

Digital input card for XC100/200, 24 V DC, 8DI

XIOC-8DI Part no. Article no. 257891



Delivery programme

Function	Digital modules
	Compact I/O system for connection to XC100/200 Modular PLCs XC100/200 expandable with up to 15 XI/OC modules Optionally, screw terminals or spring-loaded terminals for digital/analog modules
Description	8 inputs, 24 V DC

Technical data

General			
Standards			IEC/EN 61131-2 EN 50178
Ambient temperature		°C	0 - +55
Storage	θ	°C	-25 - +70
Vibration resistance			10 - 57 Hz ±0.075 mm 57 - 150 Hz ±1.0 mm
Mechanical shock resistance		g	15 Shock duration 11 ms
Impact resistance			500 g) © 50 mm ±25 g
Overvoltage category/pollution degree			11/2
Protection class			1
Degree of Protection			IP20
Emitted interference			DIN/EN 55011/22, Class A
Weight		kg	0.16
Power supply			
Rated voltage	U _e	V DC	24 (12)
Adminsible range			20 4 20 0 /11 0 14 4\

- Control Company			
Rated voltage	U _e	V DC	24 (12)
Admissible range			20.4 – 28.8 (11.8 – 14.4)
Neutral poles			
Duration of dip		ms	10
Repetition rate		s	1
Residual ripple		%	≤ ₅
Maximum power loss	P_{v}	W	0.8

Innuts

inputs		
Input type		DC input
Input voltage	V DC	24
Admissible range	V DC	20.4 - 28.8
Input current	mA	Normally 6.9
Input impedance		Normally 3.5 $k\Omega$
Voltage level to IEC 61131-2, limit value type 1		
ON	V	≦ _{15 DC}
OFF	V	≦ _{5 DC}
Input delay		
Off → On	ms	
Debounce ON	ms	≦ 5 (normally 4)
$0n \rightarrow 0ff$	ms	

Debounce ON	ms	≦ _{5 (normally 4)}
Input channels	Qty.	8
Channels with the same reference potential	Number	8
Potential isolation		Opto-isolated
Indicating elements		LED (green)
Terminals		Plug-in terminal block
	Number	
Internal current consumption (5 V DC)	mA	26
Outputs		
Short-circuit protection		Yes

Yes

Design verification as per IEC/EN 61439

Short-circuit protection

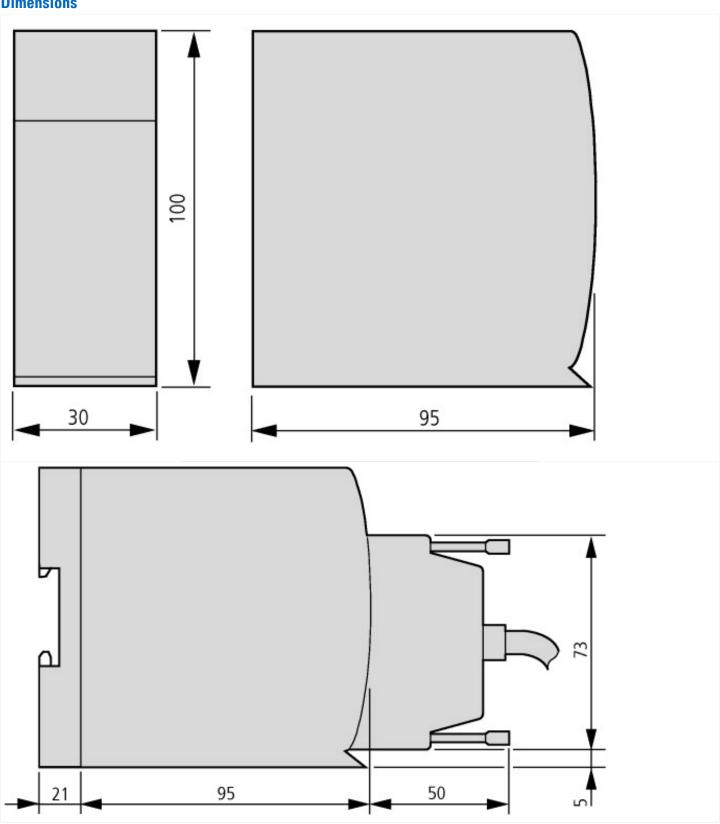
Design vermoation as per 120/214 01433			
Technical data for design verification			
Rated operational current for specified heat dissipation	In	Α	0
Heat dissipation per pole, current-dependent	P _{vid}	W	0
Equipment heat dissipation, current-dependent	P _{vid}	W	0
Static heat dissipation, non-current-dependent	P _{vs}	W	0.8
Heat dissipation capacity	P _{diss}	w	0
Operating ambient temperature min.		°C	0
Operating ambient temperature max.		°C	55
IEC/EN 61439 design verification			
10.2 Strength of materials and parts			
10.2.2 Corrosion resistance			Meets the product standard's requirements.
10.2.3.1 Verification of thermal stability of enclosures			Meets the product standard's requirements.
10.2.3.2 Verification of resistance of insulating materials to normal heat			Meets the product standard's requirements.
10.2.3.3 Verification of resistance of insulating materials to abnormal heat and fire due to internal electric effects			Meets the product standard's requirements.
10.2.4 Resistance to ultra-violet (UV) radiation			Meets the product standard's requirements.
10.2.5 Lifting			Does not apply, since the entire switchgear needs to be evaluated.
10.2.6 Mechanical impact			Does not apply, since the entire switchgear needs to be evaluated.
10.2.7 Inscriptions			Meets the product standard's requirements.
10.3 Degree of protection of ASSEMBLIES			Meets the product standard's requirements.
10.4 Clearances and creepage distances			Meets the product standard's requirements.
10.5 Protection against electric shock			Does not apply, since the entire switchgear needs to be evaluated.
10.6 Incorporation of switching devices and components			Does not apply, since the entire switchgear needs to be evaluated.
10.7 Internal electrical circuits and connections			Is the panel builder's responsibility.
10.8 Connections for external conductors			Is the panel builder's responsibility.
10.9 Insulation properties			
10.9.2 Power-frequency electric strength			Is the panel builder's responsibility.
10.9.3 Impulse withstand voltage			Is the panel builder's responsibility.
10.9.4 Testing of enclosures made of insulating material			Is the panel builder's responsibility.
10.10 Temperature rise			The panel builder is responsible for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.
10.11 Short-circuit rating			Is the panel builder's responsibility.
10.12 Electromagnetic compatibility			Is the panel builder's responsibility.
10.13 Mechanical function			The device meets the requirements, provided the information in the instruction leaflet (IL) is observed.

Approvals

Product Standards	IEC: see Technical Data; UL508; CSA-C22.2 No. 0-M; CSA-C22.2 No. 142-M; CE marking
UL File No.	E135462
UL Category Control No.	NRAQ
CSA File No.	012528
CSA Class No.	2252-01

North America Certification	UL listed, CSA certified
Specially designed for North America	No
Current Limiting Circuit-Breaker	No
Degree of Protection	IEC: IP20, UL/CSA Type: -

Dimensions



Additional product information (links)

MN05002002Z (AWB2725-1452) XIOC signal mo	odules
MN05002002Z (AWB2725-1452) XIOC- Signalmodule - Deutsch	ftp://ftp.moeller.net/DOCUMENTATION/AWB_MANUALS/MN05002002Z_DE.pdf
MN05002002Z (AWB2725-1452) XIOC signal modules - English	ftp://ftp.moeller.net/D0CUMENTATION/AWB_MANUALS/MN05002002Z_EN.pdf