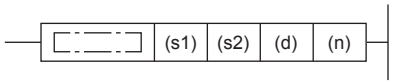
Performing an AND operation on 16-bit block data

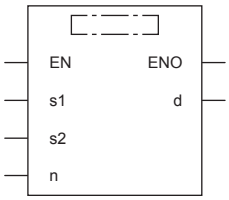
BKAND(P)

FX5S FX5UJ FX5U FX5UC

These instructions AND contents of (n) point(s) from the device specified by (s1) and (n) point(s) from the device specified by (s2), and store the results in the devices specified by (d) onwards.

Ladder diagram	Structured text
	ENO:=BKAND(EN,s1,s2,n,d); ENO:=BKANDP(EN,s1,s2,n,d);

FBD/LD



Setting data

■Descriptions, ranges, and data types

Operand	Description	Range	Data type	Data type (label)
(s1)	Head device that stores data for AND	-32768 to +32767	16-bit signed binary	ANY16
(s2)	Data for AND or head device where the data is stored	-32768 to +32767	16-bit signed binary	ANY16
(d)	Head device for storing AND results	—	16-bit signed binary	ANY16
(n)	Number of data	0 to 65535	16-bit unsigned binary	ANY16
EN	Execution condition	—	Bit	BOOL
ENO	Execution result	—	Bit	BOOL

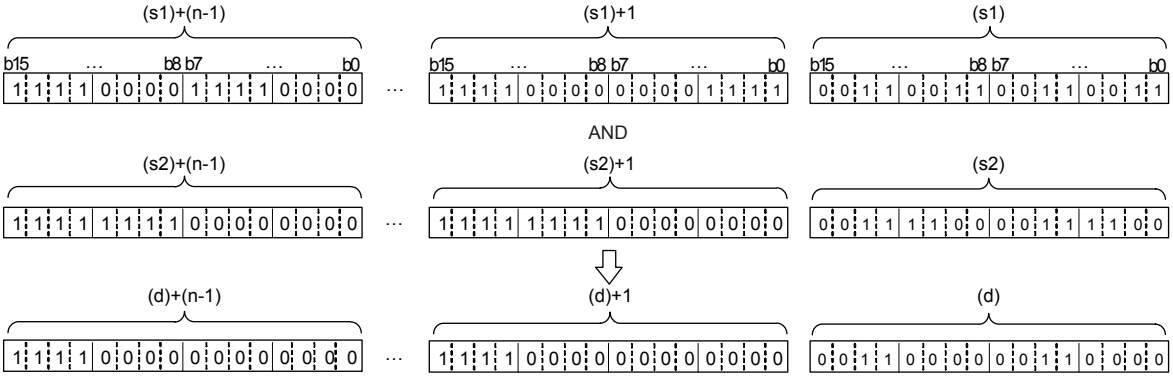
■Applicable devices

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	$	
(s1)*1	—	○	—	—	—	—	○	—	—	—	—
(s2)*1	—	○	—	—	—	—	○	○	—	—	—
(d)*1	—	○	—	—	—	—	○	—	—	—	—
(n)	○	○	○	○	—	—	○	○	—	—	—

*1 The same device number can be specified for (s1) and (d) or (s2) and (d).

Processing details

- These instructions AND contents of (n) point(s) from the device specified by (s1) and (n) point(s) from the device specified by (s2), and store the results in the devices specified by (d) onwards.



Operation error

Error code (SD0/SD8067)	Description
2820H	The range of (n) point(s) of data starting from the device specified by (s1), (s2), or (d) exceed the corresponding device range.
2821H	Device range of (n) point(s) from (s1) partially overlaps with device range of (n) point(s) from (d). (Does not apply when same device has been specified for (s1) and (d).)
	Device range of (n) point(s) from (s2) partially overlaps with device range of (n) point(s) from (d). (Does not apply when same device has been specified for (s2) and (d).)