

3 IO-Link Slave

IP-IA-8DIP8DOP IO-Link Slave/ 8 Channels Digital Input (PNP) & 8 Channels Digital Output (PNP)

1 Module Features

- ◆ Support the Data Storage function;
- ◆ Support 8 channels digital input and 8 channels digital output;
- ◆ Support the input holding function (Keep the read input value unchanged for a certain period of time);
- ◆ Support configurable filter time;

2 Technical Parameter

IO-Link Protocol	
Protocol Standard	IO-Link V1.1 slave protocol
Transmission Speed	Default: COM2 (38.4kbps)
Vendor ID	0x0651
Device ID	0x81623F (8479295)
Communication Port	
Port Definition	M12 A-code 4 Pin, needle end Pin1: 24V (Us), the positive of system power Pin2: 24V (Ua), the positive of field power Pin3: 0V (GND) Pin4: C/Q
Us Power Supply Rated Voltage	24V DC
Ua Power Supply Rated Voltage	24V DC
Us/Ua Galvanic Isolation	Not support
Module Consumption	Max.50mA@24V DC
IO Port	
Quantity	8 Ports, 8 channels digital input, 8 channels digital output (M12, A-code, 5 Pin, hole end)
Terminal Type	8×M12, hole end
Port Definition (X01~04)	Pin1: 24V, positive of power output, provided by Us Pin2: Signal 1, digital input Pin3: 0V Pin4: Signal 2, digital input Pin5: FG, functional grounding
Port Definition (X05~08)	Pin1: 24V, positive of power output, provide by Us Pin2: Signal, 1 digital output Pin3: 0V Pin4: Signal 2, digital output Pin5: FG, functional grounding
Digital Input	
Channel Indicator	Support, green
Input Feature	Type 3, high level is valid (PNP)
Rated Voltage	24V DC
Signal “0”	-5V DC~+5V DC (Us power rail)
Signal “1”	+11V DC~+30V DC (Us power rail)
Minimum Voltage	-5V DC
Maximum Voltage	+30V DC
Input Current	2.5mA (for the signal “1”, rated voltage input)
Input Delay	OFF to ON: Max.500μs ON to OFF: Max. 500μs
Channel Isolation	There is no isolation between channels
Filter	Configurable
Digital Output	
Channel Indicator	Support, green

Output Type	PNP, High level
Load Capacity	Resistive load: 0.5A Inductive load: 12W Lamp load: 5W
Rated Output Current of Pin 1	350mA (single channel)
Output Current of Module	Max.3.6A
Minimum Load Resistance	48Ω
Residual Current	Max.10μA (for signal “0”)
Output Delay	OFF to ON: Max.100μs ON to OFF: Max. 200μs
Switch Frequency	Rated power resistive load: COM1: 10Hz; COM2: 35Hz; COM3: 80Hz; Rated power inductive load: COM1/COM2/COM3: 2.5Hz; Rated power lamp load: COM1: 10Hz; COM2: 12.5Hz; COM3: 12.5Hz;
Channel Isolation	There is no isolation between channels
Diagnosis Function	
Status Display	Power indicator, running state, communication state, running error indicator
Diagnosis Function	Communication diagnosis
Us power anti-reverse protection	Support
Us power overvoltage detection	Support, $U_s > 30\text{VDC}$ triggered
Us power undervoltage detection	Support, $9\text{VDC} \leq U_s \leq 18\text{VDC}$ triggered
Dimension	
Dimension	160 mm *60 mm *35.5 mm
Weight	305 g
Configuration Method	
Master Configuration	Support
Software Configuration	Support
Environment Parameter	
Operating Temperature	-30 °C~60 °C
Protection Grade	IP67
Storage Temperature	-40°C~85°C
Installation Altitude	<2000m
Pollution Degree	II
ESD	Air discharge: ±15 kV, contact discharge: ±8 kV, performance class A; Executive standard: IEC 61000-4-2
EFT	Power port: ±2 kV, communication port: ±2 kV, performance class A; Executive standard: IEC 61000-4-4
Surge	Communication & IO Ports: ±1 kV DM, Power Ports: ±0.5 kV DM, ±0.5 kV CM, Performance Class A; Executive standard: IEC 61000-4-5

RS	Executive standard: IEC 61000-4-3
CS	Executive standard: IEC 61000-4-6
Product Certification	CE certification

3 Hardware Description

