

Parameter and Process data OPT2041



IO-Link OPT2041

Addressing via IO-Link

The Index is set to „1“ at all times. Thereby the Direct Parameter Page can be reached, where then the several Parameters can be set by the Subindexes.

Subindex „0“	→ read all Parameters	
Subindex „1“	→ Parameter 0	read/write
Subindex „2“	→ Parameter 1	read/write
...

Process bytes

Process byte 0

Bit 0	Output status	1 = switched
Bit 1	Contamination	1 = contaminated
Bit 2		
Bit 3		
Bit 4		
Bit 5		
Bit 6		
Bit 7		

Process byte 1

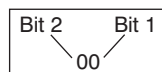
Bit 0	Signal Strength Bit 0
Bit 1	Signal Strength Bit 1
Bit 2	Signal Strength Bit 2
Bit 3	Signal Strength Bit 3
Bit 4	Signal Strength Bit 4
Bit 5	Signal Strength Bit 5
Bit 6	Signal Strength Bit 6
Bit 7	Signal Strength Bit 7

Parameter

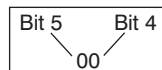
Main Page (Parameter 0 Bit 7-0)

Parameter 0

Bit 0	Reset to delivery status	1 = Do reset
Bit 1	Display Language	00 = German, 01 = English,
Bit 2	Display Language	10 = French, 11 = Spanish



Bit 3	Rotate Display 180°	1 = rotate
Bit 4	Display Brightness	00 = min, 01 = normal,
Bit 5	Display Brightness	10 = max



Bit 6	Lock Sensor	1 = Sensor is locked
Bit 7	Switch to	1 = Configuration Page

At Switch to = 1:

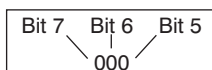
Bit 0–6	Selection of Configuration Page	
Bit 7	Switch to	1 = Configuration Page

Is Bit 7 in Parameter 0 set to „1“, more Configuration Pages can be reached.

For this purpose the corresponding address of the Configuration Page (in brackets) is set to parameter 0 Bit 0–6.

Parameter 1

Bit 0	NC/NO	1 = NC
Bit 1	Start Teach-In	1 = Start teaching
Bit 2	PNP/NPN/Push-Pull	0 = PNP, 1 = Push-Pull
Bit 3		
Bit 4	Teach step	1 = 2 nd Teach Point/ End of Dynamic Teach
Bit 5	Teach mode	000 = Normal, 001 = Minimal,
Bit 6	Teach mode	010 = Dynamic
Bit 7	Teach mode	011 = 2-Point
		100 = Window
		101 = Background



Parameter 2	High Byte On Delay in ms
Parameter 3	Low Byte On Delay in ms
Parameter 4	High Byte Off Delay in ms
Parameter 5	Low Byte Off Delay in ms
Parameter 6	High Byte Impulse Duration in ms
Parameter 7	Low Byte Impulse Duration in ms
Parameter 8	High Byte of lower Threshold
Parameter 9	Low Byte of lower Threshold
Parameter 10	High Byte of upper Threshold
Parameter 11	Low Byte of upper Threshold

Configuration Page (0x80)

Parameter 1	Serial number Byte 1
Parameter 2	Serial number Byte 2
Parameter 3	Serial number Byte 3
Parameter 4	Serial number Byte 4
Parameter 5	DeviceID Byte 1
Parameter 6	DeviceID Byte 2
Parameter 7	DeviceID Byte 3
Parameter 8	Revision
Parameter 9	
Parameter 10	
Parameter 11	

Configuration Page (0x81)

Parameter 1	Filter Settings	0x00 = not allowed
	Filter Settings	0x01 = Filter off
	Filter Settings	0x03 = ×2
	Filter Settings	0x07 = ×3
	Filter Settings	0x0f = ×4
	Filter Settings	0x1f = ×5
	Filter Settings	0x3f = ×6
	Filter Settings	0x7f = ×7
	Filter Settings	0xff = ×8

Parameter 2

Bit 0	Operating Mode	1 = High Sensitivity
		0 = Normal Sensitivity
Bit 1	Zoom Bar graph	
Bit 2	Zoom Bar graph	
Bit 3	Zoom Bar graph	
Bit 4	Zoom Bar graph	

Parameter 3

Bit 0	Display element: Threshold
Bit 1	Display element: Bar graph
Bit 2	Display element: Signal Strength
Bit 3	Display element: Switching Status Indicator
Bit 4	Display element: Operating Mode

Parameter 4	High Byte of Lower Threshold 2
Parameter 5	Low Byte of Lower Threshold 2
Parameter 6	High Byte of Upper Threshold 2
Parameter 7	Low Byte of Upper Threshold 2
Parameter 8	
Parameter 9	
Parameter 10	
Parameter 11	

