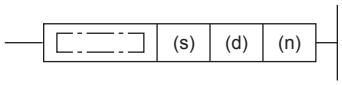
Encoding from 256 to 8 bits

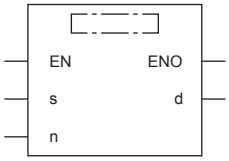
ENCO(P)

FX5S FX5UJ FX5U FX5UC

These instructions encode the 2(n) bits of data from the device specified by (s), and store it in (d).

Ladder diagram	Structured text
	ENO:=ENCO(EN,s,n,d); ENO:=ENCOP(EN,s,n,d);

FBD/LD



Setting data

■Descriptions, ranges, and data types

Operand	Description	Range	Data type	Data type (label)
(s)	Head device for storing the encode data	—	Bit/16-bit unsigned binary	ANY_ELEMENTARY*1
(d)	Device number for storing the encoding result	—	16-bit signed binary	ANY_ELEMENTARY
(n)	Valid bit length	1 to 8	16-bit unsigned binary	ANY16
EN	Execution condition	—	Bit	BOOL
ENO	Execution result	—	Bit	BOOL

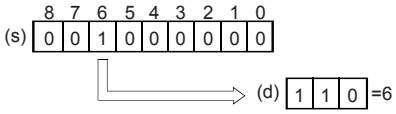
*1 Digit specified bit type label cannot be used.

■Applicable devices

Operand	Bit	Word			Double word		Indirect specification	Constant			Others
	X, Y, M, L, SM, F, B, SB, S	T, ST, C, D, W, SD, SW, R	U□\G□	Z	LC	LZ		K, H	E	$	
(s)	○	○	○	○	—	—	○	—	—	—	—
(d)	○	○	○	○	—	—	○	—	—	—	—
(n)	○	○	○	○	—	—	○	○	—	—	—

Processing details

- These instructions store into (d) the binary value corresponding to the bit whose value is 1 in the data with $2^{(n)}$ bits.



- When (n) is 0, no processing is performed, and the contents of the device specified by (d) do not change.
- The bit device is handled as a device storing one-bit data and the word device is handled as a device storing 16-bit data.
- If two or more bits are 1, the higher bit position is processed.

Operation error

Error code (SD0/SD8067)	Description
2820H	The device specified by (s) exceeds the corresponding device range.
3401H	The entire data from (s) to $2^{(n)}$ number of bits is 0.
	(s) is specified as a bit device and (n) is other than 0 to 8.
	(s) is specified as a word device and (n) is other than 0 to 4.