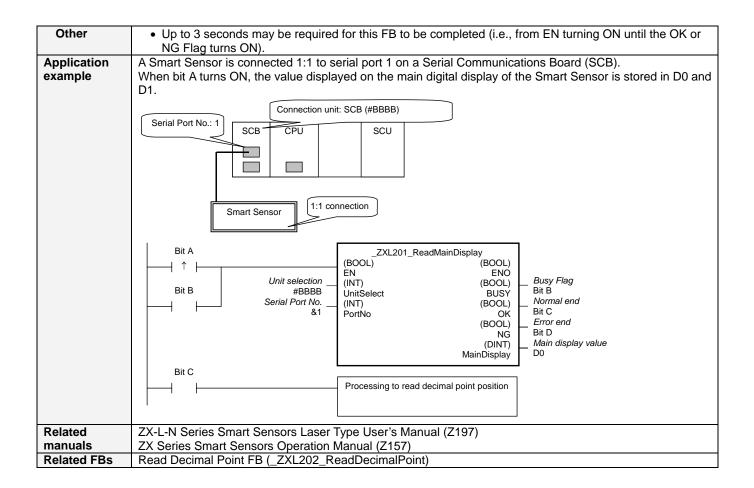
Read Main Display Value: _ZXL201_ReadMainDisplay

Basic function	Reads the numeric value dis	splayed on the main digital display of a Smart Sensor.			
Symbol	Busy Flag				
File name	Lib\FBI \omronlib\LaserSens	sor\ZXL_ZXL201_ReadMainDisplay10.cxf			
Applicable models	Laser Sensor ZX	-LDA-N			
	CJ CP CP	61*-CPU**H Unit version 3.0 or higher 1*-CPU**H Unit version 3.0 or higher 1M-CPU** Unit version 3.0 or higher 21H 21L (except 10 points CPU)			
	Communications CS Units/Boards	S1W-SCU21-V1, CJ1W-SCU21-V1, CJ1W-SCU41-V1 Unit Version 1.2 or higher S1W-SCB21-V1 and CS1W-SCB41-V1 Unit Version 1.2 or higher			
Conditions		rsion 5.0 or higher			
for usage	External Connections Can be used only for 1:1 connections. (FB "_ZXLN***" can be used for 1:N connections) Communications must be within one network and cannot cross to another network. Communications Settings				
	The communications settings of the serial port must be the same as those of the Laser Sensor. • The communications settings of the specified serial port can be set to the default Laser Sensor settings using the Set Communications Port (_ZXL600_SetComm) function block, and the other Laser Sensor settings using the Set Serial Gateway Mode (_SCx604_SetPortGATEWAY) function block. CPU Unit Settings PLC Setup: Shared Settings for Communications Instructions in FBs • Communications Instruction Response Timeout Time (default: 2 s) 5 s recommended • Number of retries (default: 0) Shared Resources				
	 Communications ports 				
Function description	When the Start Trigger turns ON, numeric value displayed on the main digital display is read for the Smart Sensor connected to the Serial Port specified by the <i>Connection unit</i> and <i>Serial port No</i> . The data read from the main digital display with this FB does not include the decimal point position. Use the Read Decimal Point Position FB (_ZXL202_ReadDecimalPoint) in combination with this FB to read the decimal point.				
FB precautions	FB is being processed.	d ON only for one cycle after processing is completed. Use these flags to detect essing.			
	Normal End (OK) or ON Error End (NG) OFF				
		, the output parameters are cleared. ters when the OK flag turns ON.			
EN input	Connect EN to an OR between	een an upwardly differentiated condition for the start trigger and the BUSY			
condition	output from the FB.				
Restrictions Input variables	 Always use an upwardly differentiated condition for EN. If the input variables are out of range, the ENO Flag will turn OFF and the FB will not be processed. 				
Output variables	to the EN input variable	le cycles to process. Always connect an OR including the BUSY output variable to ensure that the FB is processed to completion (see <i>Symbol</i>). output variable ON or OFF outside the FB.			



■ Variable Tables

Input Variables

Name	Variable name	Data type	Default	Range	Description
EN	EN	BOOL			1 (ON): FB started.
					0 (OFF): FB not started.
Unit selection	UnitSelect	INT	&0	At right.	Specify the Unit and the serial port.
Serial Port No.	PortNo	INT	&1	&1 to &2	Only serial port 2 of CP1H/CP1L M-type
					CPU unit is possible to use this FB.
					■ Connected to CPU Unit
					Unit selection #FFFF
					Serial port No. Not accessed. (CP1H/CP1L-M: Serial Port2
					CP1L-L14/20: Serial Port1)
					■ Connected to Serial Communication Board(SCB)
					Unit selection #BBBB
					Serial port No. &1: Serial Port 1
					&2: Serial Port 2
					■ Connected to Serial Communication Unit(SCU)
					Unit selection SCU Unit No. (&0 to &15) Serial port No. &1: Serial Port 1
					&1: Serial Port 1

Output Variables

Output variables				
Name	Variable name	Data type	Range	Description
ENO	ENO	BOOL		1 (ON): FB processed normally.
(May be omitted.)				0 (OFF): FB not processed or ended in an error.
Busy Flag	BUSY	BOOL		Automatically turns OFF when processing is
				completed.
Normal end	OK	BOOL		Turns ON for one cycle when processing ends
				normally.
Error end	NG	BOOL		Turns ON for one cycle when processing ends in an
				error.
Main display value	MainDisplay	DINT		Outputs the value displayed on the main digital
				display.

Internal Variables

Internal variables are not output from the FB.

If the NG Flag from the FB turns ON, the following internal variables can be monitored to obtain information on the error.

Name	Variable name	Data type	Range	Description
Error code	ErrorCode	WORD		The results information from the Smart Sensor is output to the Error Code. See below.

Error Code Details

	2 otano				
Code Contents Meaning		Meaning			
#0000	Normal end				
#2203	Operation error	The value displayed on the main digital display is read when an error has occurred, e.g., an incident level error.			
#2204	Operation error	The Sensor is not in RUN mode.			

Version History

toreion metery					
Version		Date	Contents		
	1.00 2004.6. Original production				

Note

This manual is a reference that explains the function block functions.

It does not explain the operational limitations of Units, components, or combinations of Units and components. Always read and understand the Operation Manuals for the system's Units and other components before using them.