

# Product data sheet

Specifications



## Standalone processor, Modicon M580, 12MB, 61 Ethernet devices, 16 Remote I/O racks

BMEP583040

### Main

Range of product	Modicon M580
Product or component type	Processor module

### Complementary

Number of racks	8
Local I/O processor capacity (discrete)	3072 I/O
Local I/O processor capacity (analog)	768 I/O
Number of application specific channel (local rack)	108
Application specific I/O	Serial link Motion control Counter SSI encoder HART Accurate time stamping
Checks	Process control
Control channels	Programmable loops
Integrated connection type	1 Ethernet TCP/IP for service port 2 Ethernet TCP/IP for device network USB type mini B
Number of remote I/O station	16 - 2 rack(s) per remote drop
Number of distributed equipment	64
Communication module processor capacity	8 AS-Interface module 3 Ethernet communication module
Communication service	RIO scanner DIO scanner
Memory description	Expandable flash, 4 GB for data storage Integrated RAM, 10 kB for system memory Integrated RAM, 12 MB for program Integrated RAM, 1024 kB for data
Application structure	2 auxiliary tasks 1 cyclic/periodic master task 128 event tasks 1 periodic fast task
Number of instructions per ms	15 Kinst/ms 65 % Boolean + 35 % fixed arithmetic 20 Kinst/ms 100 % Boolean
Current consumption	295 mA at 24 V DC

<b>MTBF reliability</b>	600000 H
<b>Marking</b>	CE
<b>Environment</b>	
<b>Vibration resistance</b>	3 gn
<b>Shock resistance</b>	30 gn
<b>Ambient air temperature for operation</b>	0...60 °C
<b>Ambient air temperature for storage</b>	-40...85 °C
<b>Operating altitude</b>	0...2000 m 2000...5000 m with derating factor
<b>Relative humidity</b>	5...95 % at 55 °C without condensation
<b>IP degree of protection</b>	IP20
<b>Directives</b>	2014/35/EU - low voltage directive 2014/30/EU - electromagnetic compatibility
<b>Product certifications</b>	CE UL CSA RCM EAC Merchant Navy
<b>Standards</b>	EN 61131-2 EN/IEC 61010-2-201 UL 61010-2-201 CSA C22.2 No 61010-2-201 IACS E10 EN/IEC 61000-6-5, interface type 1 and type 2 EN/IEC 61850-3, location G
<b>Environmental characteristic</b>	Hazardous location class I division 2
<b>Supply</b>	Internal power supply via rack
<b>Status LED</b>	1 LED (green) processor running (RUN) 1 LED (red) processor or system fault (ERR) 1 LED (red) I/O module fault (I/O) 1 LED (green) download in progress (DL) 1 LED (red) memory card or CPU flash fault (BACKUP) 1 LED (green/red) ETH MS (Ethernet port configuration status) 1 LED (green/red) Eth NS (Ethernet network status)
<b>Net weight</b>	0.849 kg

## Packing Units

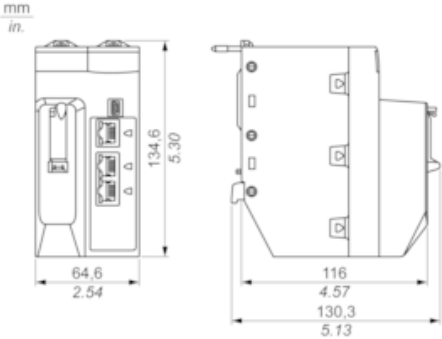
<b>Unit Type of Package 1</b>	PCE
<b>Number of Units in Package 1</b>	1
<b>Package 1 Height</b>	8.5 cm
<b>Package 1 Width</b>	18.0 cm
<b>Package 1 Length</b>	25.0 cm
<b>Package 1 Weight</b>	870.0 g
<b>Unit Type of Package 2</b>	S03
<b>Number of Units in Package 2</b>	6
<b>Package 2 Height</b>	30.0 cm
<b>Package 2 Width</b>	30.0 cm
<b>Package 2 Length</b>	40.0 cm
<b>Package 2 Weight</b>	5.64 kg

## Offer Sustainability

<b>Sustainable offer status</b>	Green Premium product
<b>REACH Regulation</b>	<a href="#">REACH Declaration</a>
<b>EU RoHS Directive</b>	Pro-active compliance (Product out of EU RoHS legal scope) <a href="#">EU RoHS Declaration</a>
<b>Mercury free</b>	Yes
<b>China RoHS Regulation</b>	<a href="#">China RoHS declaration</a>
<b>RoHS exemption information</b>	<a href="#">Yes</a>
<b>Circularity Profile</b>	<a href="#">End of Life Information</a>
<b>WEEE</b>	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins
<b>California proposition 65</b>	WARNING: This product can expose you to chemicals including: Lead and lead compounds, which is known to the State of California to cause cancer and birth defects or other reproductive harm. For more information go to <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a>

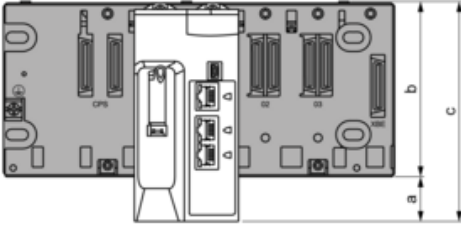
**CPU Module Only**

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**Modules Mounted on Racks**

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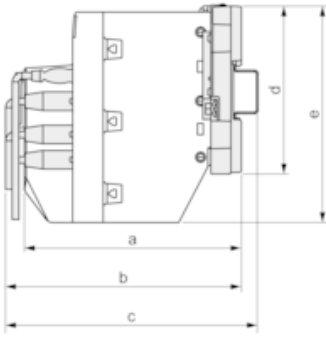
**a:** additional space below the rack to accommodate the height of the CPU. For an X Bus rack, the value is 30.9 mm (1.217 in.); for an Ethernet rack, the value is 29.49 mm (1.161 in.).

**b:** the height of the rack. For an X Bus rack, the height is 103.7 mm (4.083 in.); for an Ethernet rack, the height is 105.11 mm (4.138 in.).

**c:** the height of the main local rack, 134.6 mm (5.299 in.)

**Modules and Cables Mounted in an Enclosure**

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**a:** enclosure depth: 135 mm (5.315 in.)

**b:** wiring + module depth: > 146 mm (5.748 in.)

**c:** wiring + module + DIN rail depth: > 156 mm (6.142 in.)

**d:** rack height: for an X Bus rack 103.7 mm (4.083 in.); for an Ethernet rack, 105.11 mm (4.138 in.)

**e:** module height: 134.6 mm (5.299 in.)

**Recommended replacement(s)**