            | 1           | 1           |  |
| 28  | 300077                 | KT16                 | Oil screen cover            | 1            | 1           | 1           |  |
| 29  | 20322004               | KT17                 | Oil clerner cover seal ring | 1            | 1           | 1           |  |
| 30  | 20337005               | KT18                 | ingicaing plat              | 1            | 1           | 1           |  |
| 31  | 2032100400             |                      | Oil clearer cover           | 1            | 1           | 1           |  |
| 32  | 20136002               |                      | Oil tube joint I            | 1            | 1           | 1           |  |
| 33  | 20136003               |                      | Oil tube joint II           | 1            | 1           | 1           |  |
| 34  | 30129003               | 202199               | Oil tube shap ring          | 1            | 1           | 1           |  |
| 35  | 20301006               | KT38                 | Lubrcate bushing            | 1            | 1           | 1           |  |
| 36  | 20321002               | KT22                 | Upper screem                | 1            | 1           | 1           |  |
| 37  | 20321003               | KT39-2               | lower screem                | 1            | 1           | 1           |  |
| 38  | 203S30004              | SK286                | Oil screem screw 1 1        |              | 1           |             |  |
| 39  | 20311005               | KT46E                | Oil show bracket 1 1        |              | 1           |             |  |
| 40  | 20311006               | KT47E                | Oil show cleaner link 1 1   |              | 1           |             |  |
| 41  | 20312003               | KT49D                | Oil show cleaner guard 1 1  |              | 1           |             |  |
| 42  | 20311008               | KT74                 | Oil dial 1 1                |              | 1           | 1           |  |
| 43  | 203S30003              | SK419                | Screw                       | 1            | 1           | 1           |  |
| 44  | 201S30004              | SK304                | Screw                       | 1            | 1           | 1           |  |
| 45  | 201S11019              | SK265                | Screw                       | 3            | 3           | 3           |  |
| 46  | 201S11014              | SK250                | Screw                       | 2            | 2           | 2           |  |



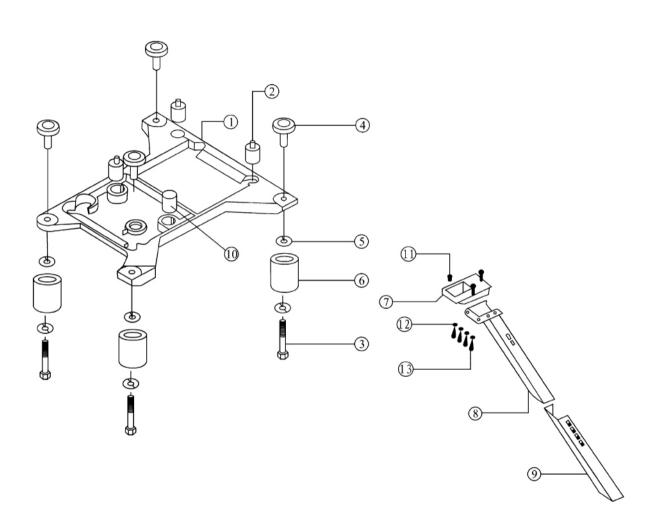
# **Feed Snap Assemblies**

| ,   |           |                 |                          |              | (Numb       | er)         |
|-----|-----------|-----------------|--------------------------|--------------|-------------|-------------|
| NO. | Part NO.  | Ref.Part<br>NO. | Description              | Three-thread | Four-thread | Five-thread |
| 1   | 20123012  | KU02            | Oil seal                 | 1            | 1           | 1           |
| 2   | 20101037  | KU14            | Needle cooler            | 1            | 1           | 0           |
|     | 20101038  | KU15            | Needle cooler            | 0            | 0           | 1           |
| 3   | 20121019  | KU20            | Oil tube backer          | 1            | 1           | 1           |
| 4   | 20123021  | KU22            | Oil wick                 | 1            | 1           | 1           |
| 5   | 20111011  | KU23-1B         | Lower oil box cover      | 1            | 1           | 1           |
| 6   | 20111012  | KU23-2B         | Lower oil box            | 1            | 1           | 1           |
| 7   | 20123014  | KU24            | Oil felt                 | 1            | 1           | 0           |
|     | 20123015  | KU25            | Oil felt                 | 0            | 0           | 1           |
| 8   | 20123021  | KU26            | Oil wick                 | 1            | 1           | 1           |
| 9   | 20112051  | KU27D           | Cloth guide holder       | 1            | 1           | 1           |
| 10  | 20112052  | KU28D           | Hinge plate              | 1            | 1           | 1           |
| 11  | 20123017  | KU29            | Oil felt block           | 1            | 1           | 1           |
| 12  | 20126020  | KU34            | Hinge pin                | 1            | 1           | 1           |
| 13  | 20112053  | KU35            | Hinge spring             | 1            | 1           | 1           |
| 14  | 20112054  | KU40            | Snap plate               | 1            | 1           | 0           |
|     | 20112055  | KU39            | Snap plate               | 0            | 0           | 1           |
|     | 20112071  |                 | Snap plate               | 1            | 1           | 0           |
| 15  | 20112056  | KU43            | Snap plate bracket       | 1            | 1           | 1           |
| 16  | 201S11009 | SK233           | Screw                    | 1            | 1           | 1           |
| 17  | 20128020  | WK09            | Washer                   | 3            | 3           | 3           |
| 18  | 201S11011 | SK239           | Hinge spring screw       | 1            | 1           | 1           |
| 19  | 201S12001 | SK246N          | Hinge screw              | 2            | 2           | 2           |
| 20  | 201S16003 | NK26            | Nut 1                    |              | 1           | 1           |
| 21  | 201S11016 | SK277N          | Cloth guide holder screw |              | 1           | 1           |
| 22  | 201S11018 | SK262           | Needle cooler screw      | 3            | 3           | 3           |
| 23  | 201S20002 | SK266           | Cloth guide holder screw | 1            | 1           | 1           |
| 24  | 20128027  | KP46            | Washer                   | 1            | 1           | 1           |
| 25  | 20129002  | KT26            | Oil tube shape ring      | 2            | 2           | 2           |



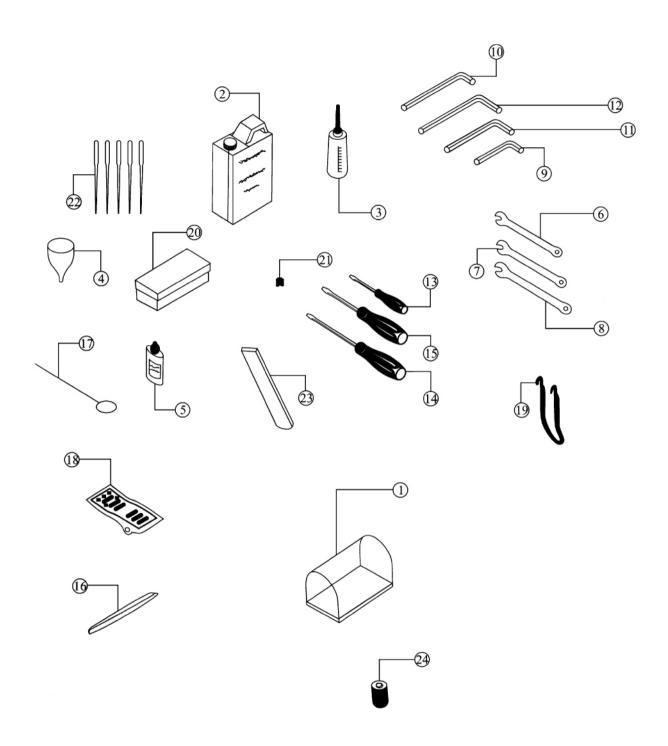
# **Thread Spool Assemblies**

|     |           | ,               |                                |              | (Numb       | er)         |  |  |
|-----|-----------|-----------------|--------------------------------|--------------|-------------|-------------|--|--|
| NO. | Part NO.  | Ref.Part<br>NO. | Description                    | Three-thread | Four-thread | Five-thread |  |  |
| 1   | 20131001  | KW01E           | Upper thread column            | 1            | 1           | 1           |  |  |
| 2   | 20131002  | KW02E           | Lower thread column            |              |             |             |  |  |
| 3   | 20131003  | KW03E           | Bushing                        | 1            | 1           | 1           |  |  |
| 4   | 20131004  | KW04E           | Long thread spool troy bracket | 1            | 1           | 1           |  |  |
| 5   | 20131005  | KW05E           | Thread guide hook              | 4            | 4           | 4           |  |  |
| 6   | 20131006  | KW09B           | Spool pin                      | 3            | 4           | 5           |  |  |
| 7   | 20131007  | KW12E           | Spool tray                     | 3            | 4           | 5           |  |  |
| 8   | 20131008  | KW13E           | Centering device               | 3            | 4           | 5           |  |  |
| 9   | 20131009  | KW14E           | Clamp plate                    | 1            | 1           | 1           |  |  |
| 10  | 20131010  | KW28E           | Spool tray cushing             | 3            | 4           | 5           |  |  |
| 11  | 20131011  | KW16            | Thread guide connecting bar    | 1            | 1           | 1           |  |  |
| 12  | 20131012  | KW20E           | Thread guide joint             | 1            | 1           | 1           |  |  |
| 13  | 20131013  | KW22            | Thread stable holder           | 1            | 1           | 1           |  |  |
| 14  | 20131014  | KW23            | Thread guide bar               | 1            | 1           | 1           |  |  |
| 15  | 20131015  | KW26E           | Thread spool tray bracket      | 1            | 1           | 1           |  |  |
| 16  | 20131016  | KW28E           | Thread guide plate             | 1            | 1           | 1           |  |  |
| 17  | 20131017  | KW29E           | Thread spool tray bracket      | 1            | 1           | 1           |  |  |
| 18  | 20131018  | KW32E           | Thread guide hook              | 3            | 3           | 3           |  |  |
| 19  | 20131019  | KW3613          | Rubber seal                    | 1            | 1           | 1           |  |  |
| 20  | 20131020  | SK421           | Thread guide hook screw        | 4            | 4           | 4           |  |  |
| 21  | 201S16006 | NK31B           | Thread guide hook nut          | 4            | 4           | 4           |  |  |
| 22  | 20128016  | SW01            | Thread guide washer            | 4            | 4           | 4           |  |  |
| 23  | 20131021  | SK386B          | Clamp plate screw              | 3            | 3           | 3           |  |  |
| 24  | 20131022  | SK281B          | Clamp holder screw             | 1            | 1           | 1           |  |  |
| 25  | 201S16004 | NK29B           | Nut 8 8                        |              | 8           |             |  |  |
| 26  | 20128025  | KW25B           | Lower washer 2 2               |              | 2           |             |  |  |
| 27  | 201S16005 | NK30            | Nut                            | 1            | 1           | 1           |  |  |
| 28  | 20128018  | SW04            | Washer                         | 4            | 4           | 4           |  |  |
| 29  | 20131023  | SK420           | Thread stand holder screw      | 1            | 1           | 1           |  |  |
| 30  | 20131024  | SK422           | Thread stand holder join screw | 1            | 1           | 1           |  |  |



## **Plate Row Material Assemblies**

|     |   | i /      |                              |                  | (Numb       | er)         |
|-----|---|----------|------------------------------|------------------|-------------|-------------|
|     | Part NO.                                | Ref.Part | Description                  |                  |             |             |
| NO. | 1 1111111111111111111111111111111111111 | NO.      |                              | Three-thread     | Four-thread | Five-thread |
| 1   | 20131025                                | KX01     | Machine head plate           | 1                | 1           | 1           |
| 2   | 20131026                                | KX02     | Head shockproof cushion      | 3                | 3           | 3           |
| 3   | 20131027                                | KX04     | Screw                        | 4                | 4           | 4           |
| 4   | 20131028                                | KX05     | Screw                        | 4                |             |             |
| 5   | 20131029                                | KX08     | Big washer                   | Big washer 12 12 |             | 12          |
| 6   | 20131030                                | KX09     | Plate dog link bushing       | 12               | 12          | 12          |
| 7   | 20131031                                | KX10E    | Row material trollgh bracket | 1                | 1           | 1           |
| 8   | 20131032                                | KX12E    | Row material trough I        | 1                | 1           | 1           |
| 9   | 20131033                                | KX13E    | Row material trough II       | 1                | 1           | 1           |
| 10  | 20131057                                |          | Washer                       | 1                | 1           | 1           |
| 11  | 20131034                                | SK391    | Row material seat screw 3 3  |                  | 3           |             |
| 12  | 20128022                                | WK21     | Row material washer          | 4                | 4           | 4           |
| 13  | 20131035                                | SK392    | Row material screw           | 4                | 4           | 4           |



## **Accessories Assemblies**

|     |           | <u> </u> |                            |              | (Numb       | er)         |
|-----|-----------|----------|----------------------------|--------------|-------------|-------------|
|     | David NO  | Ref.Part | Description                | -            | _           |             |
| NO. | Part NO.  | NO.      |                            | Three-thread | Four-thread | Five-thread |
| 1   | 20131036  | KY01     | Machine head cover         | 1            | 1           | 1           |
| 2   | 20131037  | KY02     | Oil can/100cc              | 1            | 1           | 1           |
| 3   | 20131038  | KY03     | Notes oil                  | 1            | 1           | 1           |
| 4   | 20131039  | KY04     | Tundish                    | 1            | 1           | 1           |
| 5   | 20131040  | KY05     | Oil can/50cc               | 1            | 1           | 1           |
| 6   | 20131041  | KY07     | Spanner                    | 1            | 1           | 1           |
| 7   | 20131042  | KY08     | Spanner                    | 1            | 1           | 1           |
| 8   | 20131043  | KY09     | Spanner                    | 1            | 1           | 1           |
| 9   | 20131044  | KY10     | Inner-hexagon screw driver | 1            | 1           | 1           |
| 10  | 20131045  | KY11     | Inner-hexagon screw driver | 1            | 1           | 1           |
| 11  | 20131046  | KY12     | Inner-hexagon screw driver | 1            | 1           | 1           |
| 12  | 20131047  | KY13     | Inner-hexagon screw driver | 1            | 1           | 1           |
| 13  | 20131048  | KY14     | screw driver               | 1            | 1           | 1           |
| 14  | 20131049  | KY15     | screw driver               | 1            | 1           | 1           |
| 15  | 20131050  | KY16     | screw driver               | 1            | 1           | 1           |
| 16  | 20131051  | KY18     | Tweezer                    | 1            | 1           | 1           |
| 17  | 20131052  | KY19     | Metal guide                | 0            | 0           | 1           |
| 18  | 20131053  | KY20D    | Presser foot base          | 1            | 1           | 1           |
| 19  | 20131054  | KY21-A   | Presser foot base chain    | 1            | 1           | 1           |
| 20  | 20131055  | KY26     | Attachment box             | 1            | 1           | 1           |
| 21  | 201S14001 | SK216    | Thumble screw              | 4            | 4           | 4           |
| 22  | 20117001  | DCX27    | Needle                     | 4            | 4           | 4           |
| 23  | 20119002  | KR35     | Lower knife                | 1            | 1           | 1           |
|     | 20119006  |          | Lower knife                | 0            | 0           | 1           |
| 24  | 20136001  | KT14-A   | Oil filter                 | 1            | 1           | 1           |

|   |           |           |                 | 795、         | 757、                                     | 766             |                 |          |                            |                          |         |
|---|-----------|-----------|-----------------|--------------|--|-----------------|-----------------|----------|----------------------------|--------------------------|---------|
|   | Ţ         | CHANGE /  |                 |              |  | 8               |                 | <b>@</b> | 680                        | <b>60</b> 00             |         |
| 7, - 2  |           |           | *               |              | 8 2 11 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 |                 | (v              |          | 920 1 (\$2.7)<br>921 - 122 |                          |         |
| MACHINE<br>TYPE/SPEC                                  | GAU<br>NG | JGE<br>SW | NEEDLE<br>PLATE | FEED<br>FORM | PRESSER<br>FOOT<br>ASSM.                 | UPPER<br>LOOPER | NEEDLE<br>CLAMP | WASHER   | CRANK                      | LOWER<br>LOOPER<br>CRANK | NEEDLE  |
| 795-3-504M1-15<br>757/766-3-504M1-15                  | 0         | 1.5       | 20115006        | 2011401800   | 20116006                                 | 20117007        | 20134002        | 20128006 | 20104003                   | 20104009                 | DC27#11 |
| <b>795-3-504M2-04</b><br>757/766-3-504M2-04           | 0         | 4         | 20115001        | 2011401700   | 20116001                                 | 20117007        | 20134002        | 20128006 | 20104003                   | 20104009                 | DC27#11 |
| <b>795-3-504M5-04/BK</b><br>737/766-3-504M5-<br>04/BK | 0         | 4         | 20115004        | 2011402100   | 20116004                                 | 20117007        | 20134002        | 20128006 | 20104003                   | 20104009                 | DC27#11 |
| 795-3-504M2-04/LFC-2<br>737/766-3-504M2-<br>04/LFC-2  | 0         | 4         | 20115001        | 2011401700   |  | 20117007        | 20134002        | 20128006 | 20104003                   | 20104009                 | DC27#11 |
| 795-4-514M2-24/LFC-2<br>747/766-4-514M2-<br>24/LFC-2  | 2         | 4         | 20115002        | 2011401700   |  | 20117007        | 20134001        | 20128005 | 20104002                   | 20104009                 | DC27#11 |
| 795-4-514M5-23/BK<br>747/766-4-514M5-<br>23/BK        | 2         | 3         | 20115005        | 2011402100   | 20116005                                 | 20117007        | 20134001        | 20128005 | 20104002                   | 20104009                 | DC27#11 |
| 795-4-514M2-24<br>757/766-4-514M2-24                  | 2         | 4         | 20115002        | 2011401700   | 20116002                                 | 20117007        | 20134001        | 20128005 | 20104002                   | 20104010                 | DC27#11 |
| 795-5-516M2-35<br>757/766-5-516M2-35                  | 3         | 5         | 20115003        | 2011401900   | 20116003                                 | 20117007        | 20134003        | 20128005 | 20104002                   | 20104010                 | DC27#14 |
| 795-5-516M2-55<br>757/766-5-516M2-55                  | 5         | 5         | 20115008        | 2011401900   | 20116007                                 | 20117007        | 20134004        | 20128005 | 20104002                   | 20104010                 | DC27#14 |
| 795-5-516X2-56<br>757/766-5-516X2-56                  | 5         | 6         | 20115007        | 2011402000   | 20516015                                 | 20117007        | 20134004        | 20128005 | 20104002                   | 20104010                 | DC27#19 |