3 CPU MODULE INSTRUCTION

3.1 Sequence Instruction

Contact instruction

■Operation start, series connection, parallel connection

Instruction symbol	Description	Reference
LD	Starts logical operation (Starts NO contact logical operation)	Page 114
LDI	Starts logical NOT operation (Starts NC contact logical operation)	
AND	Logical AND (NO contact series connection)	
ANI	Logical NAND (NC contact series connection)	
OR	Logical OR (NO contact parallel connection)	
ORI	Logical NOR (NC contact parallel connection)	

■Pulse operation start, pulse series connection, pulse parallel connection

Instruction symbol	Description	Reference
LDP	Starts rising edge pulse operation	Page 117
LDF	Starts falling edge pulse operation	
ANDP	Rising edge pulse series connection	
ANDF	Falling edge pulse series connection	
ORP	Rising edge pulse parallel connection	
ORF	Falling edge pulse parallel connection	

■Pulse NOT operation start, pulse NOT series connection, pulse NOT parallel connection

Instruction symbol	Description	Reference
LDPI	Starts rising edge pulse NOT operation	Page 121
LDFI	Starts falling edge pulse NOT operation	
ANDPI	Rising edge pulse NOT series connection	
ANDFI	Falling edge pulse NOT series connection	
ORPI	Rising edge pulse NOT parallel connection	
ORFI	Falling edge pulse NOT parallel connection	

Association instruction

■Ladder block series/parallel connection

Instruction symbol	Description	Reference
ANB	AND between logical blocks (series connection between logical blocks)	Page 123
ORB	OR between logical blocks (parallel connection between logical blocks)	

■Storing/reading/clearing the operation result

Instruction symbol	Description	Reference
MPS	Stores the operation result	Page 125
MRD	Reads the operation result stored by MPS	
MPP	Reads and resets of the operation result stored by MPS	

■Inverting the operation result

Instruction symbol	Description	Reference
INV	Inversion of the operation result	Page 128

■Converting the operation result into a pulse

Instruction symbol	Description	Reference
MEP	Conversion of operation result to rising edge pulse	Page 129
MEF	Conversion of operation result to falling edge pulse	

Output instruction

■Out (excluding the timer, counter and annunciator)

Instruction symbol	Description	Reference
OUT	Device output	Page 130

■Timer (low-speed, high-speed, low-speed retentive, high-speed retentive)

Instruction symbol	Description	Reference
OUT T	Low-speed timer	Page 132
OUTH T	Timer	
OUTHS T	High-speed timer	
OUT ST	Low-speed retentive timer	
OUTH ST	Retentive timer	
OUTHS ST	High-speed retentive timer	

■Counter, long counter

Instruction symbol	Description	Reference
OUT C	Counter	Page 135
OUT LC	Long counter	Page 137

■Annunciator

Instruction symbol	Description	Reference
OUT F	Annunciator	Page 139

■Setting devices (excluding annunciator)

Instruction symbol	Description	Reference
SET	Sets devices	Page 141

■Resetting devices (excluding annunciator)

Instruction symbol	Description	Reference
RST	Resets devices	Page 143

■Setting/resetting annunciator

Instruction symbol	Description	Reference
SET F	Sets annunciator	Page 145
RST F	Resets annunciator	Page 147
ANS	Sets annunciator (with evaluation time)	Page 149
ANR	Resets annunciator (smallest number reset)	Page 151
ANRP		

■Rising/falling edge output

Instruction symbol	Description	Reference
PLS	Generates a pulse for 1 cycle of a program at the rising edge of the input signal.	Page 152
PLF	Generates a pulse for 1 cycle of a program at the falling edge of the input signal.	Page 154

■Inverting the bit device output

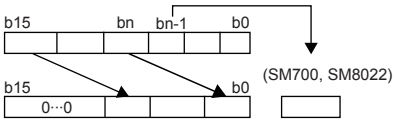
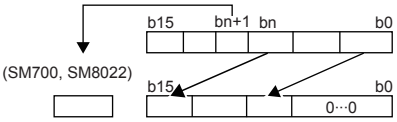
Instruction symbol	Description	Reference
FF	Inversion of device output	Page 156
ALT		Page 157
ALTP		

Shift instruction

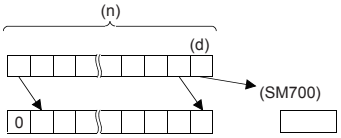
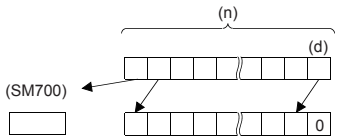
■Shifting bit devices

Instruction symbol	Description	Reference
SFT	1 bit shift of the device	Page 159
SFTP		

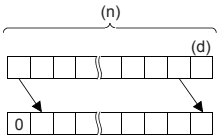
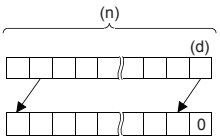
■Shifting 16-bit data to the right/left by n bit (s)

Instruction symbol	Description	Reference
SFR		Page 161
SFRP		
SFL		Page 163
SFLP		

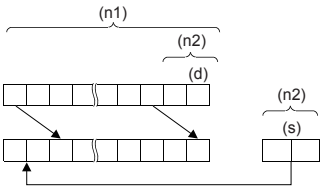
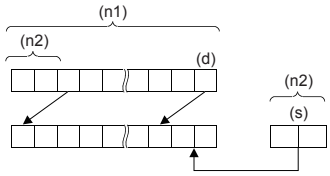
■Shifting n-bit data to the right/left by 1 bit

Instruction symbol	Description	Reference
BSFR		Page 165
BSFRP		
BSFL		Page 167
BSFLP		

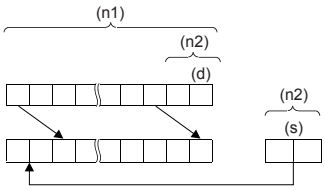
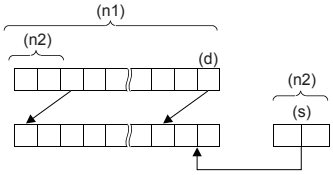
■Shifting n-word data to the right/left by 1 word

Instruction symbol	Description	Reference
DSFR		Page 169
DSFRP		
DSFL		Page 170
DSFLP		

■Shifting n-bit data to the right/left by n bit (s)

Instruction symbol	Description	Reference
SFTR SFTRP		Page 171
SFTL SFTLP		Page 173

■Shifting n-word data to the right/left by n word (s)

Instruction symbol	Description	Reference
WSFR WSFRP		Page 175
WSFL WSFLP		Page 177

Master control instruction

■Setting/resetting the master control

Instruction symbol	Description	Reference
MC	Starts master control	Page 179
MCR	Releases master control	

Termination instruction

■Ending the main routine program

Instruction symbol	Description	Reference
FEND	Ends the main routine program	Page 183

■Ending the sequence program

Instruction symbol	Description	Reference
END	Ends the sequence program	Page 186

Stop instruction

■Stopping the sequence program

Instruction symbol	Description	Reference
STOP	Stops the sequence operation after input conditions are met. Executes the sequence program, upon setting the RUN/STOP/RESET switch to RUN again.	Page 188