

Field potential distributor module; 18 channels; GND



**Part no.**                    **XN-322-18PD-M**  
**178769**

| <b>General specifications</b>            |  |  |
|--|--|--|
| Product name                             |  | Eaton XN-322 Power distributor   |
| Part no.                                 |  | XN-322-18PD-M  |
| EAN                                      |  | 7640130098336  |
| Product Length/Depth                     |  | 104.2 millimetre   |
| Product height                           |  | 16.8 millimetre  |
| Product width                            |  | 80.3 millimetre  |
| Product weight                           |  | 0.055 kilogram   |
| Certifications                           |  | IEC/EN 61000-6-2<br>UL File No.: E247993<br>UL508<br>IEC/EN 61000-6-4<br>CE<br>IEC/EN 61131-2                              |
| Product Tradename                        |  | XN-322   |
| Product Type                             |  | Power distributor  |
| Product Sub Type                         |  | None   |
| Catalog Notes                            |  | Power distribution with XN-322 slice module in XN300 I/O system, 18 channels, GND.<br>Power Distribution, 18 channels, GND |
| <b>Features &amp; Functions</b>          |  |  |
| Electric connection type                 |  | Plug-in connection   |
| Features                                 |  | Fieldbus connection over separate bus coupler possible   |
| <b>General information</b>               |  |  |
| Degree of protection                     |  | IP20   |
| Mounting method                          |  | Rail mounting possible   |
| Overvoltage category                     |  | III  |
| Pollution degree                         |  | 3  |
| Product category                         |  | XN-322 power supply module   |
| Type                                     |  | XN300 power supply module  |
| Used with                                |  | XN300<br>XN-312-...  |
| Voltage type                             |  | DC   |
| <b>Ambient conditions, mechanical</b>    |  |  |
| Height of fall (IEC/EN 60068-2-32) - max |  | 1 m  |
| Mounting position                        |  | Horizontal   |
| Shock resistance                         |  | 15 g, Mechanical, Half-sinusoidal shock 11 ms, 18 Impacts  |
| Vibration resistance                     |  | 5 - 8.4 / 8.4 -150 Hz, 3,5 mm / 1 g  |
| <b>Climatic environmental conditions</b> |  |  |
| Air pressure                             |  | 795 - 1080 hPa (operation)   |
| Ambient operating temperature - min      |  | 0 °C   |
| Ambient operating temperature - max      |  | 60 °C  |
| Ambient storage temperature - min        |  | -20 °C   |
| Ambient storage temperature - max        |  | 85 °C  |
| Climatic proofing                        |  | Damp heat, constant, to IEC 60068-2-3<br>Dry heat to IEC 60068-2-2   |
| Environmental conditions                 |  | Condensation: prevent with appropriate measures  |
| Relative humidity                        |  | 0 - 95 % (non-condensing)  |
| <b>Electro magnetic compatibility</b>    |  |  |
| Air discharge                            |  | 4 kV (Contact discharge)<br>8 kV (Air discharge)   |
| Burst impulse                            |  | 2 kV, Supply cable   |

|  |  |   |
|--|--|---|
|  |  | 1 kV, Signal cable  |
| Electromagnetic fields   |  | 10 V/m at 0.08 - 1.0 GHz (according to IEC EN 61000-4-3)<br>1 V/m at 2 - 2.7 GHz (according to IEC EN 61000-4-3)<br>3 V/m at 1.4 - 2 GHz (according to IEC EN 61000-4-3)  |
| Emitted interference   |  | 47 dB (at 230 - 1000 MHz, Class A, radiated, high frequency)<br>40 dB (at 30 - 230 MHz, Class A, radiated, high frequency)  |
| Radiated RFI   |  | 10 V  |
| Surge rating   |  | 0.5/0.5 kV, Supply cable, balanced/unbalanced, EMC<br>1 kV, Signal cable, unbalanced, EMC   |
| Voltage dips   |  | Voltage dips: 10 ms/Voltage fluctuations: Yes   |
| <b>Terminal capacities</b>   |  |   |
| Terminal capacity  |  | 24 - 16 AWG<br>0.25 - 1.5 mm <sup>2</sup> , with ferrules with plastic collar according to DIN 46228-1 (ferrules crimped gas-tight)<br>0.2 - 1.5 mm <sup>2</sup> , flexible without ferrule, H07V-K<br>0.2 - 1.5 mm <sup>2</sup> , solid, H07V-U<br>0.25 - 1.5 mm <sup>2</sup> , with ferrules without plastic collar according to DIN 46228-1 (ferrules crimped gas-tight) |
| Gauge pin  |  | A1 (according to IEC/EN 60947-1)  |
| Stripping length (main cable)  |  | 10 mm   |
| Insulating material group  |  | I   |
| <b>Electrical rating</b>   |  |   |
| Rated operational current (I <sub>e</sub> ) - max                                |  | 8 A   |
| Rated operational voltage  |  | 160 V (terminations)  |
| Supply voltage at AC, 50 Hz - min  |  | 0 V AC  |
| Supply voltage at AC, 50 Hz - max  |  | 0 V AC  |
| Supply voltage at DC - min   |  | 18 V DC   |
| Supply voltage at DC - max   |  | 30 V DC   |
| <b>Communication</b>   |  |   |
| Connection type  |  | Push-in spring-cage terminal (plug-in connection), Connection design in TOP direction   |
| <b>Input/Output</b>  |  |   |
| Load current   |  | Not specified by plug manufacturer  |
| <b>Safety</b>  |  |   |
| Explosion safety category for dust   |  | None  |
| Explosion safety category for gas  |  | None  |
| <b>Design verification</b>   |  |   |
| Equipment heat dissipation, current-dependent P <sub>vid</sub>                   |  | 0 W   |
| Heat dissipation capacity P <sub>diss</sub>                                      |  | 0 W   |
| Heat dissipation per pole, current-dependent P <sub>vid</sub>                    |  | 0 W   |
| Rated operational current for specified heat dissipation (I <sub>n</sub> )       |  | 0 A   |
| Static heat dissipation, non-current-dependent P <sub>vs</sub>                   |  | 0 W   |
| 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 Resist. of insul. mat. to abnormal heat/fire by internal elect. 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.  |
| 10.9.2 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.                         |

## Technical data ETIM 9.0

|  |   |         |
|--|---|---------|
| Programmable logic controllers PLC (EG000024) / Fieldbus, decentr. periphery - power supply/segment module (EC001600)  |   |         |
| Electric engineering, automation, process control engineering / Control, Process Control System (PCS) / Field bus, decentralized peripheral / Field bus, decentralized peripheral - feed and segment module (ec1@ss13-27-24-26-10 [BAA071018]) |   |         |
| Supply voltage AC 50 Hz  | V | 0 - 0   |
| Supply voltage AC 60 Hz  | V | 0 - 0   |
| Supply voltage DC  | V | 18 - 30 |
| Voltage type (supply voltage)  |   | DC      |
| Number of HW-interfaces industrial Ethernet  |   | 0       |
| Number of interfaces PROFINET  |   | 0       |
| Number of HW-interfaces RS-232   |   | 0       |
| Number of HW-interfaces RS-422   |   | 0       |
| Number of HW-interfaces RS-485   |   | 0       |
| Number of HW-interfaces serial TTY   |   | 0       |
| Number of HW-interfaces parallel   |   | 0       |
| Number of HW-interfaces wireless   |   | 0       |
| Number of HW-interfaces USB  |   | 0       |
| Number of HW-interfaces other  |   | 1       |
| With optical interface   |   | No      |
| Supporting protocol for EtherCAT   |   | No      |
| Supporting protocol for TCP/IP   |   | No      |
| Supporting protocol for PROFIBUS   |   | No      |
| Supporting protocol for CAN  |   | No      |
| Supporting protocol for INTERBUS   |   | No      |
| Supporting protocol for ASI  |   | No      |
| Supporting protocol for KNX  |   | No      |
| Supporting protocol for Modbus   |   | No      |
| Supporting protocol for Data-Highway   |   | No      |
| Supporting protocol for DeviceNet  |   | No      |
| Supporting protocol for SUCONET  |   | No      |
| Supporting protocol for LON  |   | No      |
| Supporting protocol for PROFINET IO  |   | No      |
| Supporting protocol for PROFINET CBA   |   | No      |
| Supporting protocol for SERCOS   |   | No      |
| Supporting protocol for Foundation Fieldbus  |   | No      |
| Supporting protocol for EtherNet/IP  |   | No      |
| Supporting protocol for AS-Interface Safety at Work  |   | No      |
| Supporting protocol for DeviceNet Safety   |   | No      |
| Supporting protocol for INTERBUS-Safety  |   | No      |
| Supporting protocol for PROFIsafe  |   | No      |
| Supporting protocol for SafetyBUS p  |   | No      |
| Supporting protocol for other bus systems  |   | No      |
| Radio standard Bluetooth   |   | No      |
| Radio standard WLAN 802.11   |   | No      |
| Radio standard GPRS  |   | No      |
| Radio standard GSM   |   | No      |
| Radio standard UMTS  |   | No      |
| System accessory   |   | Yes     |
| Degree of protection (IP)  |   | IP20    |

| Type of electric connection  |  |    | Plug-in connection |
|--|--|----|--------------------|
| With potential separation  |  |    | No                 |
| With power supply module   |  |    | No                 |
| Suitable as segment module   |  |    | No                 |
| Remote module  |  |    | No                 |
| Fieldbus connection over separate bus coupler possible             |  |    | Yes                |
| Bus diagnosis possible   |  |    | No                 |
| Rail mounting possible   |  |    | Yes                |
| Wall mounting/direct mounting                                      |  |    | No                 |
| Front built-in possible  |  |    | No                 |
| Rack-assembly possible   |  |    | No                 |
| Suitable for safety functions                                      |  |    | No                 |
| SIL according to IEC 61508   |  |    | None               |
| Performance level according to EN ISO 13849-1                      |  |    | None               |
| Appendant operation agent (Ex ia)                                  |  |    | No                 |
| Appendant operation agent (Ex ib)                                  |  |    | No                 |
| Explosion safety category for gas                                  |  |    | None               |
| Explosion safety category for dust                                 |  |    | None               |
| Certified for UL hazardous location class I                        |  |    | No                 |
| Certified for UL hazardous location class II                       |  |    | No                 |
| Certified for UL hazardous location class III                      |  |    | No                 |
| Certified for UL hazardous location division 1                     |  |    | No                 |
| Certified for UL hazardous location division 2                     |  |    | No                 |
| Certified for UL hazardous location group A (acetylene)            |  |    | No                 |
| Certified for UL hazardous location group B (hydrogen)             |  |    | No                 |
| Certified for UL hazardous location group C (ethylene)             |  |    | No                 |
| Certified for UL hazardous location group D (propane)              |  |    | No                 |
| Certified for UL hazardous location group E (metal dusts)          |  |    | No                 |
| Certified for UL hazardous location group F (carbonaceous dusts)   |  |    | No                 |
| Certified for UL hazardous location group G (non-conductive dusts) |  |    | No                 |
| Width  |  | mm | 80.3               |
| Height   |  | mm | 16.8               |
| Depth  |  | mm | 104.2              |