



## IO-Link master ICE1-8IOL-G30L-V1D

- Multiprotocol-compatible
- M12 power connector
- Sturdy metallic housing
- Web-based configuration

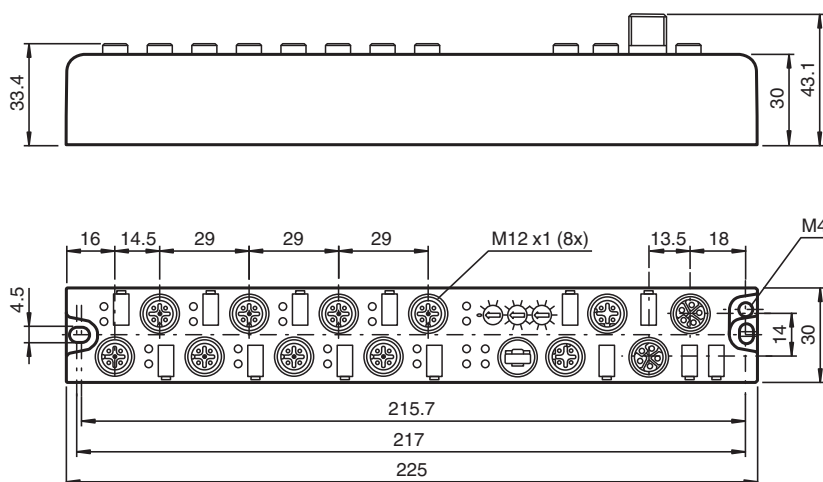
Ethernet IO-Link module with 8 inputs/outputs



### Function

The module is a multiprotocol fieldbus module with 4 type A and 4 type B IO-Link master ports according to IO-Link standard V1.1. The design in fully cast metal housing is resistant to mechanical damage and due to its high degree of protection to environmental influences. The fieldbus module serves as an interface between the controller of a fieldbus system and the field level. Thanks to its multiprotocol capability, the fieldbus module supports the Ethernet communication protocols PROFINET and EtherNet/IP. An L-coded M12 connector plug used for supplying power enables a current rating of up to 2 x 16 A. The inputs and outputs are equipped with A-coded M12 connector plugs. Connection to the fieldbus is achieved using a D-coded M12 connector plug. The communication protocols are configured either manually via a rotary switch or automatically. Status information for each channel is displayed via LEDs as a diagnostic function. An integrated web server enables access to the fieldbus module. Information regarding the status of the module is also displayed and network parameters such as the IP address and subnet mask can be configured.

### Dimensions



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Refer to "General Notes Relating to Pepperl+Fuchs Product Information".

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## Technical Data

<b>General specifications</b>		
UL File Number		E223772
<b>Functional safety related parameters</b>		
MTTF		604 a
<b>Indicators/operating means</b>		
LED indication		see manual
Rotary switch		Setting the fieldbus protocol
<b>Electrical specifications</b>		
Rated operating voltage	$U_e$	18 ... 30 V
Nominal voltage		24 V DC
Current consumption		typ. 180 mA
Current loading capacity		Max. 2 x 16 A per module (Loop-through current via L-coded power supply) Total current: max. 9 A per module
Galvanic isolation		between $U_S$ and $U_L$
<b>Interface 1</b>		
Interface type		Industrial Ethernet
Physical		M12, D-coded
Protocol		PROFINET IO with media redundancy protocol (MRP) EtherNet/IP with Device Level Ring (DLR)
Transfer rate		10/100 Mbps
<b>Inputs/Outputs</b>		
Number/Type		4 x IO-Link Class A (X1 - X4) 4 x IO-Link Class B (X5 - X8) configurable as: max. 8 IO-Link and 4 digital inputs max. 12 digital inputs max. 8 digital outputs and 4 digital inputs short-circuit protected
Sensor supply		max. 500 mA per port (X1 - X8) via L+ (pin 1)
Output rated operating current	$I_e$	max. 500 mA per port (X1 - X8) Via C/Q (pin 4) In addition, a maximum of 2 A per port (X5 - X8) Via $U_{Aux}$ (pin 2)
<b>Directive conformity</b>		
Electromagnetic compatibility		
Directive 2014/30/EU		EN 61000-6-2:2005, EN 61000-6-4:2007+A1:2011
<b>Standard conformity</b>		
Degree of protection		EN 60529:2000
Fieldbus standard		Type 1 according to IEC 61131-2
Emitted interference		EN 61000-6-4:2007+A1:2011
Noise immunity		EN 61000-6-2:2005
Shock resistance		EN 61131-2:2004
<b>Ambient conditions</b>		
Ambient temperature		-20 ... 70 °C (-4 ... 158 °F)
Storage temperature		-40 ... 70 °C (-40 ... 158 °F)
Cold start temperature		-40 °C (-40 °F)
Relative humidity		max. 95 %
Altitude		0 ... 2000 m
Shock and impact resistance		50 g, 11 ms, all axes
Vibration resistance		15 g at 5 - 500 Hz
Pollution degree		3
<b>Mechanical specifications</b>		
Contact elements		PA
Housing length		33.4 mm
Housing width		30 mm
Housing height		225 mm
Degree of protection		IP65/IP67/IP69K

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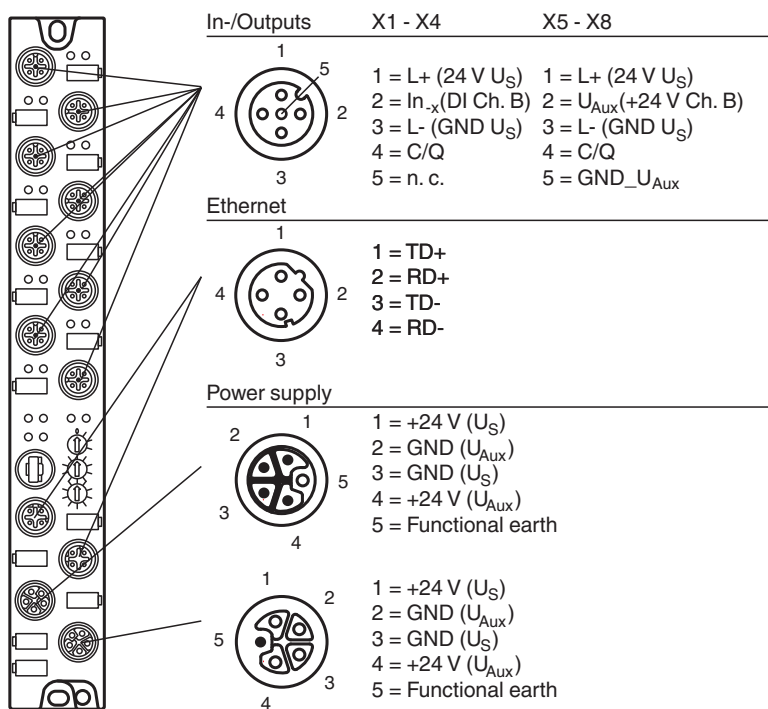
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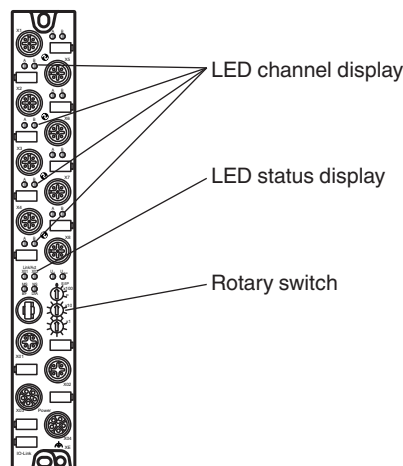
**Technical Data**

Connection	Power Supply M12, L-coded Fieldbus M12, D-coded Inputs/Outputs M12, A-coded
Material	
Contacts	CuSn, gold-plated CuNi, gold-plated
Housing	Diecast zinc
Seal	FKM
Mass	480 g
Tightening torque, fastening screws	1 Nm
Tightening torque, cable gland	max. 0.5 Nm
Construction type	Field housing
Tightening torque of clamping screws	0.5 Nm

**Connection**





















**Assembly**



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## Accessories

	<b>V15L-G-2M-PUR-U-V15L-G</b>	Cordset M12 socket straight to M12 plug straight L-coded, 5-pin, PUR cable grey, UL approved
	<b>V15L-G-5M-PUR-U</b>	Female cordset single-ended M12 straight L-coded, 5-pin, PUR cable grey, UL approved
	<b>V15L-G-BK</b>	Female connector M12 straight L-coded 5-pin, for cable diameter 8 - 13 mm, field-attachable
	<b>V1SD-G-GN2M-PUR-E1S-V45-G</b>	Ethernet bus cable M12 plug straight D-coded to RJ45 Ethernet-coded, 4-pin, PUR cable green, Cat5e, shielded, drag chain suitable
	<b>V1SD-G-GN2M-PUR-E1S-V1D-G</b>	Ethernet bus cable M12 plug straight to M12 plug straight D-coded, 4-pin, PUR cable green, Cat5e, shielded, UL approved, drag chain suitable
	<b>V1SD-G-ABG-PG9</b>	Male connector M12 straight D-coded 4-pin, for cable diameter 5 - 8 mm, shielded, field-attachable
	<b>V1S-T-V1</b>	Y-Splitter M12 plug 5-pin to 2x M12 socket 4-pin A-coded
	<b>V1-G-BK1M-PUR-A-T-V1-G</b>	Y connection cable M12 plug straight A-coded 4-pin to 2x M12 socket straight A-coded 4-pin, 2x PUR cable weld spatter resistant black, UL approved, drag chain suitable, torsion resistant
	<b>V1S-G-PG9</b>	Male connector M12 straight A-coded 4-pin, for cable diameter 6 - 8 mm, field-attachable
	<b>VAZ-V1-B3L</b>	Blind plug for M12 sockets
	<b>MH V1-SCREWDRIVER</b>	Torque screwdriver (0.6 Nm)
	<b>MH V1-BIT M12</b>	plug-in cap M12
	<b>ICA-10DI6DO-G60A-IO</b>	I/O hub with IO-Link interface for 10 digital inputs and 6 digital outputs
	<b>ICA-16DIO-G60AL-IO</b>	I/O hub with IO-Link interface for 16 digital inputs/outputs
	<b>ICA-8DIO-CB10-IO</b>	I/O hub with IO-Link interface
	<b>ICA-AI-I/U-IO-V1</b>	IO-Link converter with analog input (current/voltage)
	<b>ICA-AO-I/U-IO-V1</b>	IO-Link converter with analog output (current/voltage)
	<b>ICA-16DI-G60A-IO</b>	I/O hub with IO-Link interface for 16 digital inputs

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