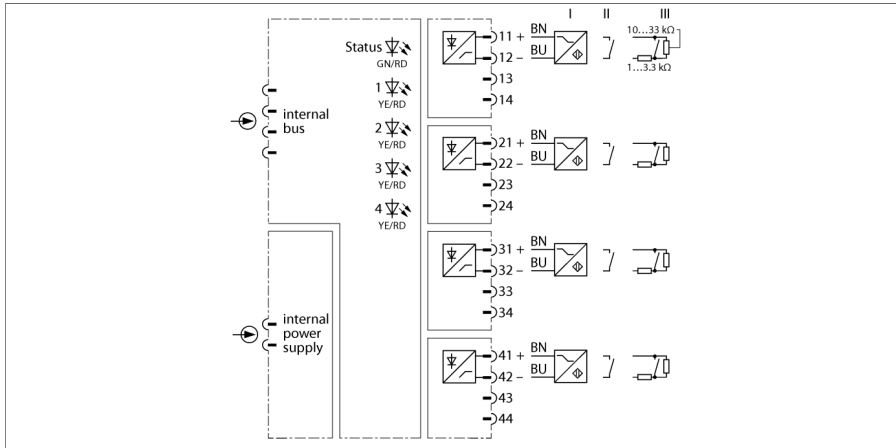


excom I/O System

Input Module, Digital, 4-channel

DI401EX



The input module DI401-EX is used for the connection of NAMUR sensors (DIN EN 60947-5-6) or mechanical contacts.

When wire-break or short-circuit monitoring are activated, mechanical contacts can only be connected with a corresponding resistor circuitry (WM1, Ident no. 0912101).

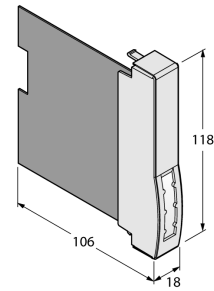
The module features protection class Ex ib IIC and can be mounted in zone 1 in combination with *excom*®. The explosion protection category of the inputs is Ex ia IIC. The inputs are galvanically isolated from each other.

The behaviour of the inputs can be adjusted via the PROFIBUS-DP master. The following parameters can be adjusted: switching behaviour, switch-on delay, default value, wire-break and short circuit monitoring.

- Input module for intrinsically safe sensors
- Complete galvanic isolation

Dimensions

Type	DI401EX
ID	6884232
Supply voltage	Via module rack, central power supply module
Power consumption	≤ 2 W
Galvanic isolation	Complete galvanic isolation acc. to EN 60079-11
Number of channels	4
Input circuits	acc. to EN 60947-5-6 (NAMUR) Intrinsically safe acc. to EN 60079-11
No-load voltage	8.2 VDC
Short-circuit current	2.7 mA
Switching threshold on/off	type 1.8 / type 1.3 mA
Switching frequency	≤ 100 Hz
Short-circuit	< 367 Ω
Wire-break	< 0.15 mA
Ex approval acc. to conformity certificate	IECEX PTB 15.0043
Ex approval acc. to conformity certificate	PTB 14 ATEX 2003
Device designation	Ⓢ II 2 (1) G Ex ib [ia] IIC T4
Device marking	Ⓢ II (1) D [Ex ia] IIIC
Displays/Operating elements	
Operational readiness	1 × green/red
State/ Fault	4 × yellow/red
Housing material	Plastic
Connection mode	module, plugged on rack
Protection class	IP20
Ambient temperature	-20...+70 °C
Relative humidity	≤ 93 % at 40 °C acc. to IEC 60068-2-78
Vibration test	Acc. to IEC 60068-2-6
Shock test	Acc. to IEC 60068-2-27
EMC	acc. EN 61326-1 (2013) acc. to Namur NE21 (2012)
MTTF	111 years acc. to SN 29500 (Ed. 99) 40 °C
Dimensions	18 x 118 x 106 mm
Approvals	ATEX cFMus cFM IECEX KOSHA EAC Ex UKCA CE



Accessories

Type code	Ident no.		Dimension drawing
excom-RMD1-BU	100020744	The resistor module prevents wire-break detection and short-circuit detection in digital input modules. For analog input modules, overflow and underflow messages are also suppressed.	