

IB IL 120 DI 1-PAC - Digital module



2861917

<https://www.phoenixcontact.com/us/products/2861917>

Please be informed that the data shown in this PDF document is generated from our online catalog. Please find the complete data in the user documentation. Our general terms of use for downloads are valid.



Inline, Digital input terminal, Digital inputs: 1, 120 V AC, connection technology: 3-conductor, transmission speed in the local bus: 500 kbps, degree of protection: IP20, including Inline connector and labeling field

Product description

The terminal is designed for use within an Inline station. It is used to acquire digital signals in the AC voltage range.

Your advantages

- Maximum permissible load current: 500 mA
- Connections for one digital sensor

Commercial data

Item number	2861917
Packing unit	1 pc
Minimum order quantity	1 pc
Sales key	DR01
Product key	DRI131
GTIN	4017918907464
Weight per piece (including packing)	76 g
Weight per piece (excluding packing)	39 g
Customs tariff number	85389099
Country of origin	DE

IB IL 120 DI 1-PAC - Digital module

2861917

<https://www.phoenixcontact.com/us/products/2861917>

Technical data

Dimensions

Dimensional drawing	
Width	12.2 mm
Height	119.8 mm
Depth	71.5 mm

Notes

Note on application

Note on application	Only for industrial use
---------------------	-------------------------

Material specifications

Color (Housing)	gray (RAL 7042)
-----------------	-----------------

Interfaces

Inline local bus

Number of interfaces	2
Connection method	Inline data jumper
Transmission speed	500 kbps

System properties

Programming data (LocalbusSlave)

Length code (hex)	C2
ID code (dec.)	190
Length code (dec)	194
Process data channel	2 bit
Input address area	2 bit
Output address area	0 Byte
Parameter channel (PCP)	0 Byte
Register length (bus)	2 bit

Fieldbus data telegram (PROFIBUS)

Required parameter data	1 Byte
Required configuration data	4 Byte

Input data

IB IL 120 DI 1-PAC - Digital module



2861917

<https://www.phoenixcontact.com/us/products/2861917>

Digital:

Input name	Digital inputs
Description of the input	IEC 61131-2 type 1
Number of inputs	1
Connection method	Spring-cage connection
Connection technology	3-conductor
Input voltage	120 V AC
Input voltage range "0" signal	0 V AC ... 40 V AC
Input voltage range "1" signal	77 V AC ... 135 V AC
Nominal input voltage U_{IN}	120 V AC
Nominal input current at U_{IN}	8.1 mA (at nominal voltage)
Sensor current per channel	max. 500 mA

Product properties

Product type	I/O component
Product family	Inline
Type	modular
Scope of supply	including Inline connector and labeling field
No. of channels	1

Insulation characteristics

Overvoltage category	III (IEC 60664-1, EN 60664-1)
Pollution degree	2 (IEC 60664-1, EN 60664-1)

Electrical properties

Maximum power dissipation for nominal condition	1.2 W
---	-------

Potentials: Communications power (U_L)

Supply voltage	7.5 V DC (via voltage jumper)
Current draw	max. 30 mA

Potentials: I/O supply

Supply voltage	120 V AC (via voltage jumper)
Current draw	0.25 A

Supply: Module electronics

Supply voltage	120 V AC
Supply voltage range	108 V AC ... 135 V AC

Electrical isolation/isolation of the voltage ranges

Test voltage: 5 V supply, incoming remote bus/7.5 V supply (bus logics)	500 V AC, 50 Hz, 1 min
Test voltage: 5 V supply, outgoing remote bus/7.5 V supply (bus logics)	500 V AC, 50 Hz, 1 min
Test voltage: 7.5 V supply (bus logics) / I/O area	2500 V AC, 50 Hz, 1 min
Test voltage: Routine test	1200 V AC, 50 Hz, 1 min

Connection data

Connection technology

Connection name	Inline connector
-----------------	------------------

Inline connector

Connection method	Spring-cage connection
Conductor cross-section, rigid	0.08 mm ² ... 1.5 mm ²
Conductor cross-section, flexible	0.08 mm ² ... 1.5 mm ²
Conductor cross-section AWG	28 ... 16
Stripping length	8 mm

Environmental and real-life conditions

Ambient conditions

Ambient temperature (operation)	-25 °C ... 55 °C
Degree of protection	IP20
Air pressure (operation)	80 kPa ... 160 kPa (up to 2000 m above sea level)
Air pressure (storage/transport)	70 kPa ... 106 kPa (up to 3000 m above sea level)
Ambient temperature (storage/transport)	-25 °C ... 85 °C
Permissible humidity (operation)	10 % ... 95 % (non-condensing)
Permissible humidity (storage/transport)	10 % ... 95 % (non-condensing)

Mechanical test

Vibration resistance in accordance with EN 60068-2-6/IEC 60068-2-6	5g
Shock in accordance with EN 60068-2-27/IEC 60068-2-27	25g

Standards and regulations

Protection class	I (IEC 61140, EN 61140, VDE 0140-1)
------------------	-------------------------------------

Mounting

Mounting type	DIN rail mounting
---------------	-------------------

IB IL 120 DI 1-PAC - Digital module



2861917

<https://www.phoenixcontact.com/us/products/2861917>

Drawings

Dimensional drawing



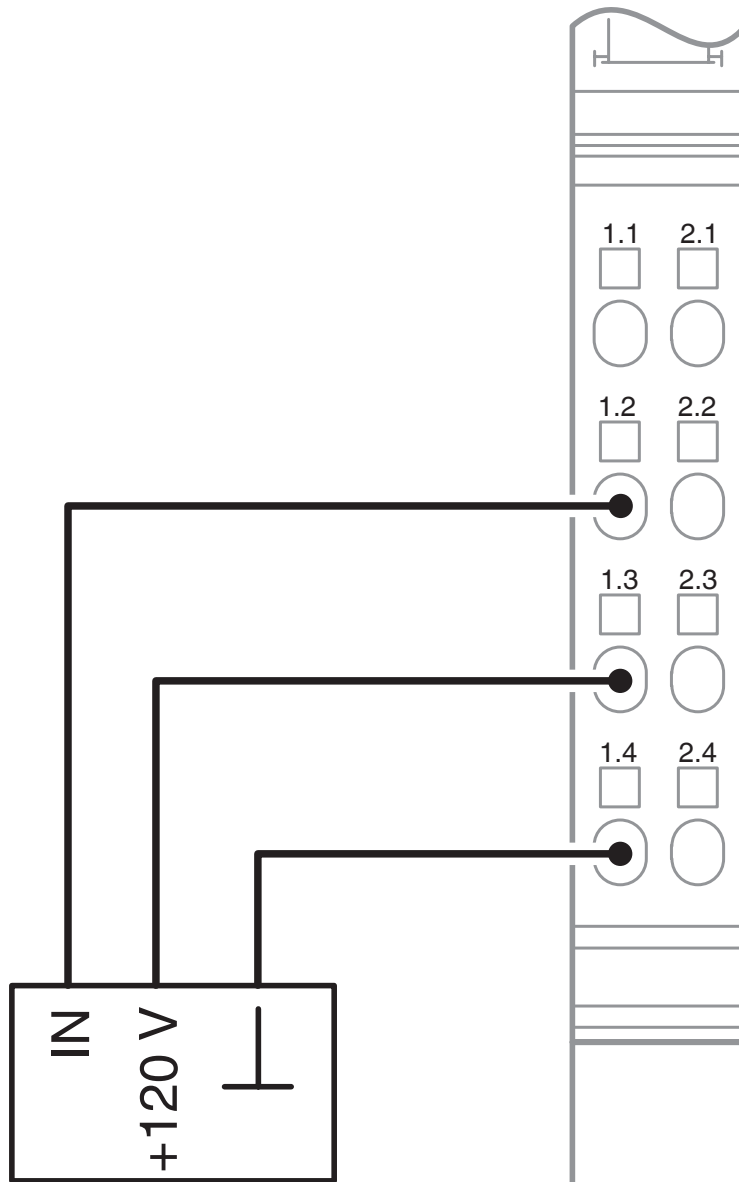
IB IL 120 DI 1-PAC - Digital module

2861917

<https://www.phoenixcontact.com/us/products/2861917>



Connection diagram



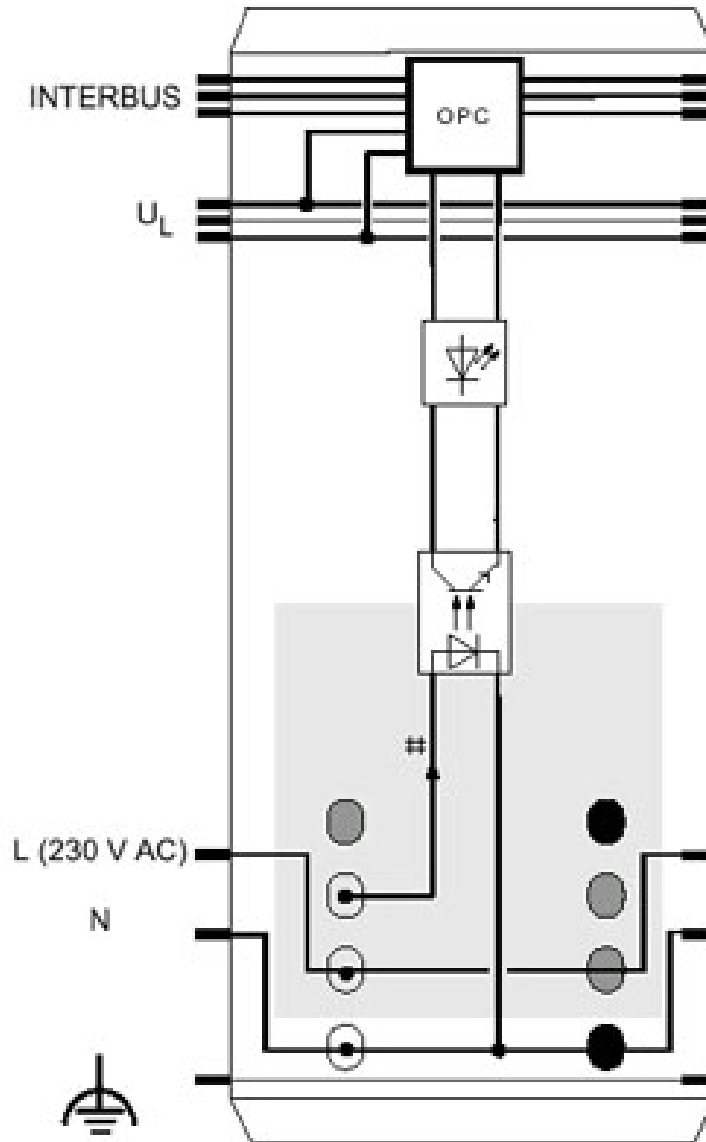
IB IL 120 DI 1-PAC - Digital module

2861917

<https://www.phoenixcontact.com/us/products/2861917>



Block diagram



IB IL 120 DI 1-PAC - Digital module



2861917

<https://www.phoenixcontact.com/us/products/2861917>

Approvals

To download certificates, visit the product detail page: <https://www.phoenixcontact.com/us/products/2861917>



cULus Recognized
Approval ID: E140324

IB IL 120 DI 1-PAC - Digital module



2861917

<https://www.phoenixcontact.com/us/products/2861917>

Classifications

ECLASS

ECLASS-13.0	27242604
ECLASS-15.0	27242604

ETIM

ETIM 10.0	EC001599
-----------	----------

UNSPSC

UNSPSC 21.0	32151600
-------------	----------

2861917

<https://www.phoenixcontact.com/us/products/2861917>

Environmental product compliance

EU RoHS

Fulfills EU RoHS substance requirements	Yes
Exemption	7(c)-I

China RoHS

Environment friendly use period (EFUP)	EFUP-50
	An article-related China RoHS declaration table can be found in the download area for the respective article under "Manufacturer declaration". For all articles with EFUP-E, no China RoHS declaration table issued and required.

EU REACH SVHC

REACH candidate substance (CAS No.)	No substance above 0.1 wt%
-------------------------------------	----------------------------

EF3.1 Climate Change

CO2e kg	1.744 kg CO2e
---------	---------------

Phoenix Contact 2026 © - all rights reserved
<https://www.phoenixcontact.com>

Phoenix Contact USA
586 Fulling Mill Road
Middletown, PA 17057, United States
(+717) 944-1300
info@phoenixcon.com