PicoDrive

QE3760/QE5540

CE

Type

P43PD

Instruction Manual

Part 3

Software version 4_040_05

List of Contents Part 3

Technical updatings reserved!

11. Survey and List of Parameters

11.1 Explanation of Parameter Survey

The parameter survey is designed as an aid for finding parameters quickly. It is a summary of references for the parameter list. Listed behind each reference are all parameters which exert an influence on the function described by the reference.

The parameter survey is divided into five columns:
Column 1 shows the references (functions) to which parameters are assigned.
Column 2 shows the abbreviations of the respective functions.
Column 3 shows all parameters (setting numbers) belonging to the respective reference.
Column 4 shows, for each function (reference) which controls inputs or outputs, the applicable indications such as Ex or Ax which can also be found on the connections diagram.
Column 5 shows, for each function (control inputs (Ex) or control outputs (Ax)), the respective plugs with the number of contacts (see connections diagram).

Example for searching a parameter:
Keyword (function): inverse rotation
The parameter survey shows in column 3 the parameter numbers 618, 801.

Suppose that the inverse rotation function is to be enabled. The parameter list shows this function under parameter number 618.

11.2 Explanation of Parameter List

The parameter list is divided into 5 columns. These comprise, in
column 1:   the parameter number,
column 2:   is the explanation (meaning) of the parameters
column 3:   the programming level (A, B, C) on which the parameter in question can be accessed,
column 4:   the range of values within which the parameter in question can be set,
column 5:   the value of the parameter in question is set on delivery ex factory.

Parameters having "either/or" validity (software switches) can merely be set to value I or II. In the case of such parameters, column 4 is empty.
Parameter numbers in acute brackets; e.g. <105>, mean the value (content) set for the parameter in question.

Example:
107   Speed for front backtack when <106> = I
    I   limited by <105>
    II   limited by <607>

Explanation:
Parameter 107 is valid only the the value (content) of parameter <106> = I.
If parameter 107 is set to I (<107> = I), then the speed for the front backtack is limited by parameter 105, e.g. <105> = 1500. If parameter 107 is set to II (<107> = II), then the speed for the front backtack is limited by the value of parameter 607, e.g. <607> = 4000.

11.3 Parameter survey P43PD   4_040_05   (PARAM.ENO)

Reference!

All parameters signed with „✱" are retained unchanged after a **Master Reset 1** or **Master Reset 2** has been performed!

Attention! After a **Master Reset 3 all parameters** are set back to there default values!

With the **control box P43PD,** following machine classes are available:
Maschine class   1 =   PFAFF 1163

Function	Abbrev'n	Parameter	Input Output	Connection Socket/Contacts
Accelerate	DRZAN	722		
Backtack	RIE	105/110/364 523/584/585		
Backtack inversion	RIV	488/748		
Backtack suppression	RIUNT	488/748		
Blower	BLA	668		
Brake	DRZAB	723		
Catcher	FANG	707		
Chopper	MESSE	105/110/427		
Control	REG	880/881/884 885/886/887 889/890/900		
Decorative backtack	ZRIE	522/523/530 775		
Defect search	HWT	797		
Delay	VERZ	189/190/623 642/643/730 761/770/939 968/969		
Direction of rotation	DRR	800		
Display	ANZ	605/795/933		
End backtack	ER	110		
Engine	MOT	897		
Feed reverse	TUM	364/643/721 939/968/969		
Front backtack	AR	105		

Hardware test	HWT	797
Inverse rotation	RDR	618/623/801
Linear motor	LINMOT	668
Machine class	MAKL	799
Machine run	ML	438
Needle position	NAPO	488/522/700 702/703/705 706/707/710 748
Needle position change-over	NPW	446/488/748
Needle up without trimming	NHOS	446/488/710 748
Number of stitches	STZA	111/112/445 499
ON period	EINZ	189/190/715 889
Photocell	LS	111/112/113 199/615
Presser foot	PF	427/636/642 651/668/688 719/729/730 770
Program	PR	206/313
Programming level C	EBC	798
Puller	PULL	422/427/445 499
Residual brake	STBR	718
Seam end	NE	110/206
Seam start	NA	105
Single stitch	EST	446/488/748
Soft start	SANL	116/117
Speed	DRZ	105/110/117 199/530/585 586/605/606 607/608/609 802
Speed decrease	DRZAB	723
Speed increase	DRZAN	722
Speed limitation	DB	585/586

Start	START	113
Start delay	STVERZ	729
Starting block	ANLSP	665
Stitch condensation	STVD	105/110/364
Stop	STOP	206/427/665
Stop time	STOPZ	775
Stroke adjustment	HV	427
Target stitch	PEIPO	653/789
Thread clamp	FK	422/985/986
Thread puller	FZ	422/761
Thread tension release	FSL	538/636/688 707/761
Thread trimming	SN	438/609/705 706/734/795
Thread wiper	WI	422/668/715
Time needed to switch on	EINZ	189/190/715 889
Timing output	TA	538/642/643 705/719/721 734
Vacuum	SAUG	105/110

No.	Function (Meaning)	Level	Range of Values	Value	Standard
105	(AR/RIE/DRZ/MESSER/NA/SAUG/STVD) Speed for front backtack/ stitch condensation	B,C	0300 - 2000	1200	Kl. 1, 3
			0300 - 2000	1600	Kl. 2
			0300 - 2000	700	Kl. 4
			0300 - 2000	1000	Kl. 5
110	(ER/RIE/DRZ/MESSER/NE/SAUG/STVD) Speed for end backtack/ stitch condensation	B,C	0300 - 2000	1200	Kl. 1, 3
			0300 - 2000	1600	Kl. 2
			0300 - 2000	700	Kl. 4
			0300 - 2000	1000	Kl. 5
111	(LS/STZA) Light barrier compensation stitches 1 (stitches from light barrier clear to seam end)	A,B,C	0001 - 0030	8	Kl. 1, 2, 3, 4, 5
112	(LS/STZA) Number of stitches for light barrier fade-out on knit fabrics (according to stitch size)	B,C	0000 - 0100	0	Kl. 1, 2, 3, 4, 5
113	(LS/START) Start with light barrier 1 when light barrier is dark only 0 also when light barrier is clear	B,C		0	Kl. 1, 2, 3, 4, 5
116	(SANL) Soft start stitches	A,B,C	0000 - 0030	0	Kl. 1, 3, 4, 5
			0000 - 0030	1	Kl. 2
117	(SANL/DRZ) Speed for soft start stitches	B,C	0120 - 2000	400	Kl. 1, 3, 4, 5
			0120 - 2000	1000	Kl. 2
189	(VERZ/EINZ) Delay/on time t1	C	0010 - 0600	50	Kl. 1, 2, 3, 4, 5
190	(VERZ/EINZ) Delay/on time t2	C	0010 - 0600	50	Kl. 1, 2, 3, 4, 5
199	(DRZ/LS) Speed for light barrier compensation stitches	B,C	0300 - 2000	1200	Kl. 1, 2, 3, 4, 5
206	(NE/PR/STOP) Interrupt/discontinue seam sections at speed = constant (<203> = II) 1 with treadle -2 0 with treadle 0	B,C		0	Kl. 1, 2, 3, 4, 5
313	(PR) Programs are backtack programs (darning programs) 1 yes 0 no	A,B,C		0	Kl. 1, 2, 3, 4, 5
364	(RIE/STVD/TUM) Transport change-over means for 1 Back-tack 0 Stitch condensation	A,B,C		1	Kl. 1, 2, 3, 4, 5
422	(FK/FZ/PULL/WI) Output is 1 = wiper 2 = thread clamp 3 = motor runs 4 = lifting puller	B,C	0001 - 0004	1	Kl. 1, 2, 3, 4, 5
427	(PF/HV/PULL/STOP/MESSER) Operating mode of the input 1 = presser foot 2 = stroke adjustment 3 = control of puller 4 = stop 5 = chopper 6-9 without function	B,C	0001 - 0003	1	Kl. 1, 2, 3, 4, 5
438	(ML/SN) Output is 1 motor run 0 trimming	B,C		0	Kl. 1, 2, 3, 4 Kl. 5
445	(PULL/STZA) Stitches for puller delay	B,C	0000 - 0100	0	Kl. 1, 2, 3, 4, 5

446	(NHOS/NPW/EST) Input is	B,C	0001 - 0011 1	Kl. 1, 2, 3, 4, 5
	1 = needle up without trimming			
	2 = needle position change-over			
	3 = single stitch			
	4 = single stitch with reduced length			
	5 = backtack inversion			
	6 = backtack suppression			
	7 = change-over position			
	8 = puller lift switched off			
	9 = change-over needle position step by step, forward			
	10 = change-over needle position step by step, backward			
	11 = Switch-function: speed reduction with P.<586>			
488	(NHOS/NPW/EST/RIV/RIUNT/NAPO) Function from key F1 from operator panal	B,C	0001 - 0006 1	Kl. 1, 2, 3, 4, 5
	1 = needle up without trimming			
	2 = needle position change-over			
	3 = single stitch			
	4 = single stitch with reduced length			
	5 = backtack inversion			
	6 = backtack suppression			
	7 = change-over position			
	8 = puller lift switched off			
	9 = change-over needle position step by step, forward			
	10 = change-over needle position step by step, backward			
499	(STZA/PULL) Number of stitches for slowed down lowering of puller after operating knee switch	B,C	0000 - 0100 0	Kl. 1, 2, 3, 4, 5
522	(NAPO/ZRIE) Needle position when stop occurs during decorative backtack (stitch in stitch)	B,C	0	Kl. 1, 2, 3, 4, 5
	1 position 2 (up)			
	0 position 1 (down)			
523	(RIE/ZRIE) Backtack	A,B,C	0	Kl. 1, 2, 3, 5
	1 decorative backtack (stitch in stitch)			Kl. 4
	0 standard backtack			
530	(DRZ/ZRIE) Speed (max.) for decorative backtack	B,C	0300 - 2000 1000	Kl. 1, 2, 3, 5
			0300 - 2000 600	Kl. 4
538	(FSL/TA) Timing of output (thread tension release)	B,C	0010 - 0100 50	Kl. 1, 2, 3, 4, 5
584	(RIE) Backtack	B,C	0	Kl. 1, 2, 3, 4, 5
	1 four times			
	0 double			
585	(DRZ/DB/RIE) Speed limitation	B,C	0300 - 4800 1000	Kl. 1, 2, 3, 4, 5
586	(DRZ/DB) Speed limitation	B,C	0180 - 1500 600	Kl. 1, 2, 3, 4, 5
605	(DRZ/ANZ) Actual speed in display (<725>)	A,B,C	0	Kl. 1, 2, 3, 4, 5
	1 yes			
	0 no			
606	(DRZ) Speed: level 1 (min.)	B,C	0120 - 0800 180	Kl. 1, 2, 3, 4, 5
607	(DRZ) Speed: level 12 (max.)	B,C	0300 - 6000 4000	Kl. 1
			0300 - 6000 5000	Kl. 2
			0300 - 5500 3000	Kl. 3, 4, 5
608	(DRZ) Accelleration curve (Pedal characteristic)	B,C	0000 - 0004 1	Kl. 1, 2, 3, 5
			0000 - 0004 0	Kl. 4
	1 = linear			
	0 = non linear			
609	(SN/DRZ) Trimming speed 1	B,C	0100 - 0700 180	Kl. 1, 3, 4, 5
			0100 - 0700 210	Kl. 2
615	(LS) End recognition when photocell goes	B,C	0	Kl. 1, 2, 3, 4, 5
	1 from light to dark			
	0 from dark to light			

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|				
618	(RDR) Inverse rotation after seam end 1 yes 0 no	B,C	0	Kl. 1, 2, 3, 4 Kl. 5
623	(RDR/VERZ) Delay in start-up time (ms) for inverse rotation	B,C	0050 - 9000 100	Kl. 1, 2, 3, 4, 5
636	(FSL/PF) thread tension release in conjunction with presser foot 1 yes 0 no	B,C	0	Kl. 1, 2, 3, 4, 5
642	(PF/VERZ/TA) preser foot time from switch-on to voltage reduction (cycling)	B,C	0010 - 0150 100	Kl. 1, 2, 3, 4, 5
643	(TUM/VERZ/TA) feed reverse time from switch-on to voltage reduction (cycling)	B,C	0010 - 0150 100	Kl. 1, 2, 3, 4, 5
651	(PF) Presser foot with automatic descent on machine stop 1 yes 0 no	B,C	1	Kl. 1, 2, 3, 4, 5
653	(PEIPO) Target stitch before sewing 1 yes 0 no	B,C	0	Kl. 1, 2, 3, 4, 5
665	(ANLSP/STOP) Run locking/stop 1 contact closed 0 contact open	B,C	1 0	Kl. 1, 3, 5 Kl. 2, 4
668	(BLA/LINMOT/PF/WI) Thread wiper/thread clearer 1 yes 0 no	B,C	1 0	Kl. 1, 3 Kl. 2, 4, 5
688	(FSL/PF) thread tension release in conjunction with the presser foot at stop in the seam, when <636> = I 1 yes 0 no	B,C	1	Kl. 1, 2, 3, 4, 5
700	(NAPO) Needle position 0 (reference position of the needle)	B,C	0000 - 0255 0 0000 - 0255 250	Kl. 1, 2, 3, 5 * Kl. 4
702	(NAPO) Needle position 1 (needle down)	B,C	0000 - 0255 107 0000 - 0255 90 0000 - 0255 20 0000 - 0255 15 0000 - 0255 70	Kl. 1 Kl. 2 Kl. 3 Kl. 4 Kl. 5
703	(NAPO) Needle position 2 (thread take-up lever up)	B,C	0000 - 0255 240 0000 - 0255 236 0000 - 0255 220 0000 - 0255 230 0000 - 0255 234	Kl. 1 Kl. 2 Kl. 3 Kl. 4 Kl. 5
705	(NAPO/SN/TA) Needle position 5 (end of trimming signal 1 (magnetic thread trimmer)/clock pulses start of the trimming signal 1)	B,C	0000 - 0255 200 0000 - 0255 180 0000 - 0255 186	Kl. 1, 2, 4 Kl. 3 Kl. 5
706	(NAPO/SN) Needle position 6 (start trimming signal 2 (pneumatic thread trimmer))	B,C	0000 - 0255 130 0000 - 0255 136 0000 - 0255 30 0000 - 0255 17 0000 - 0255 85	Kl. 1 Kl. 2 Kl. 3 Kl. 4 Kl. 5
707	(NAPO/FSL/FANG) Needle position 9 (thread tension release or thread catcher start)	B,C	0000 - 0255 164 0000 - 0255 195 0000 - 0255 192	Kl. 1, 2, 3 Kl. 4 Kl. 5
710	(NAPO/NHOS) Needle position 3 (needle up)	B,C	0000 - 0255 184	Kl. 1, 2, 3, 4, 5
715	(EINZ/WI) Duration (ms) of thread wiper	B,C	0000 - 9000 60	Kl. 1, 2, 3, 4, 5
718	(STBR) Timing of residual brake (0 = brake off)	B,C	0000 - 0050 0 0000 - 0050 20	Kl. 1, 2, 3, 4 Kl. 5
719	(PF/TA) Timing output (lifting presser foot)	B,C	0010 - 0060 40 0010 - 0060 100	Kl. 1, 2, 3, 4 Kl. 5

| №	Description	Level	Value	Kl.
721	(TUM/TA) Timing output (feed reverse)	B,C	0010 - 0090 40	Kl. 1, 2, 3
			0010 - 0090 70	Kl. 4
			0010 - 0090 100	Kl. 5
722	(DRZAN) Acceleration ramp 1　gradual 50　steep	B,C	0001 - 0030 22 0001 - 0030 20 0001 - 0030 18	Kl. 1, 2, 3 Kl. 4 Kl. 5
723	(DRZAB) Brake ramp 1　gradual 50　steep	B,C	0001 - 0030 22 0001 - 0030 18 0001 - 0030 17	Kl. 1, 2 Kl. 3, 5 Kl. 4
729	(STVERZ/PF) Start delay after lowering presser foot	B,C	0010 - 9000 120 0010 - 9000 20	Kl. 1, 3, 4, 5 Kl. 2
730	(PF/VERZ) Lift delay for presser foot after seam end	B,C	0000 - 9000 50 0000 - 9000 0	Kl. 1, 3, 4, 5 Kl. 2
734	(SN/TA) Timing output (thread trimmer) (0=100% switched on)	B,C	0000 - 0100 10 0000 - 0100 40	Kl. 1, 2, 3, 5 Kl. 4
748	(NHOS/NPW/EST/RIV/RIUNT/NAPO) Input is 1 = needle up without trimming 2 = needle position change-over 3 = single stitch 4 = single stitch with reduced length 5 = backtack inversion 6 = backtack suppression 7 = change-over position 8 = puller lift switched off 9 = change-over needle position step by step, forward 10 = change-over needle position step by step, backward 11 = Switch-function: speed reduction with P.<586>	B,C	0001 - 0011 1	Kl. 1, 2, 3, 4, 5
761	(FSL/FZ/VERZ) Prolongation thread tension release / thread puller	B,C	0000 - 0080 0	Kl. 1, 2, 3, 4, 5
770	(PF/VERZ) Lifting delay of presser foot at threadle- position „-1"	B,C	0010 - 0250 110	Kl. 1, 2, 3, 4, 5
775	(ZRIE/STOPZ) Stop time (ms) with stitch in stitch backtack (decorative backtack)	B,C	0010 - 1000 150 0010 - 1000 50	Kl. 1, 2, 3, 5 Kl. 4
789	(PEIPO) Needle position 10 (target stitch)	B,C	0000 - 0255 248 0000 - 0255 240	Kl. 1, 2, 3, 4 Kl. 5
795	(ANZ/SN) Output 1 = Output is LED keypad (speed limitation) 0 = Output is trimming pneumatic	B,C	0000 - 0001 0	Kl. 1, 2, 3, 4, 5
797	(HWT) Hardware test 1　yes 0　no	C	0	Kl. 1, 2, 3, 4, 5
798	(EBC) Programming level C 1　yes 0　no	A,B,C	0000 - 0020 0	Kl. 1, 2, 3, 4, 5
799	(MAKL) Machine class which has been selected	C	0001 - 0005 1 0001 - 0005 2 0001 - 0005 3 0001 - 0005 4 0001 - 0005 5	Kl. 1 * Kl. 2 Kl. 3 Kl. 4 Kl. 5
800	(DRR) Direction of motor rotation viewed from belt pulley 1　left-hand rotation 0　right-hand rotation	C	0000 - 0001 1 0000 - 0001 0	Kl. 1, 3, 4, 5 * Kl. 2
801	(RDR) Reverse rotation angle after seam end	B,C	0010 - 0212 32 0010 - 0212 40	Kl. 1, 2, 3, 4 Kl. 5
802	(DRZ) Speed reduction from main drive 1 = variable 0 = 1:1	C	0000 - 0001 1 0000 - 0001 0	Kl. 1, 3, 5 * Kl. 2, 4
881	(REG) adaption of positioning characteristics of motor to machine to avoid vibration	C	0010 - 0200 100	Kl. 1, 2, 3, 4, 5

884	(REG) Proportional amplification of the speed control (in general)	B,C	0005 - 0040 20	Kl. 1, 2, 3, 5
			0005 - 0040 22	Kl. 4
885	(REG) Integral amplification of the speed control	C	0010 - 0100 55	Kl. 1, 2, 5
			0010 - 0100 80	Kl. 3
			0010 - 0100 45	Kl. 4
886	(REG) Proportional amplification of the order controllers	C	0000 - 0100 50	Kl. 1
			0001 - 0100 8	Kl. 2, 4
			0001 - 0100 40	Kl. 3
			0001 - 0100 27	Kl. 5
887	(REG) Differential amplification of the order controllers	C	0010 - 0100 47	Kl. 1
			0010 - 0100 60	Kl. 2
			0010 - 0100 40	Kl. 3, 4
			0010 - 0100 20	Kl. 5
889	(EINZ/REG) Time required for order controlling (0 = always)	C	0000 - 2500 300	Kl. 1, 2, 3, 4
			0000 - 2500 120	Kl. 5
890	(REG) Proportional amplification of the superior order controllers for the residual brake	C	0001 - 0200 25	Kl. 1, 2, 3, 4
			0001 - 0200 100	Kl. 5
897	(MOT) MINI motor version 1 long 0 short	C	0000 - 0001 0	Kl. 1, 2, 3 *
			0000 - 0001 1	Kl. 4, 5
900	(REG) Additional P-Amplification of the speed control	B,C	0005 - 0050 25	Kl. 1, 2, 3, 4, 5
933	(ANZ) Display change-over 1 diagnosis 0 normal display	C	0000 - 0004 0	Kl. 1, 2, 3, 4, 5
939	(VERZ/TUM) Rate time (premature change-over) for the transport changer when switching on	B,C	0010 - 0200 46	Kl. 1
			0010 - 0200 30	Kl. 2, 4
			0010 - 0200 44	Kl. 3
			0010 - 0200 60	Kl. 5
968	(VERZ/TUM) Rate time for feed reverse during switching off	B,C	0010 - 0200 35	Kl. 1
			0010 - 0200 30	Kl. 2, 4
			0010 - 0200 20	Kl. 3
			0010 - 0200 50	Kl. 5
969	(VERZ/TUM) Switching off angel for presserfoot during thread wiping at seam start	B,C	0000 - 0255 100	Kl. 1, 2, 3, 4, 5
985	(FK) Switch on angle for thread clamp	B,C	0000 - 0255 67	Kl. 1, 2, 3, 4, 5
986	(FK) Switch off angle for thread clamp	B,C	0000 - 0255 206	Kl. 1, 2, 3, 4, 5
989	(FK/FZ/NA) Thread clamp at seam start 0 = Thread clamp off 1 = Thread clamp on 2 = Presserfoot lifting with thread clamp	B,C	0000 - 0002 0	Kl. 1, 2, 3, 4, 5

# 12. Electrical Connections Diagram X5 P43PD

X1 = Motor / Wicklung
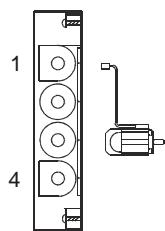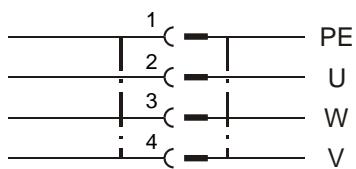
1	PE
2	U
3	W
4	V

X2 = Motor / Signalgeber

1	FA
2	FB
3	SM
4	ADTC
5	5V
6	Y EXT SM
7	15V
8	EXT SM
9	GND

blau

X3 = Sollwertgeber

1	
2	
3	
4	
5	+5V
6	
7	
8	SW IN
9	GND

blau

X4 = Bedienfeld

1	
2	RXD
3	TXD
4	+5V
5	GND
6	
7	RTS
8	CTS
9	

rot

X5 = Eingänge / Ausgänge

A1	1	Y1
A2	2	Y2
	3	
	4	
E1	5	S1
A3	6	Y3
A4	7	Y4
+24V	8	
+24V	9	
0V GND	10	
	11	
+24V	12	
+24V	13	
+24V	14	

8 ... 1
14 ... 7

X6 = Ausgang

A5	1	Y5
+24V	2	

2 ... 1
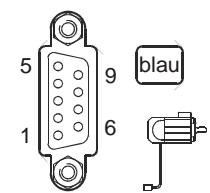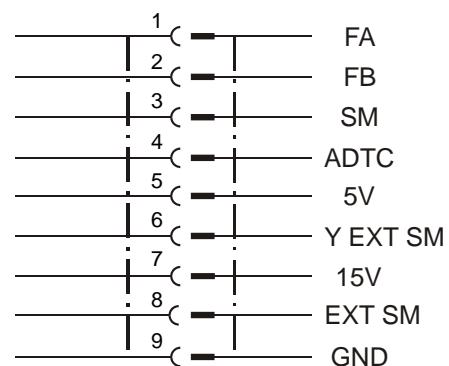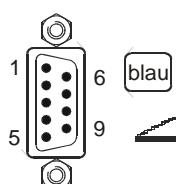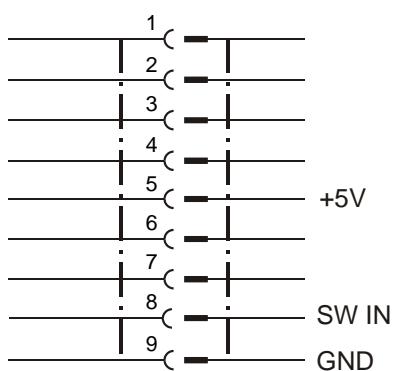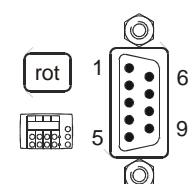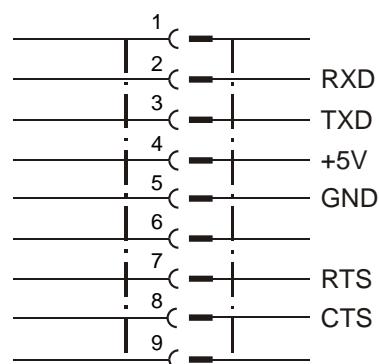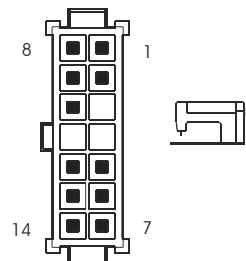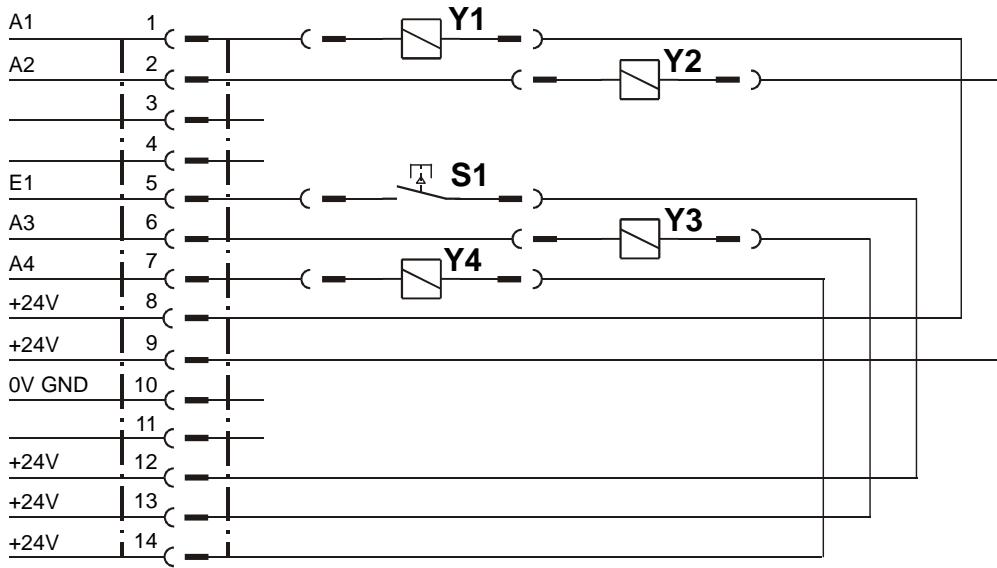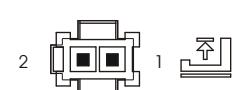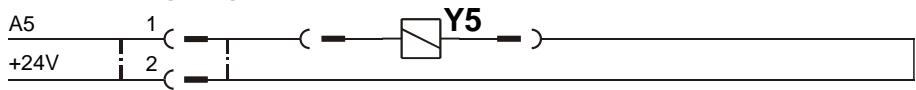
X7 = Positionsgeber

1	+5V
2	down
3	up
4	GND
5	
6	
7	
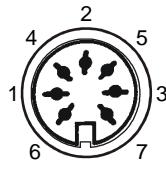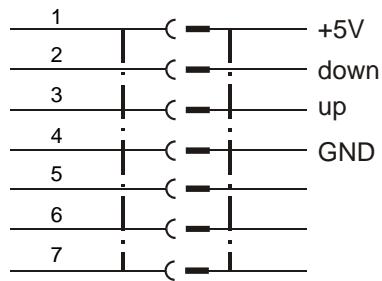
Bedeutung der Magnete bzw. Magnetventile, Taster / Meaning of magnets and/or solenoids and keys
Signification des aimants resp. solenoides et touches / Significação dos imaõs e/ou as solenoidas e teclas
Significato dei magneti, delle valvole magnetiche e dei tasti / Significación de los imanes y/o los solenoides
y pulsadores / Betekenis van de magneten resp. magneetkleppen, toetsen

S1	Transportumstellung von Hand / manual feed reverse / renversement de marche manuel / mudança do transporte manual / commutazione trasporto a mano / inversión de transporte manual / handmatige transportomschakeling
S2	Presserfuß heben / lifting presser foot / relevage du pied presseur / levantar do calcador / sollevamento del alzapiedino / elevación de prensatelas / drukvoet optillen
Y1 I max 4 A *	Fadenschneiden / thread trimmer / coupe-fil / corte de linhas / rasafilo / cortahilos / draadsnijder
Y2 I max 4 A *	Fadenwischer / thread wiper / écarteur de fil / retira-linhas / scartafilo / retirahilos / draadwisser
Y3 I max 4 A *	Transportumsteller / feed reverse / renversement de marche / mudança do transporte / commutazione trasporto / inversión de transporte / transportomschakeling
Y4 I max 4 A *	Fadenspannungslösen / thread tension release / détendeur de fil / soltar tensão da linha / sbloccaggio tendifilo / detensión del hilo / verbreken van de draadspanning
Y5 I max 4 A *	Presserfuß heben / lifting presser foot / relevage du pied presseur / levantar do calcador / sollevamento del alzapiedino / elevación de prensatelas / drukvoet optillen

* Die Summe der Lastströme aller gleichzeitig eingeschalteten Stellglieder (Magnete, Magnetventile) darf den Wert von 4A nicht überschreiten (siehe hierzu Kapitel 2. Technische Daten).

* The total of load currents of all servos activated simultaneously (solenoids, solenoid valves) is not allowed to exceed 4 amps (see also section 2. Technical Specifications).

* Le total des courants de charge de tous les vérins (aimants, électro-vannes) activés simultanément ne doit pas dépasser 4 A (voir aussi le chapitre 2. "caractéristiques techniques").

* A soma das correntes sob carga de todos os actuadores ligados ao mesmo tempo (ímans, solenóides) não pode ultrapassar o valor de 4A (ver também capítulo 2. Dados Técnicos).

* La somma delle correnti di carico di tutti gli attuatori inseriti contemporaneamente (magneti, elettrovalvole) non deve essere superiore a 4 A (vedere il capitolo 2. Dati Tecnici).

* La suma de las corrientes bajo carga de todos los elementos de todos los componentes de regulación conectados simultáneamente (imanes, válvula magnética) no podrá sobrepasar el valor de 4A (véase también el capítulo 2. de datos técnicos).

* De belastingsstroom van alle tegelijkertijd ingeschakelde bedieningsschakels (magneten, magneetventielen) mag in totaal niet meer dan 4 A bedragen (zie hiervoor hoofdstuk 2. Technische gegevens).