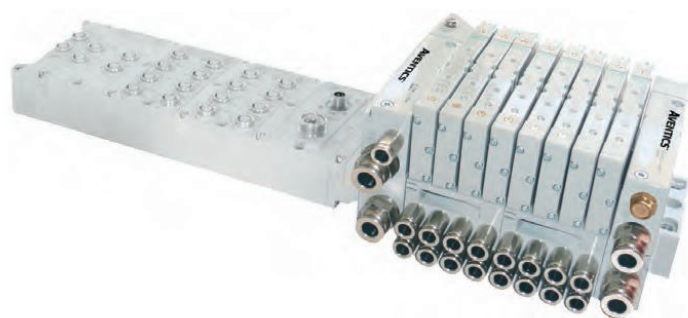


Series 501



AVENTICS™

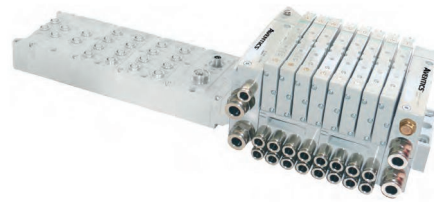
**AVENTICS Series 501 Directional
Control Valves**



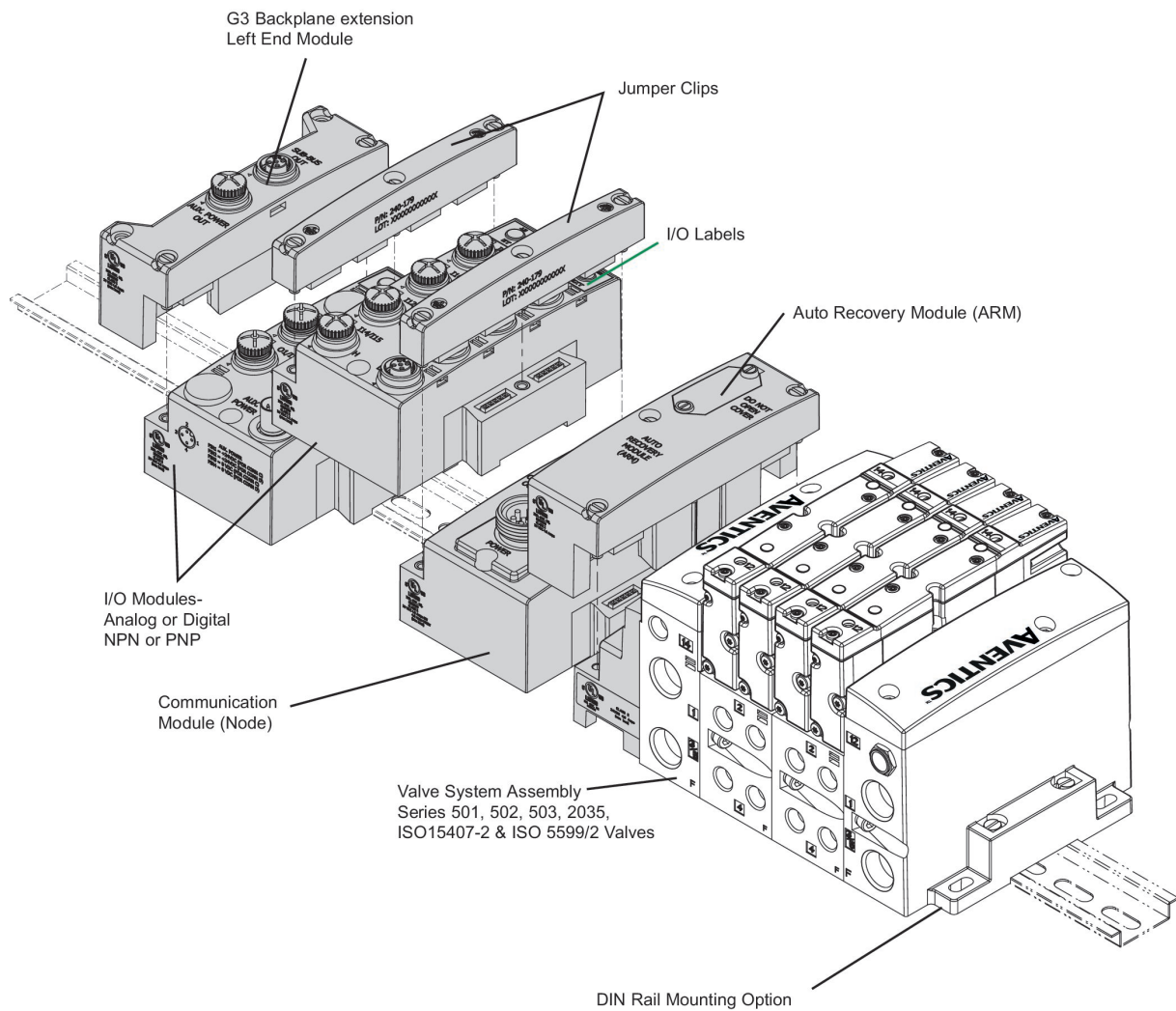
Series 501

The AVENTICS Series 501 is a line of general purpose automation valves designed for directional control and piloting applications requiring compact size, high flow capability, and energy savings. Engineers can achieve the flow of a 15 mm to 20 mm valves in a more compact package, saving space, cost, and energy in their machine designs. In addition, no other valve in its class offers such a broad range of pressure regulator, pressure shut-off, and exhaust flow control accessories. The 501 Series valve's pressure shut —off option permits users to replace individual valves without stopping their production process — reducing line downtime and maintenance.

- Modular design permits easy configuration and modification
- Sub-base mounted valve is well suited for in-panel valve piloting applications
- High flow rate, compact size, and optional mounting plate enable efficient use of cabinet space
- Dual three-way version enables placement of two, three-way valves in the space of a four-way valve
- Compatible with AVENTICS Series G3 and 580 electronic fieldbus platforms
- 580 CHARM node is compatible with DeltaV distributed control system with electronic marshalling



Accessories overview



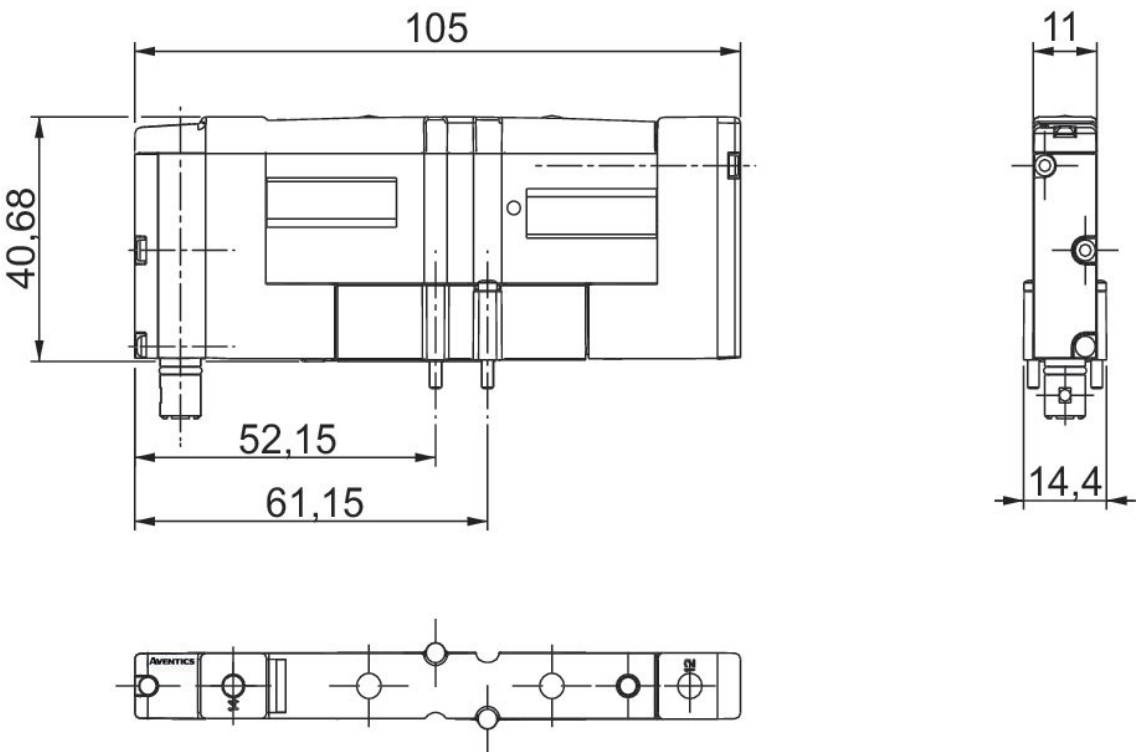
2x3/2-directional valve, Series 501

Double Solenoid
Electrically



Manual override	Valve function	Operational voltage	Pilot	Voltage tolerance DC	Power consumption DC [W]	Part No.
without detent	NC/NC	24 V DC	External	-15% / +10%	0.68	R501A2B-D0MA00F1
without detent	NO/NO	24 V DC	External	-15% / +10%	0.68	R501A2BA0MA00F1
without detent	NC/NO	24 V DC	External	-15% / +10%	0.68	R501A2BC0MA00F1
with detent	NC/NC	24 V DC	External	-15% / +10%	0.68	R501A2B-D0M11BF1
with detent	NO/NO	24 V DC	External	-15% / +10%	0.68	R501A2BA0M11BF1
with detent	NC/NO	24 V DC	External	-15% / +10%	0.68	R501A2BC0M11BF1

Dimensions



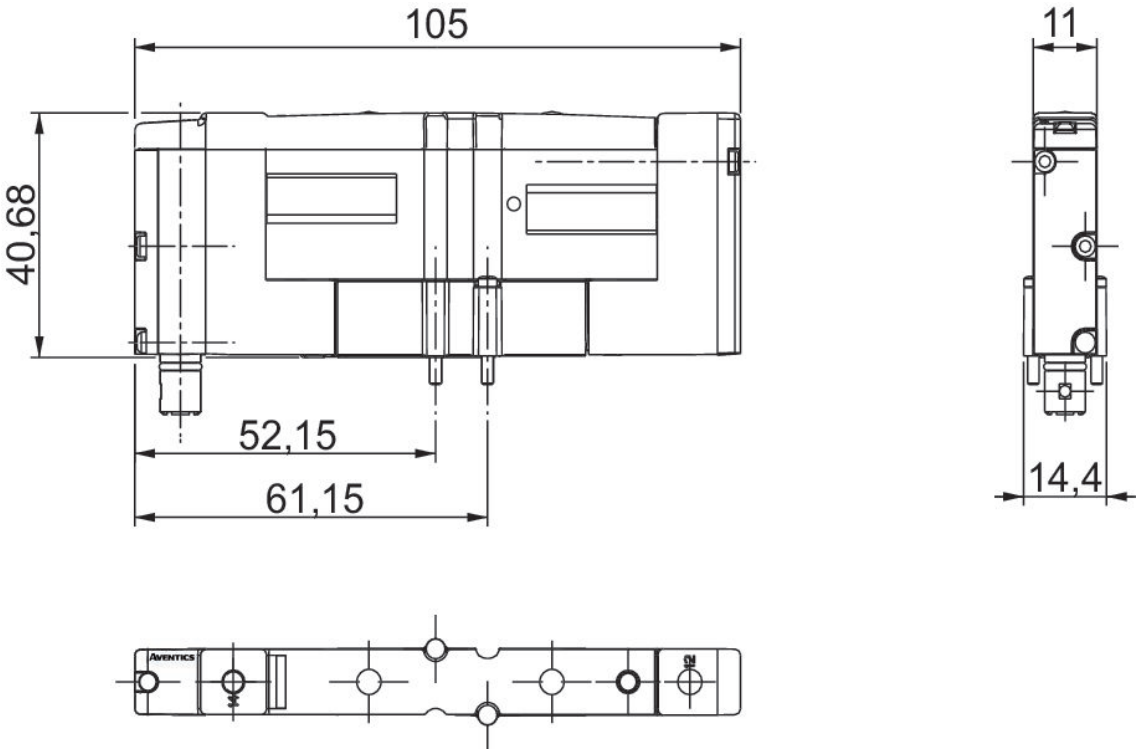
5/2-directional valve, Series 501

Single Solenoid
Electrically



Manual override	Valve function	Operational voltage	Pilot	Voltage tolerance DC	Power consumption DC [W]	Part No.
without detent	NC/NO	24 V DC	External	-15% / +10%	0.68	R501A2B10MA00F1
with detent	NC/NO	24 V DC	External	-15% / +10%	0.68	R501A2B10M11BF1

Dimensions



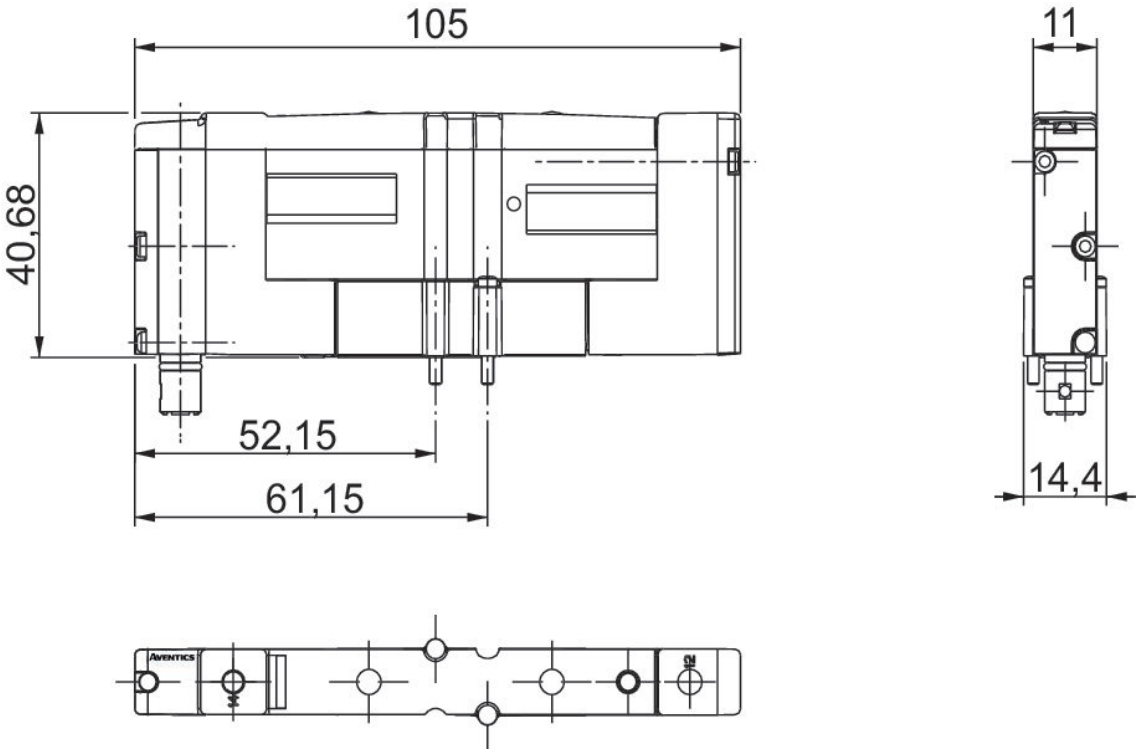
5/2-directional valve, Series 501

Double Solenoid
Electrically



Manual override	Valve function	Operational voltage	Pilot	Voltage tolerance DC	Power consumption DC [W]	Part No.
without detent	NC/NO	24 V DC	External	-15% / +10%	0.68	R501A2B40MA00F1
with detent	NC/NO	24 V DC	External	-15% / +10%	0.68	R501A2B40M11BF1

Dimensions



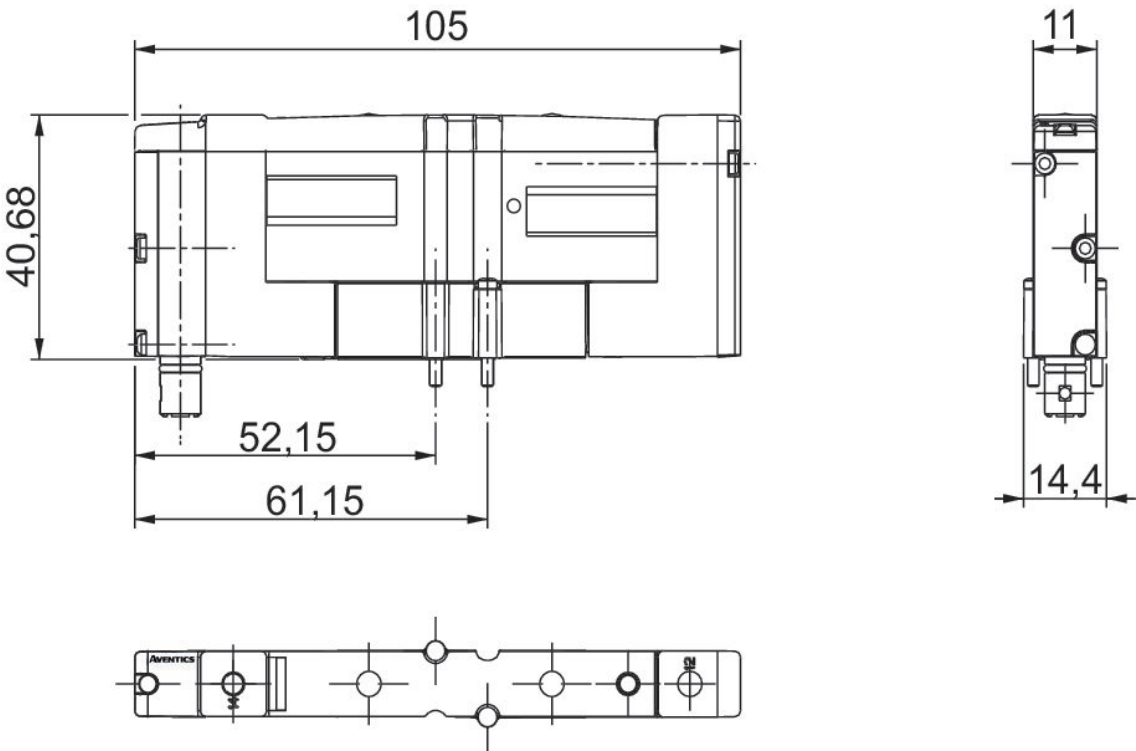
5/3-directional valve, Series 501

Double Solenoid
Electrically



Manual override	Valve function	Operational voltage	Pilot	Voltage tolerance DC	Power consumption DC [W]	Part No.
without detent	Exhausted Center	24 V DC	External	-15% / +10%	0.68	R501A2B50MA00F1
without detent	Closed Center	24 V DC	External	-15% / +10%	0.68	R501A2B60MA00F1
without detent	Pressurized Center	24 V DC	External	-15% / +10%	0.68	R501A2B70MA00F1
with detent	Exhausted Center	24 V DC	External	-15% / +10%	0.68	R501A2B50M11BF1
with detent	Closed Center	24 V DC	External	-15% / +10%	0.68	R501A2B60M11BF1
with detent	Pressurized Center	24 V DC	External	-15% / +10%	0.68	R501A2B70M11BF1

Dimensions

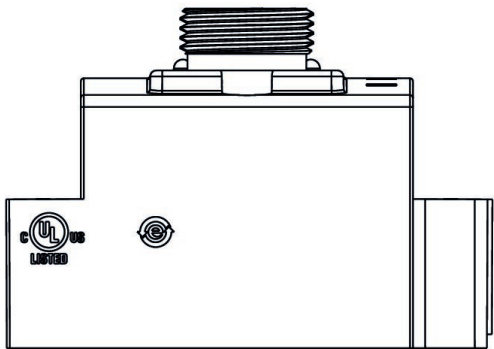
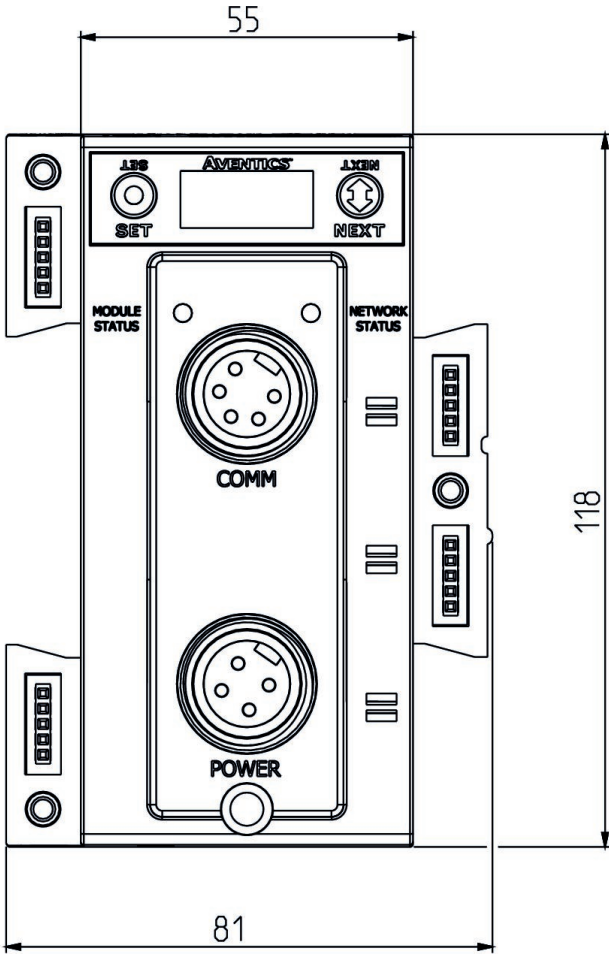
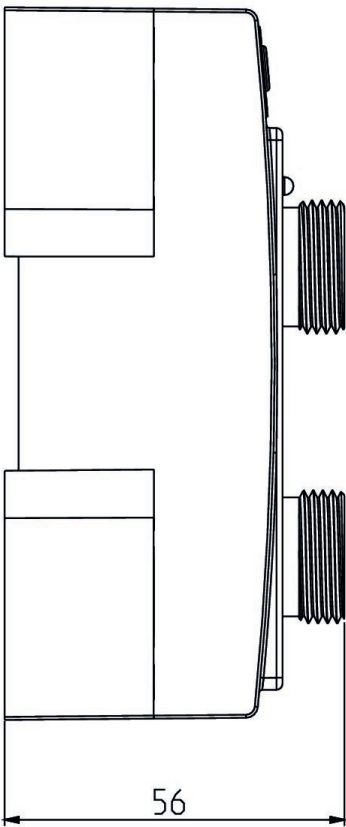


Bus coupler, Series G3

Plug
7/8"



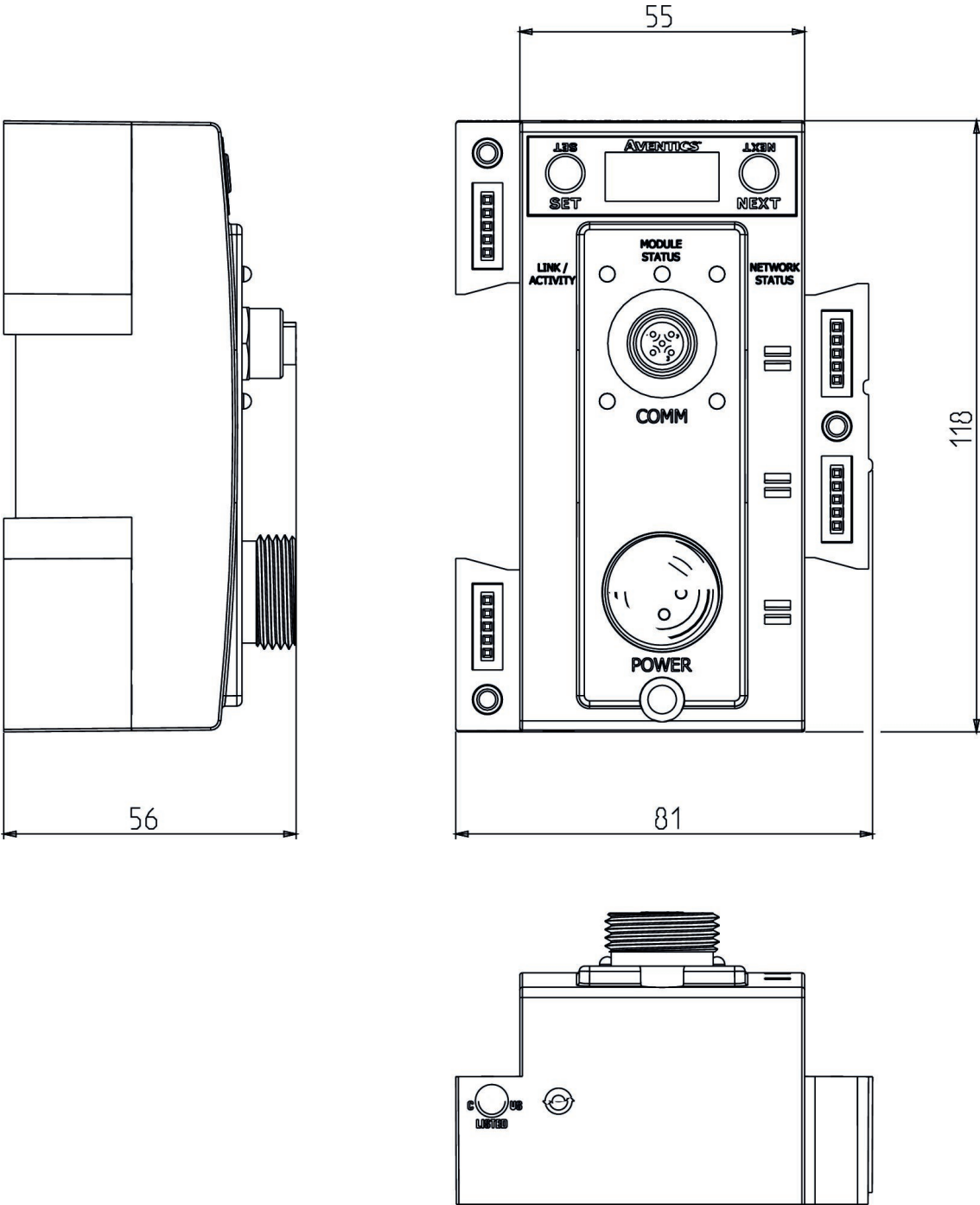
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
DeviceNet	4-pin	24 V DC	-10% / +10%	240-180



Series G3



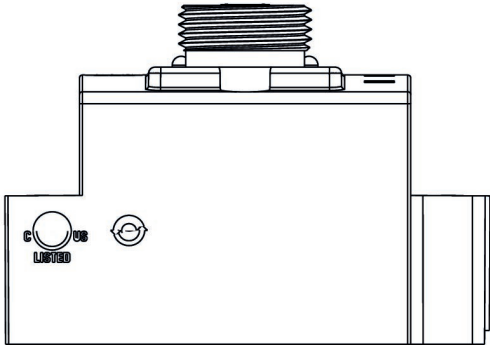
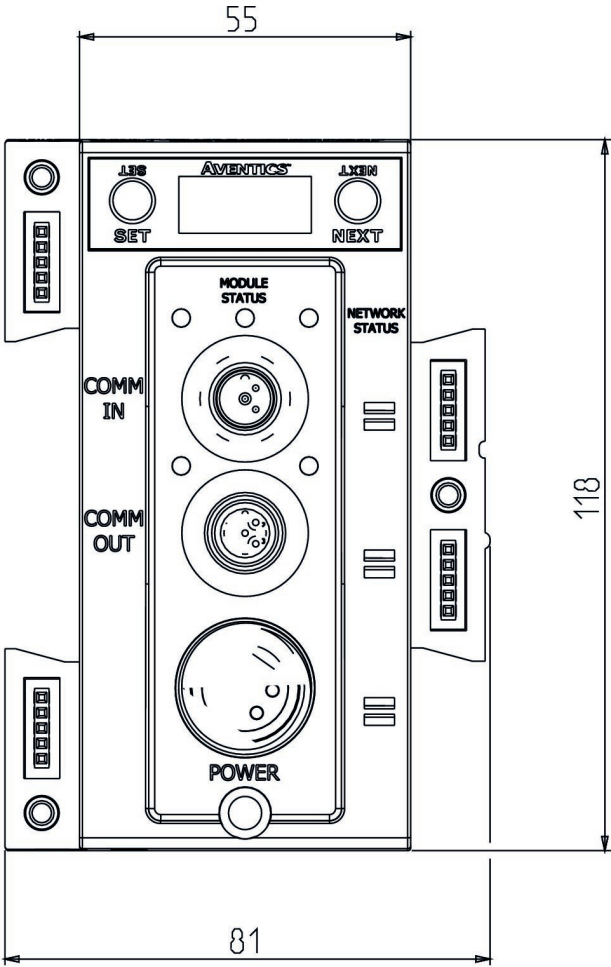
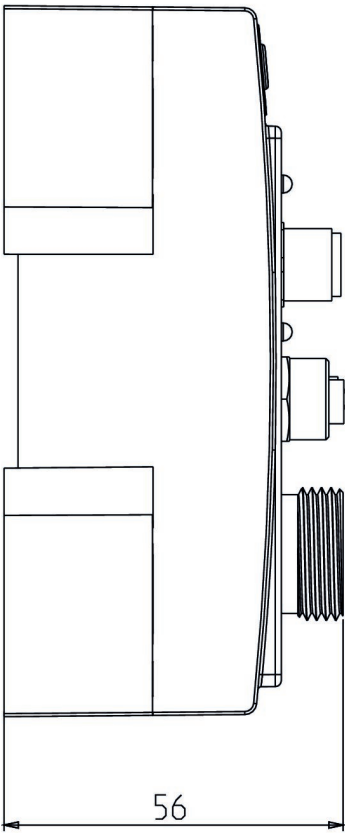
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
MODBUS TCP	4-pin	24 V DC	-10% / +10%	240-292



Series G3



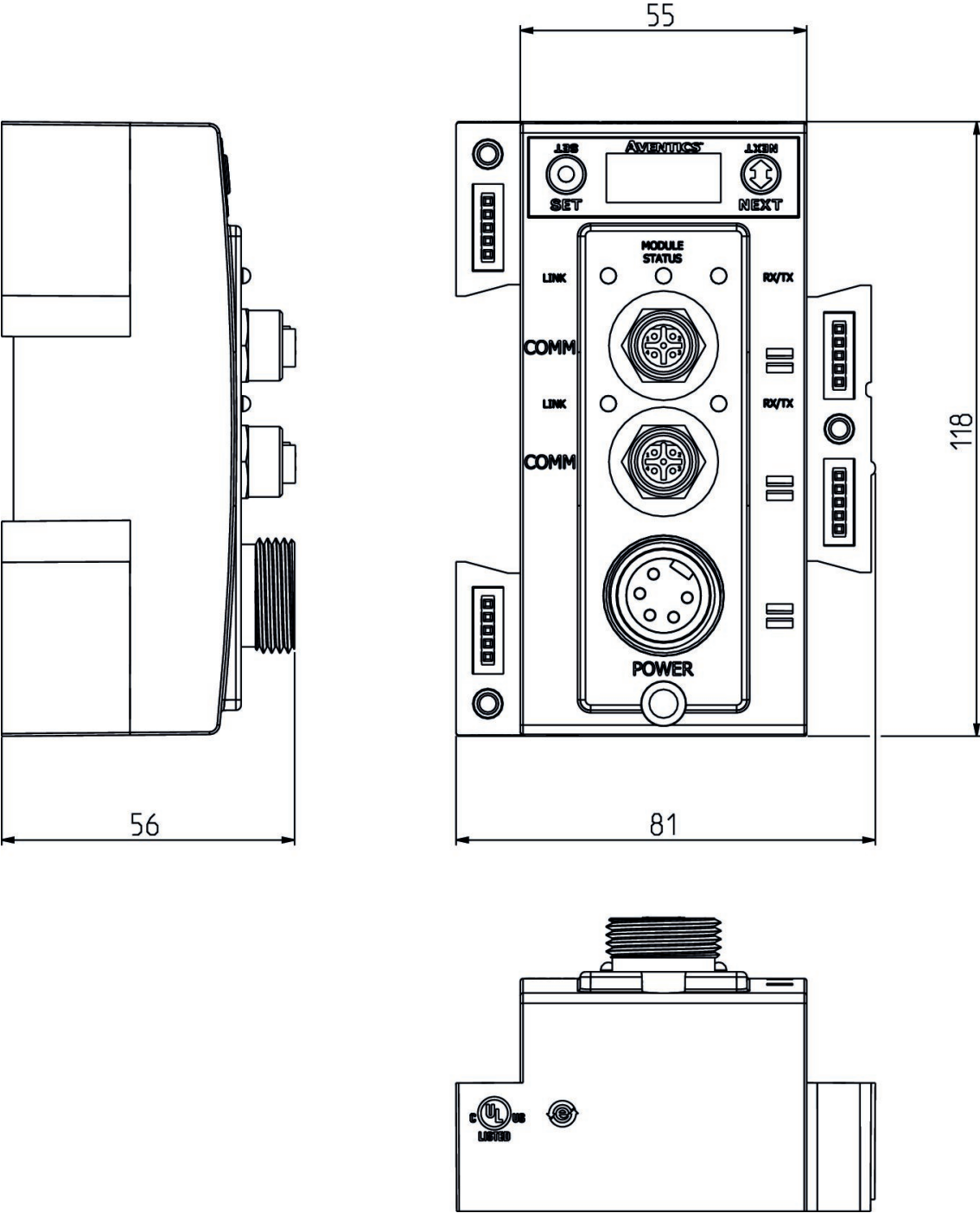
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
PROFIBUS DP	5-pin	24 V DC	-10% / +10%	240-239



Series G3



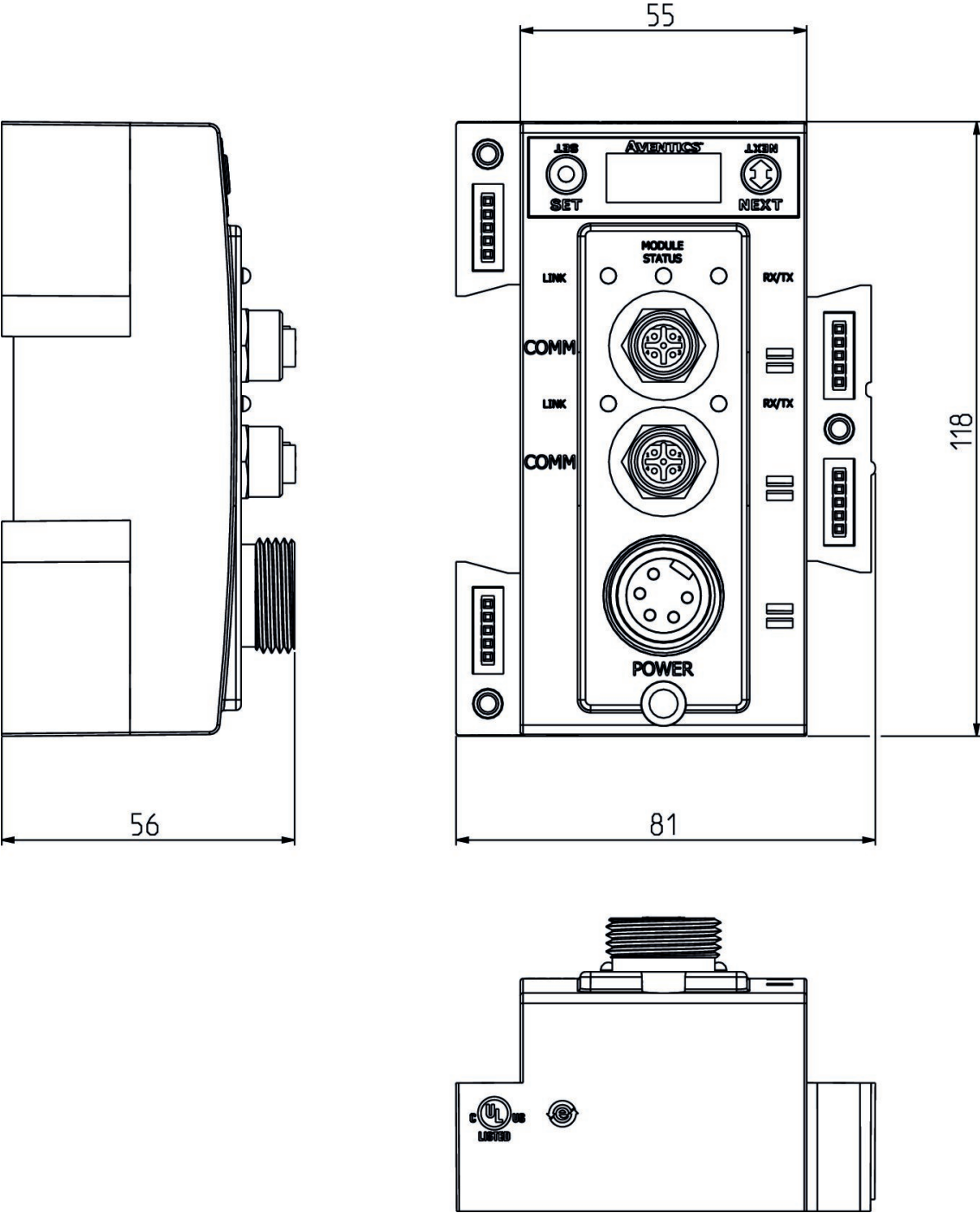
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
Profinet	5-pin	24 V DC	-10% / +10%	240-240



Series G3



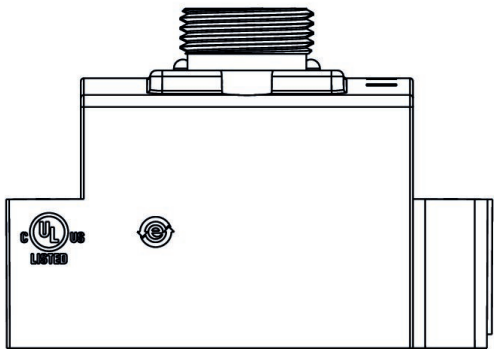
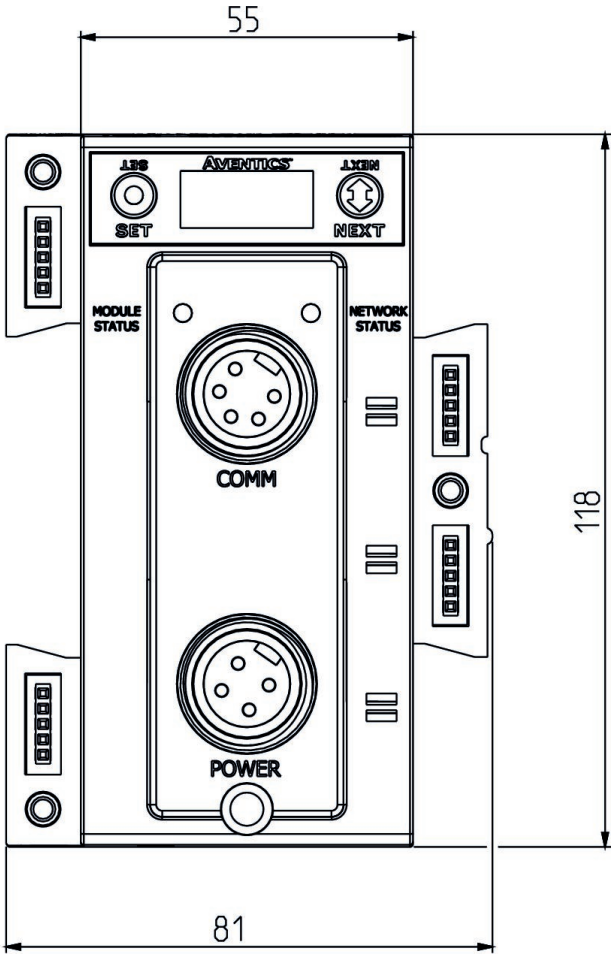
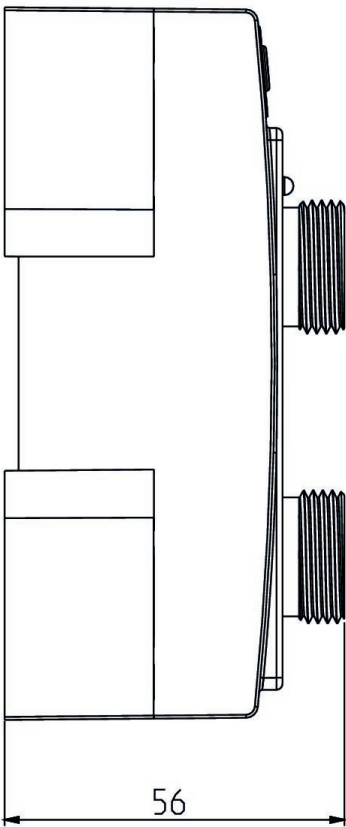
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
POWERLINK	5-pin	24 V DC	-10% / +10%	240-309



Series G3



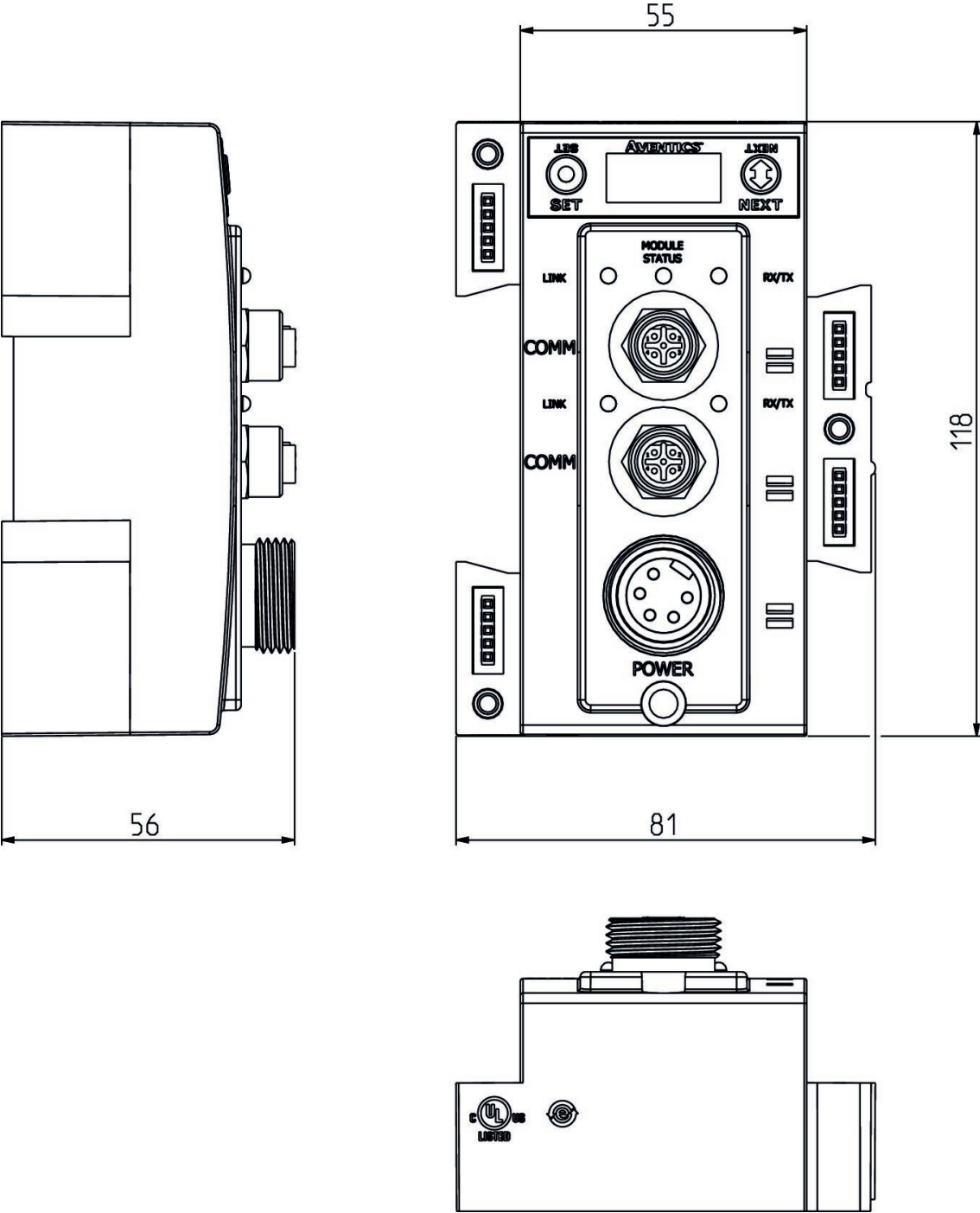
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
CANopen	4-pin	24 V DC	-10% / +10%	240-291



Series G3



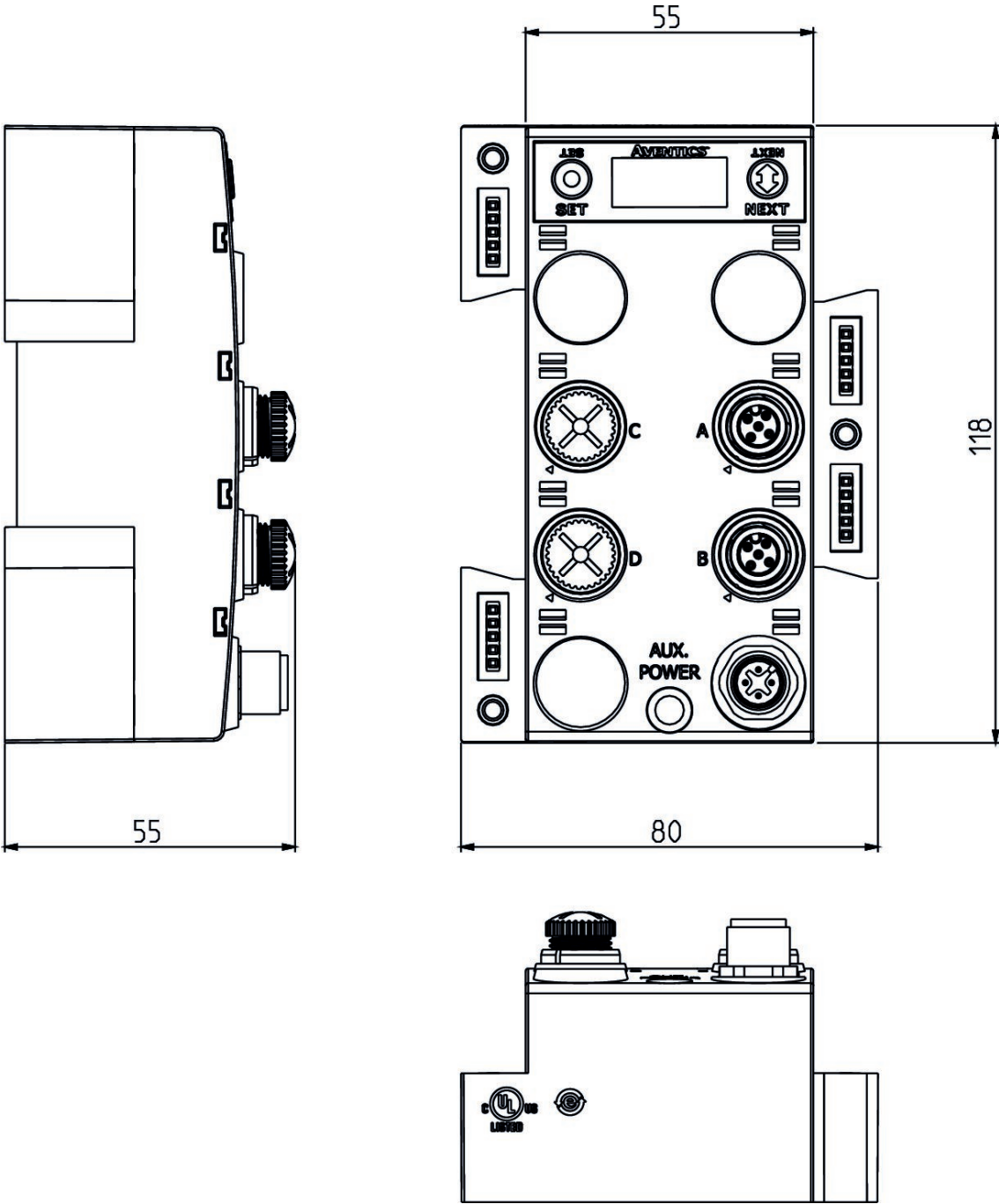
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
EtherNet/IP	4-pin	24 V DC	-10% / +10%	240-325



Series G3

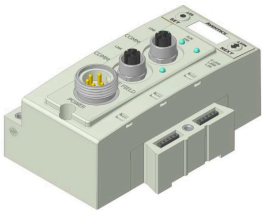


Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
EtherCAT	4-pin	24 V DC	-10% / +10%	240-310

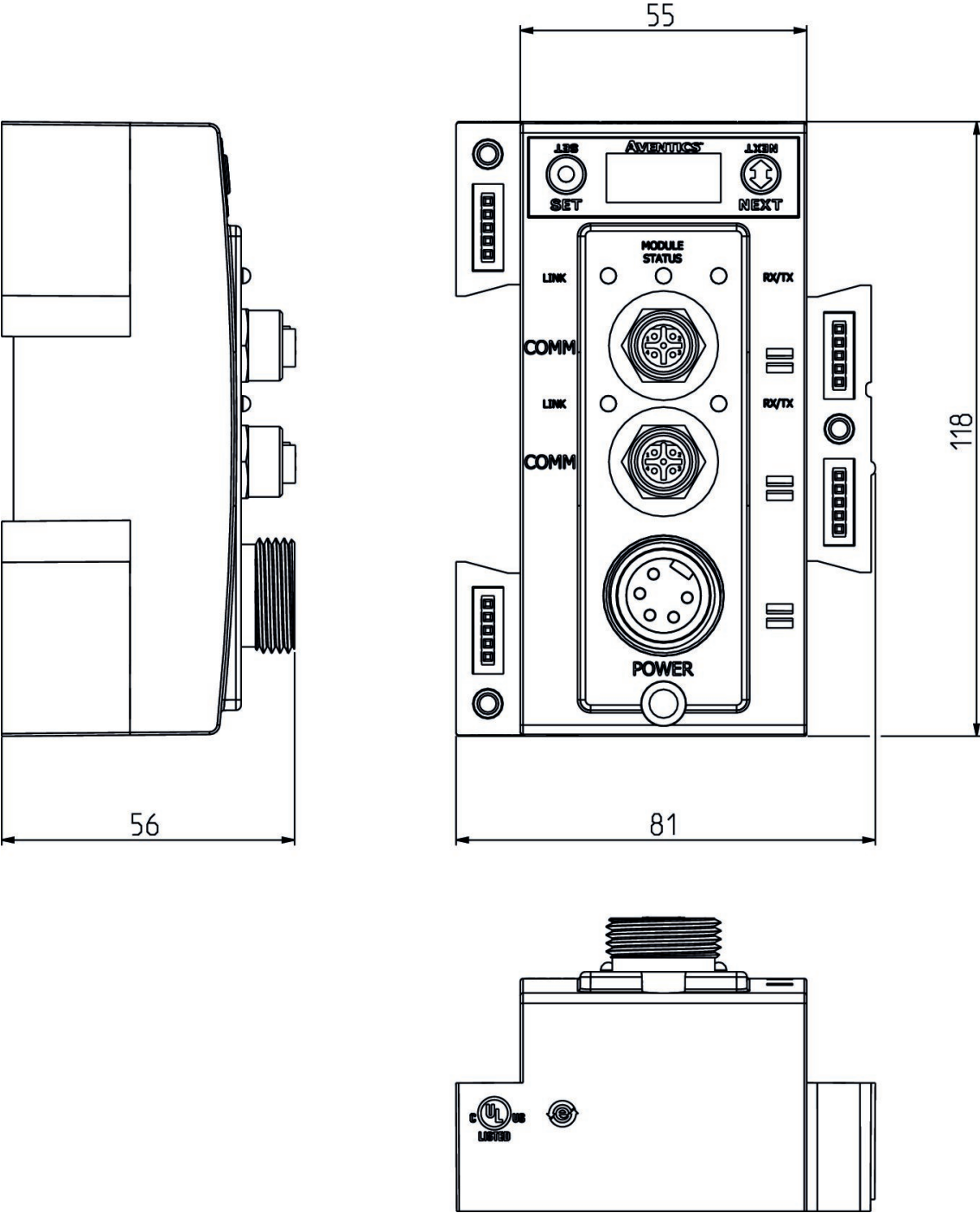


Series G3

Plug
7/8"



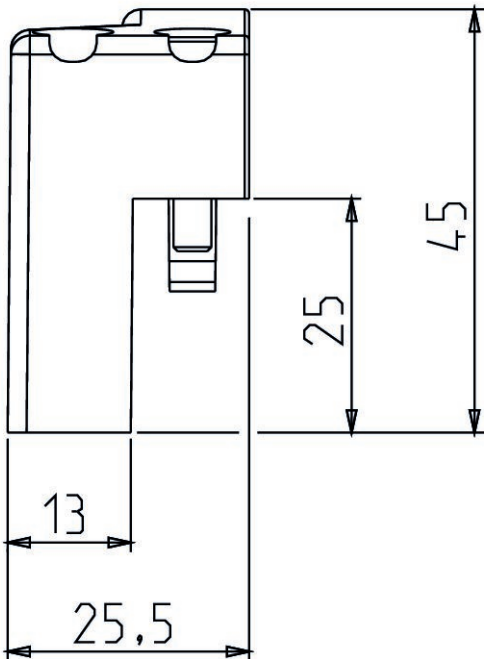
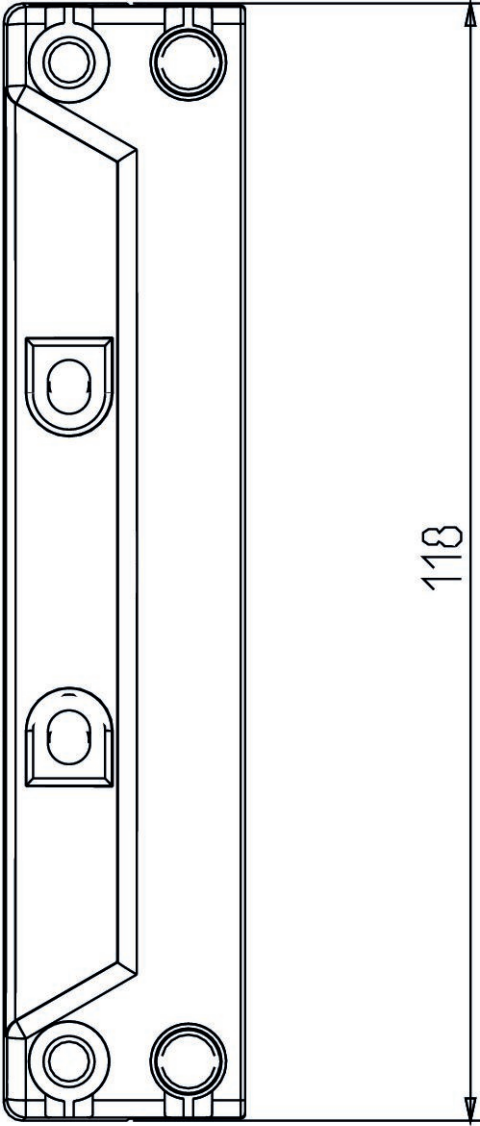
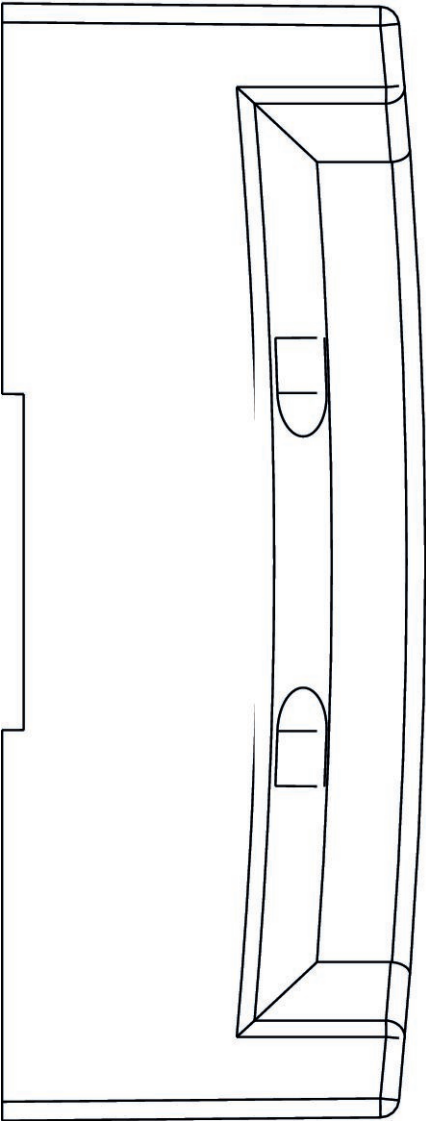
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
EtherCAT	4-pin	24 V DC	-10% / +10%	240-362



End plate left



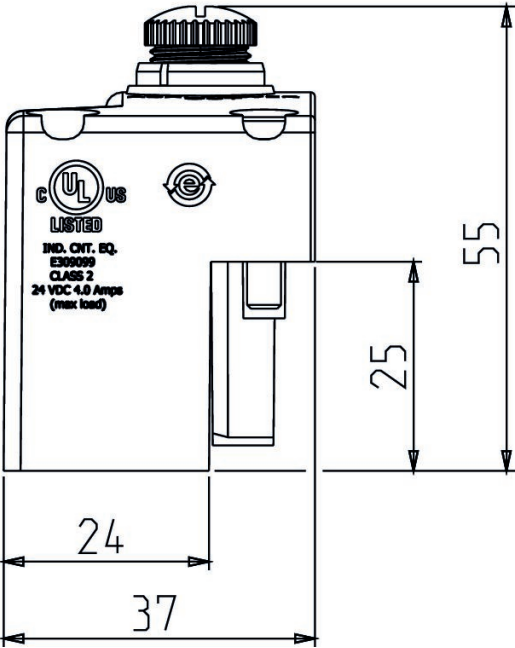
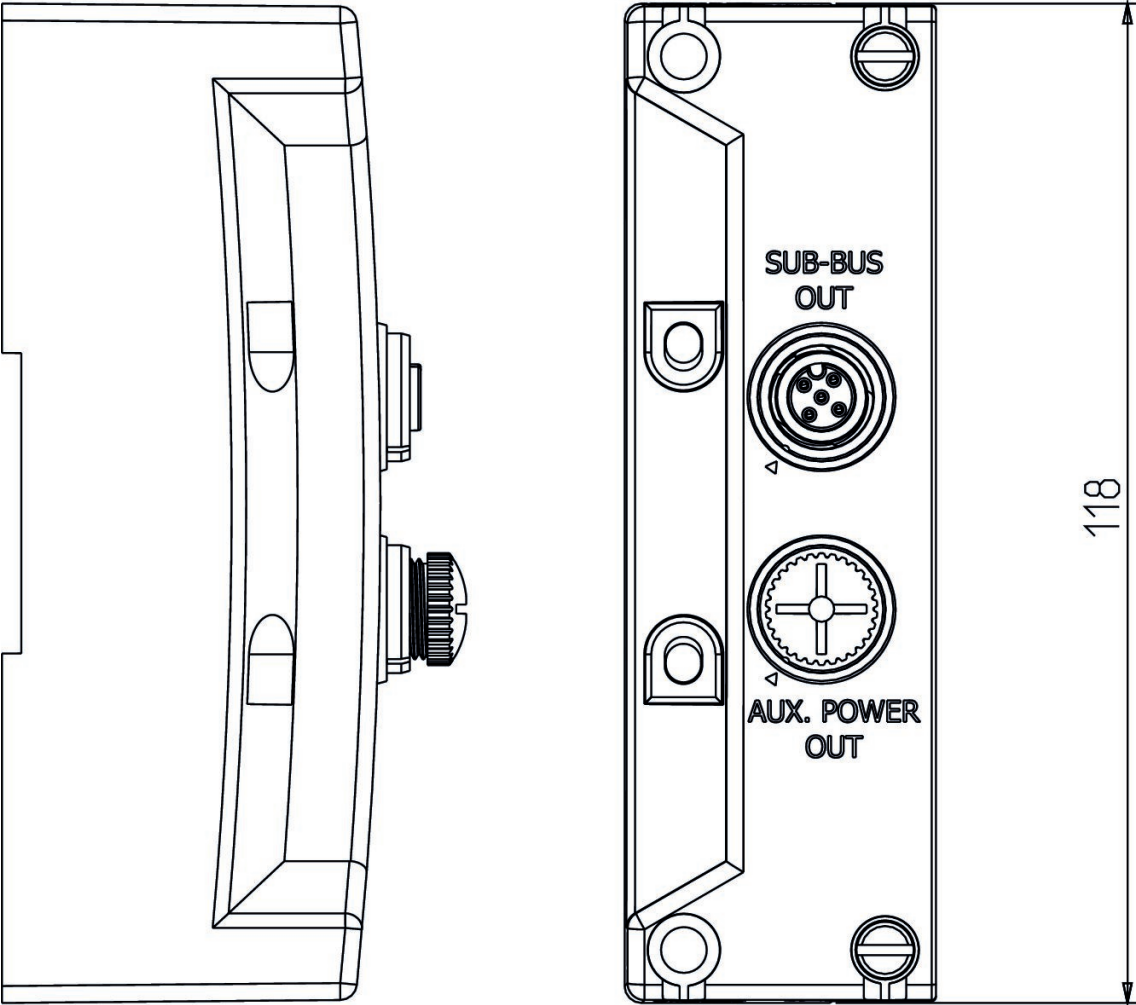
Operational voltage electronics	Operational voltage electronics	Part No.
24 V DC	-10% / +10%	240-184



Left end plate for Subbus G3



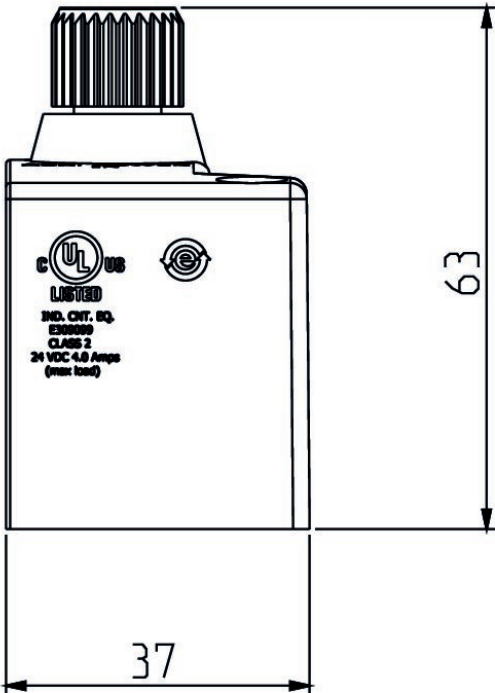
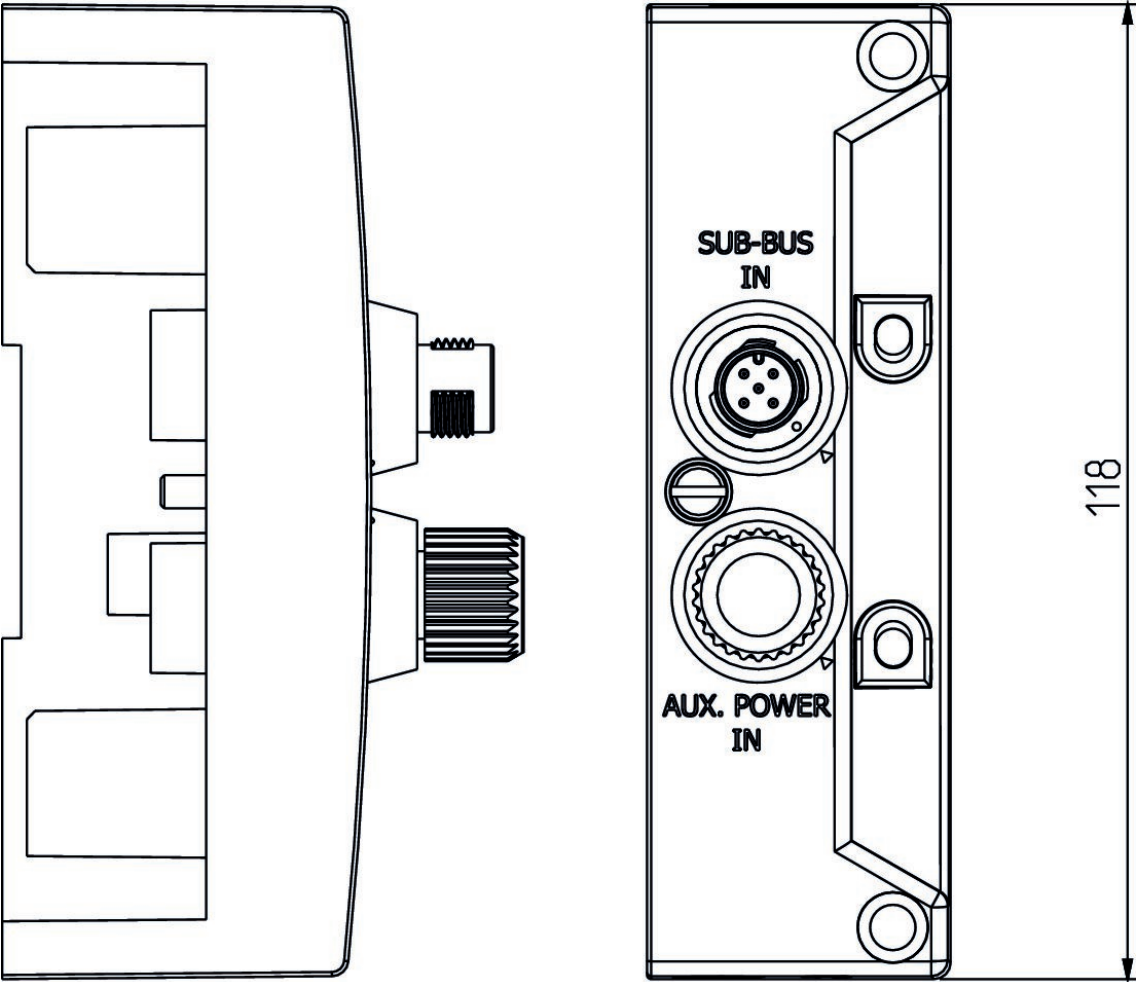
Operational voltage electronics	Operational voltage electronics	Part No.
24 V DC	-10% / +10%	240-183



Right end plate for Subbus G3



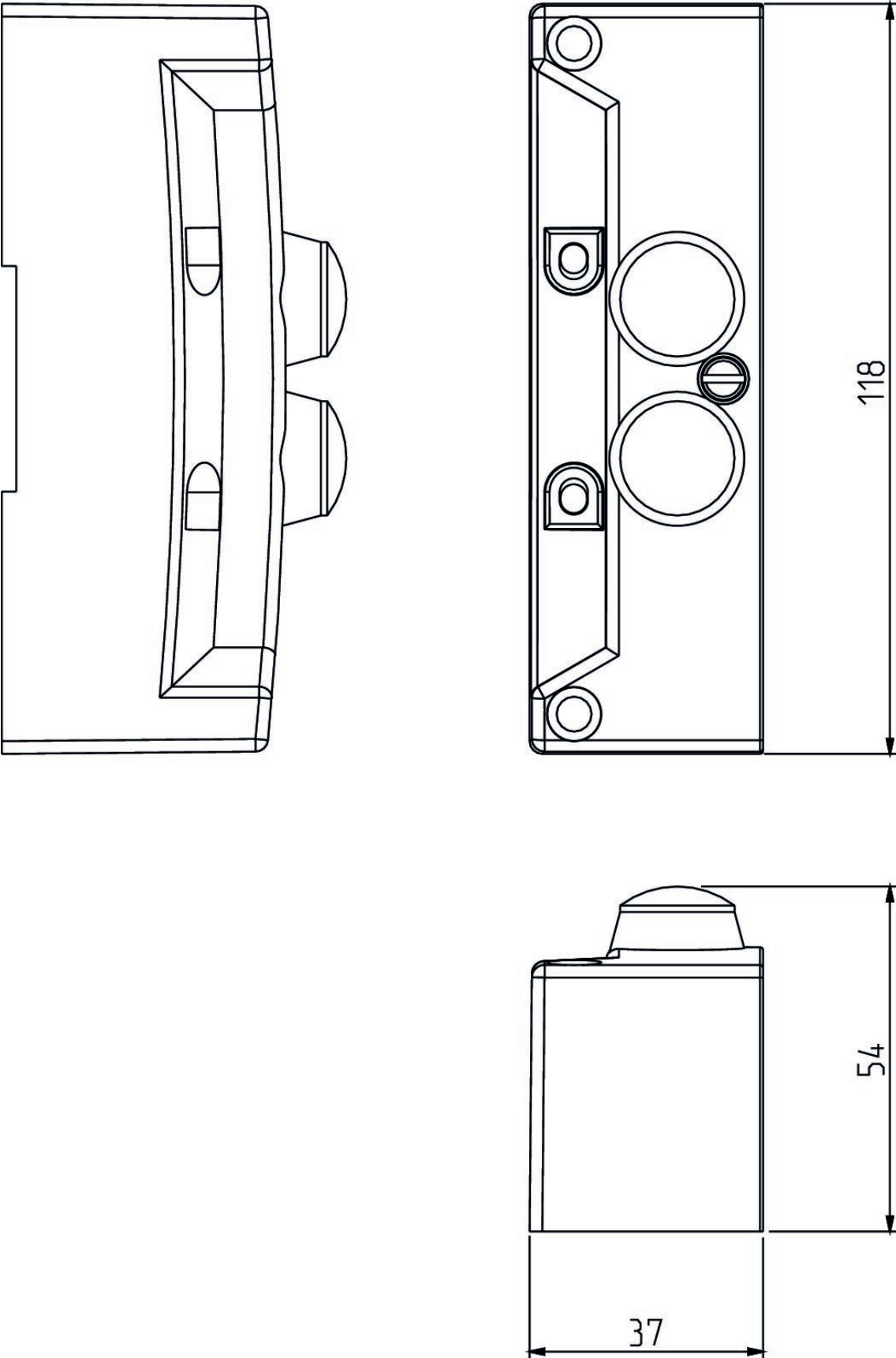
Operational voltage electronics	Operational voltage electronics	Part No.
24 V DC	-10% / +10%	240-185



Right end plate for G3 Standalone

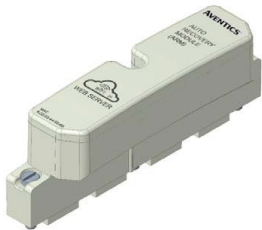


Operational voltage electronics	Operational voltage electronics	Part No.
24 V DC	-10% / +10%	240-255

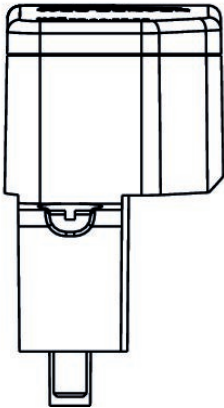
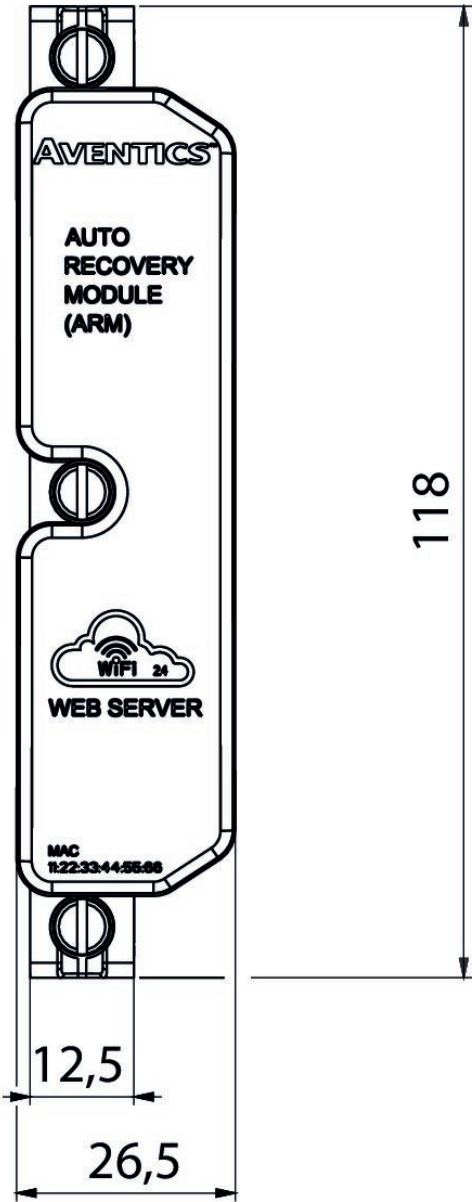
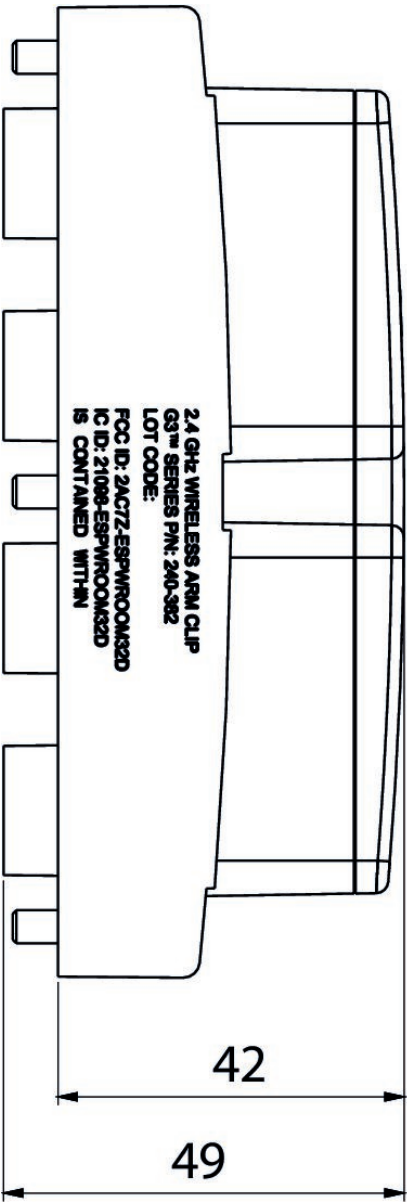


Wireless auto-recovery module, series G3

G3



Part No.
240-382

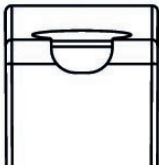
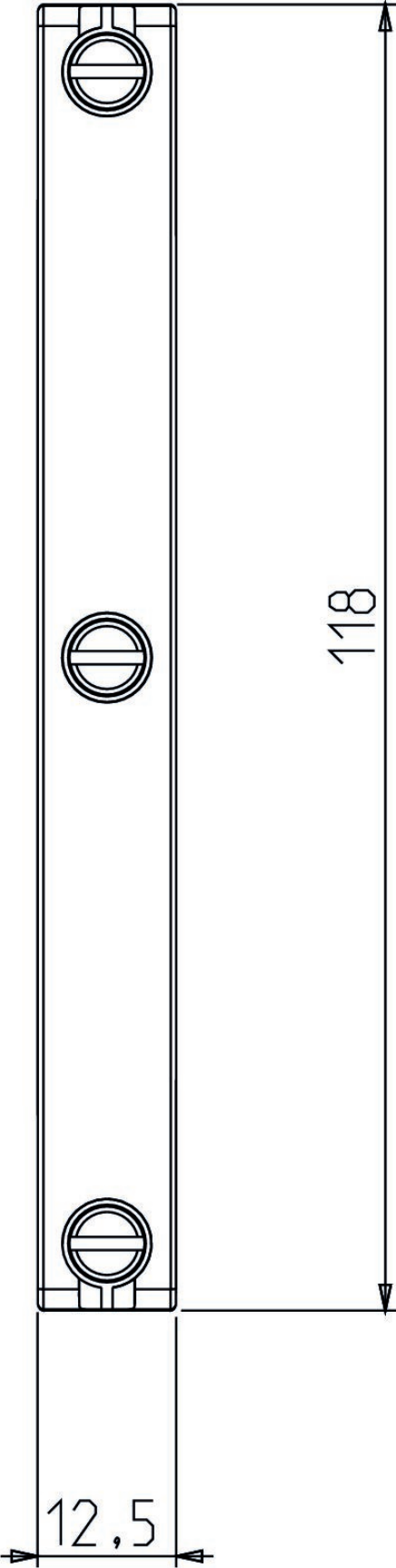
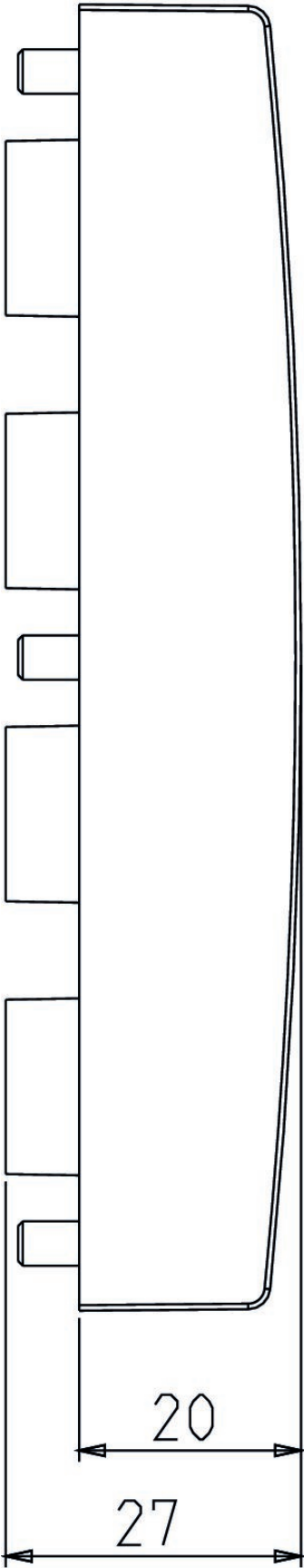


Connection piece

G3
501
502
503



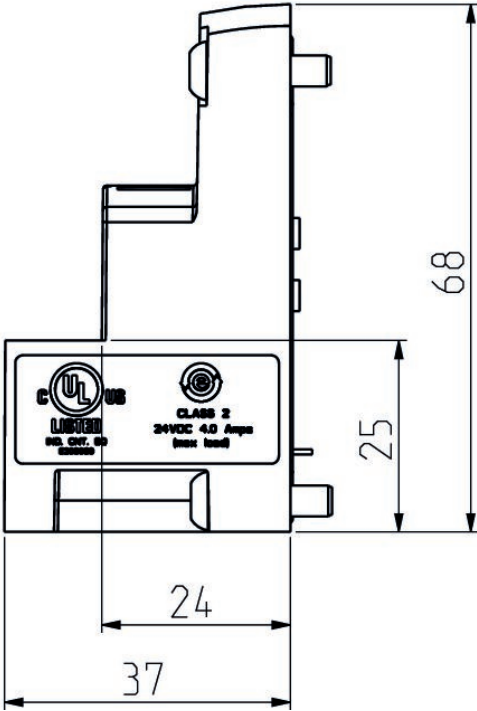
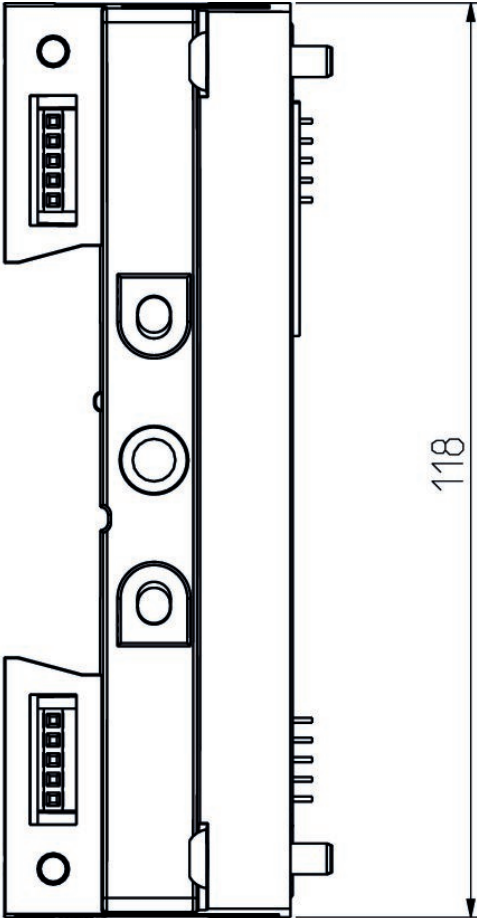
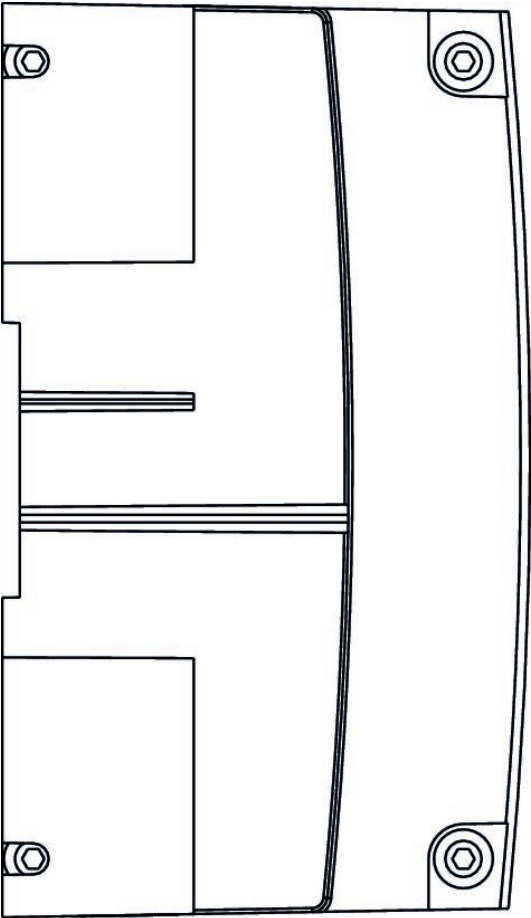
Part No.
240-179



Distributor

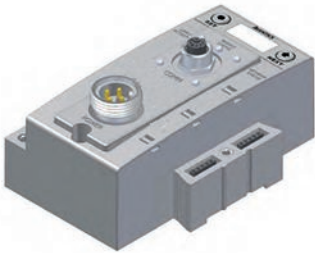


Operational voltage electronics	Operational voltage electronics	Part No.
24 V DC	-10% / +10%	P599AE508827001

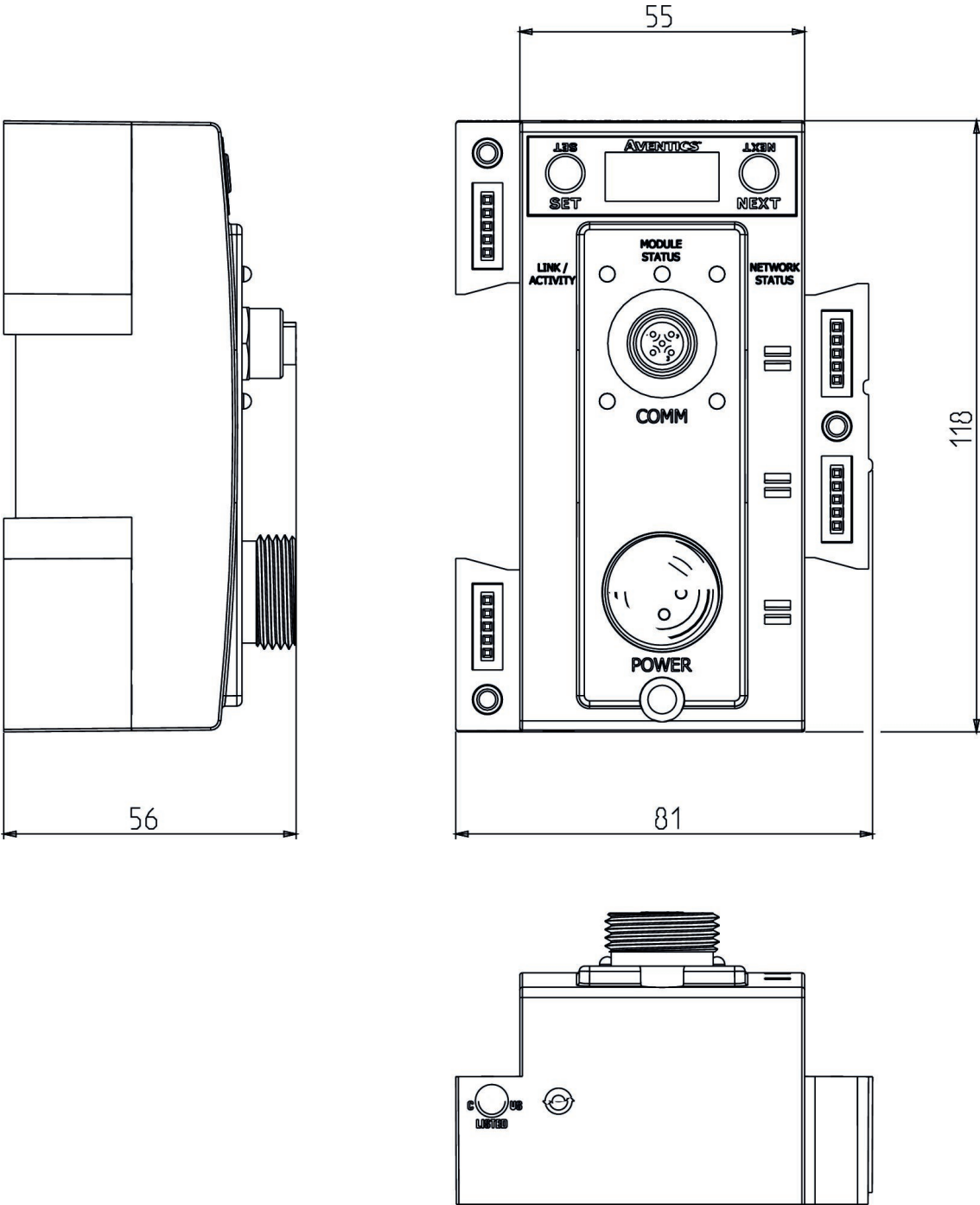


G3 Subbus module

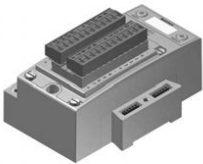
Plug
7/8"



Number of poles	Operational voltage electronics	Operational voltage electronics	Part No.
4-pin	24 V DC	-10% / +10%	240-241

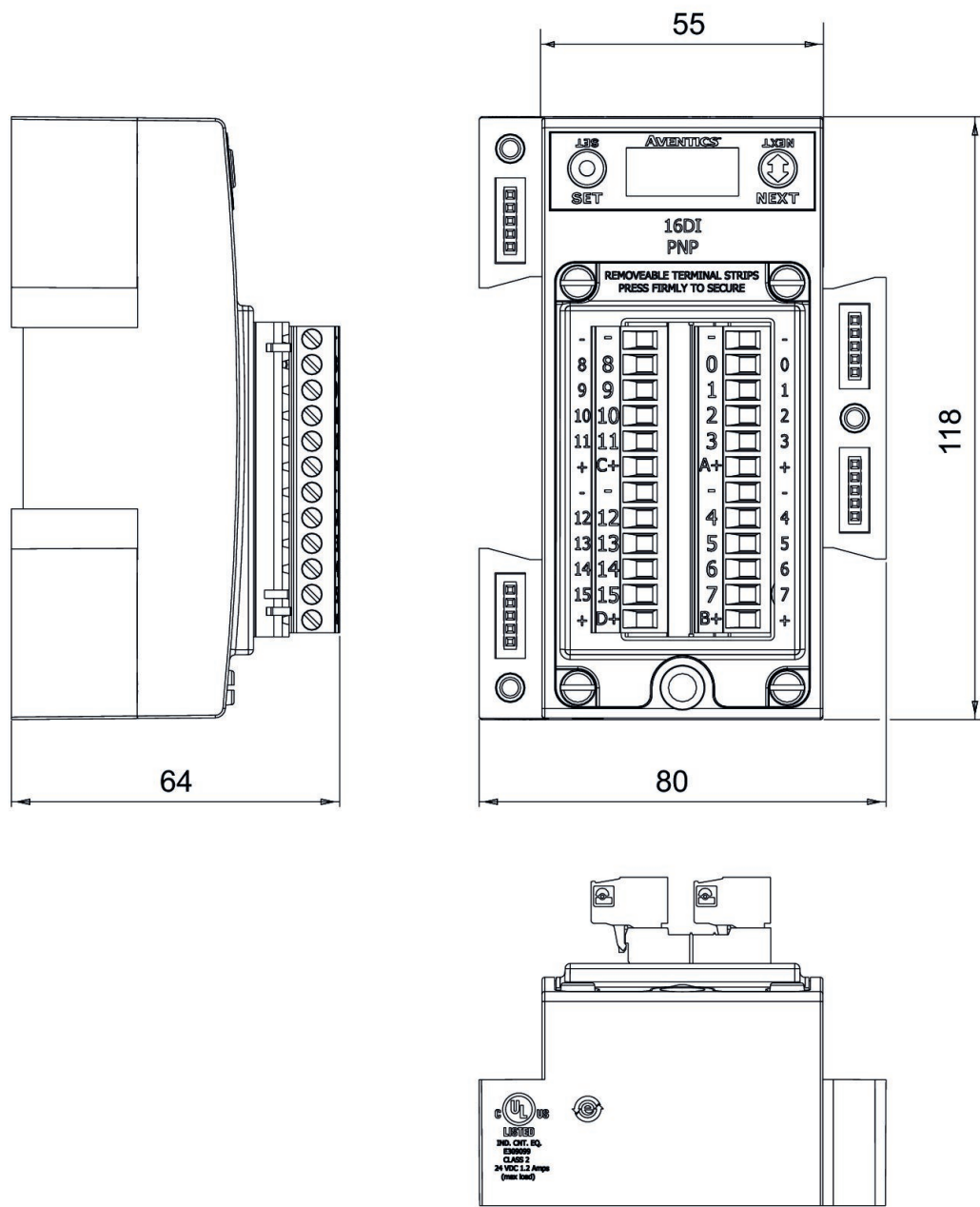


I/O modules, Series G3

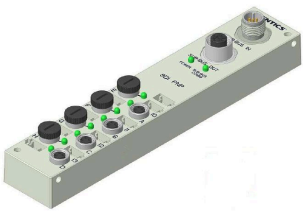


Number of inputs	Number of outputs	I/O module version	Operational volt- age electronics	Operational volt- age electronics	Part No.
16		digital inputs PNP	24 V DC	-10% / +10%	240-203
16		digital inputs NPN	24 V DC	-10% / +10%	240-204
8		digital inputs PNP	24 V DC	-10% / +10%	240-316
	16	digital inputs NPN	24 V DC	-10% / +10%	240-330

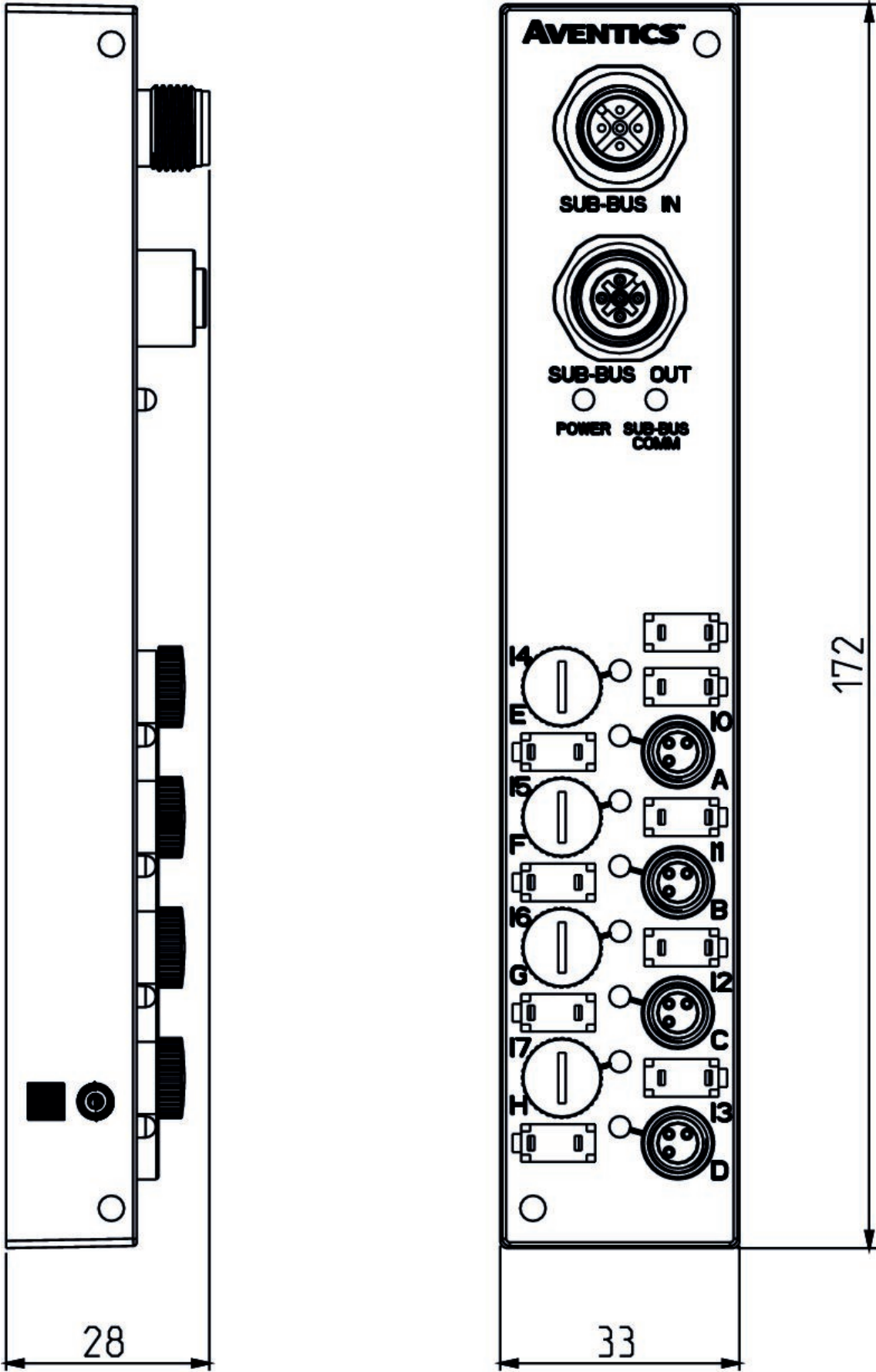
Dimensions



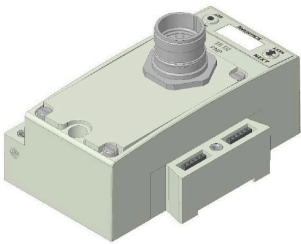
I/O modules, Series G3



Number of inputs	I/O module version	Operational volt- age electronics	Operational volt- age electronics	Part No.
8	digital inputs PNP	24 V DC	-10% / +10%	240-379



I/O modules, Series G3

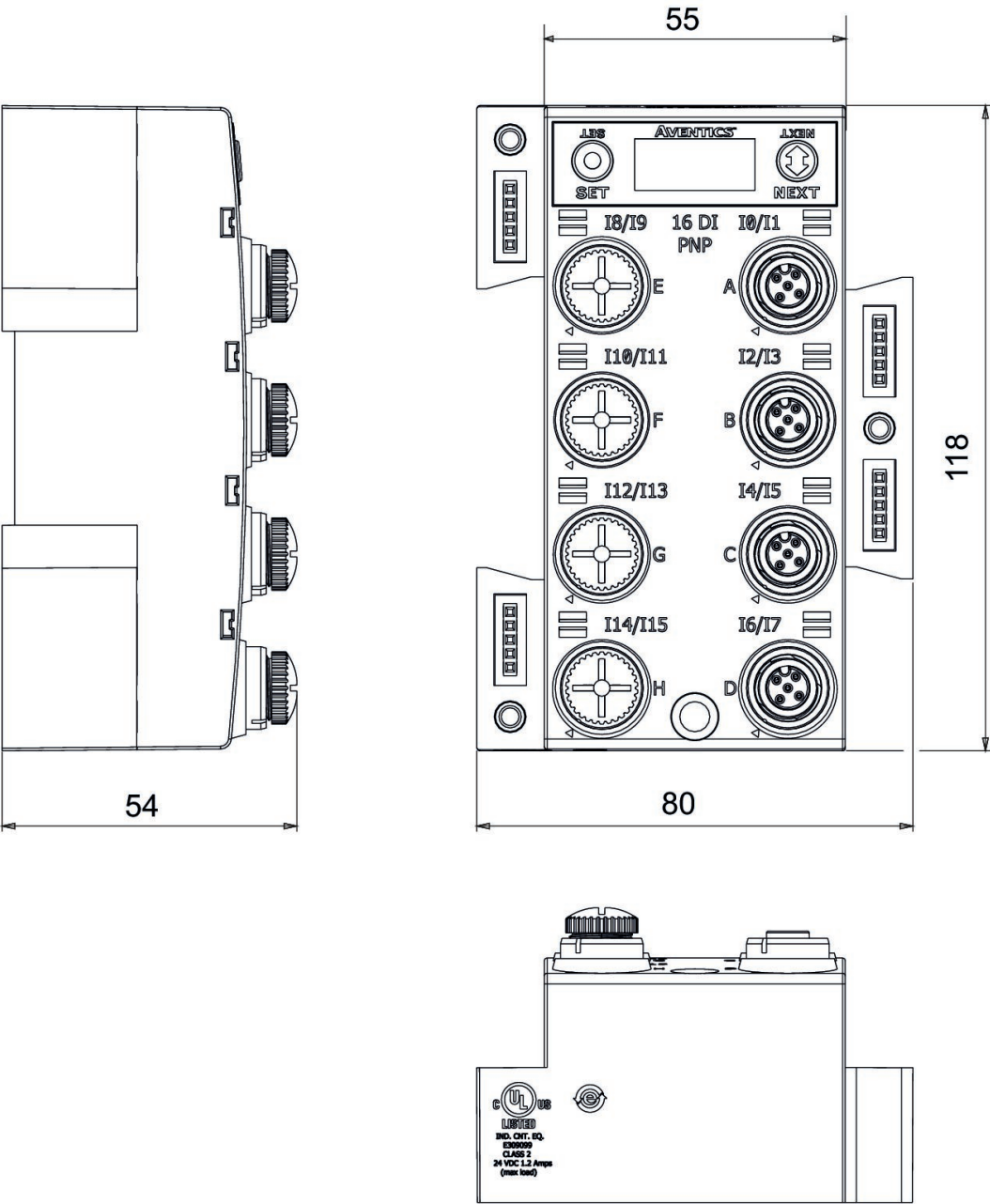


Number of inputs	I/O module version	Part No.
16	digital inputs PNP	240-323

I/O modules, Series G3



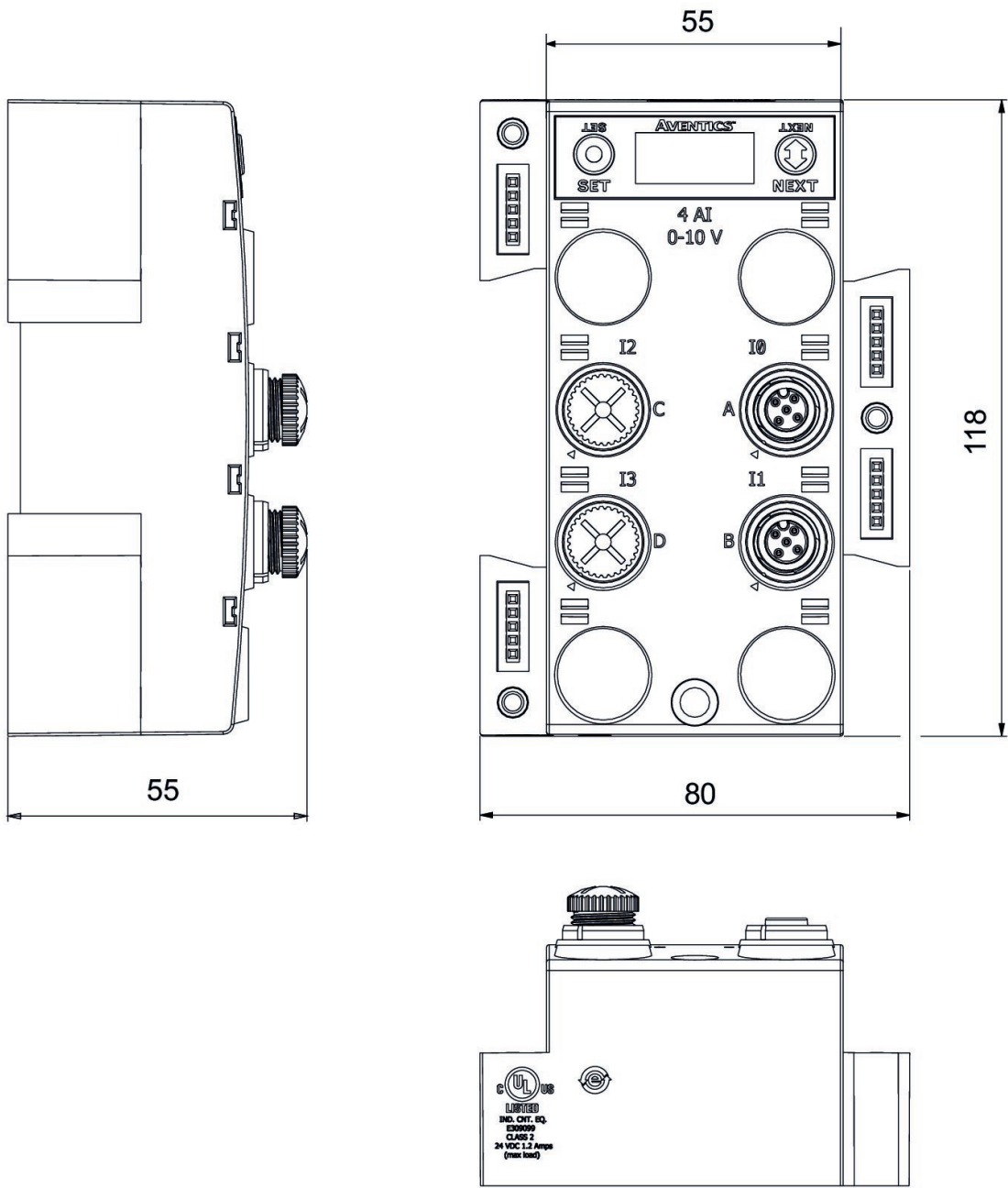
Type	Number of inputs	Number of outputs	I/O module version	Operational voltage electronics	Operational voltage electronics	Part No.
16DI8M12, digital inputs PNP	16		digital inputs PNP	24 V DC	-10% / +10%	240-205
8DI8M8, digital inputs PNP	8		digital inputs PNP	24 V DC	-10% / +10%	240-206
16DO8M12, digital outputs PNP		16	Digital outputs	24 V DC	-10% / +10%	240-207
8DO8M12, digital outputs PNP		8	digital outputs PNP	24 V DC	-10% / +10%	240-208
16DI8M12, digital inputs NPN	16		digital inputs NPN	24 V DC	-10% / +10%	240-209
8DI8M12, digital inputs NPN	8		digital inputs NPN	24 V DC	-10% / +10%	240-210
8DO8M12, digital inputs/outputs PNP	8	8	digital inputs/outputs PNP	24 V DC	-10% / +10%	240-211
8DO8M12		8	Digital outputs	24 V DC	-10% / +10%	240-300



I/O modules, Series G3



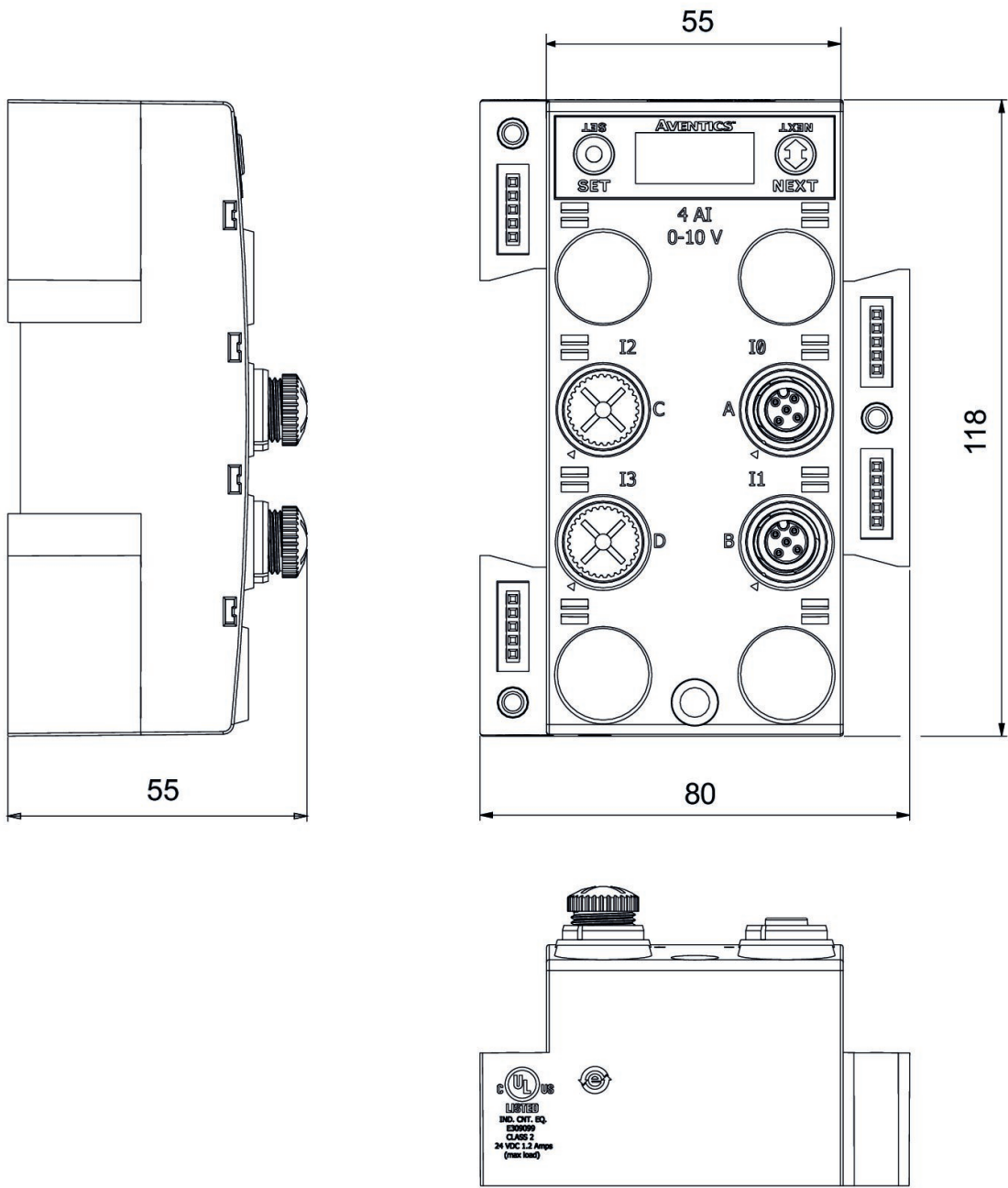
Type	Number of inputs	Number of outputs	I/O module version	Operational voltage electronics	Operational voltage electronics	Part No.
4AI4M12-E	4		Analog inputs	24 V DC	-10% / +10%	240-212
2AIAO8M12	2	2	analog inputs/outputs	24 V DC	-10% / +10%	240-213
4AI4M12-E	4		Analog inputs	24 V DC	-10% / +10%	240-214
2AIAO4M12	2	2	analog inputs/outputs	24 V DC	-10% / +10%	240-215
2AIAO8M12	2	2	analog inputs/outputs	24 V DC	-10% / +10%	240-307
	4	4	analog inputs/outputs	24 V DC	-10% / +10%	240-363



Series G3



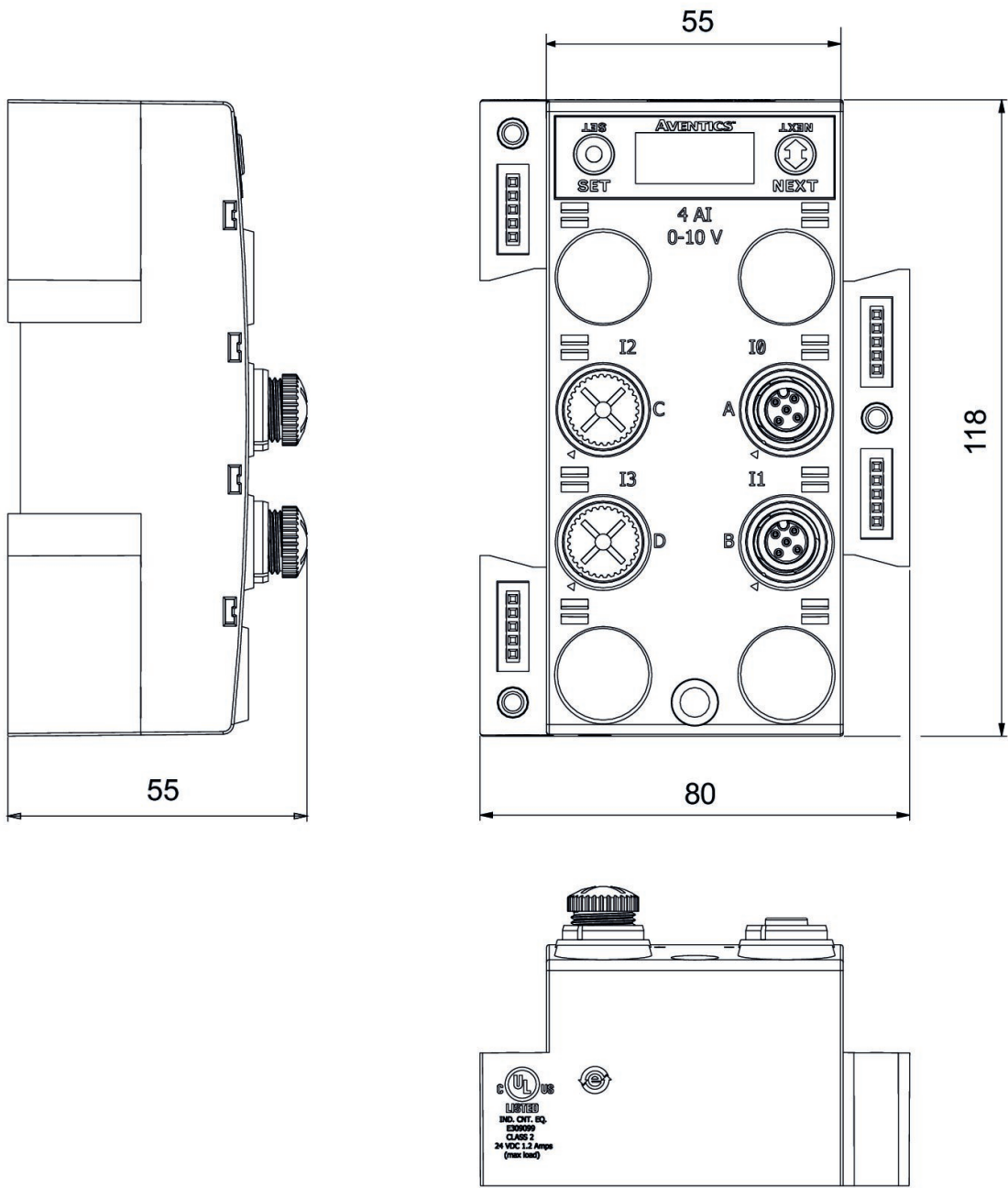
Type	I/O module version	Operational volt- age electronics	Operational volt- age electronics	Part No.
Socket, M12x1	Analog inputs	24 V DC	-10% / +10%	240-311



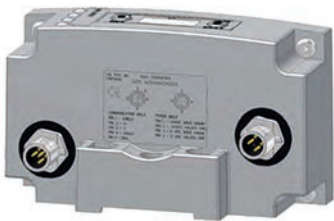
I/O modules, Series G3



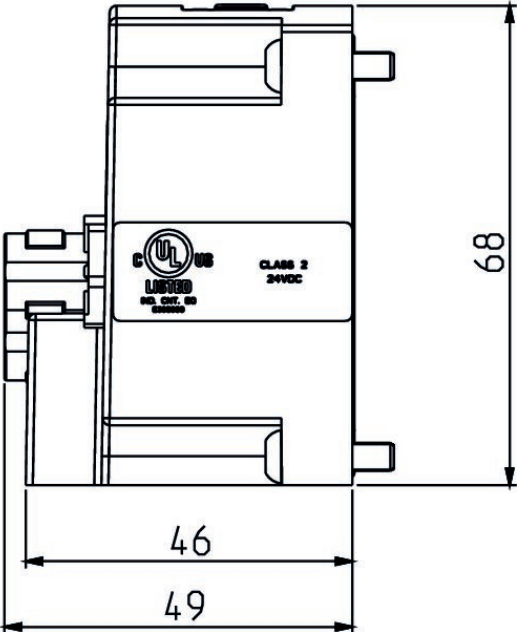
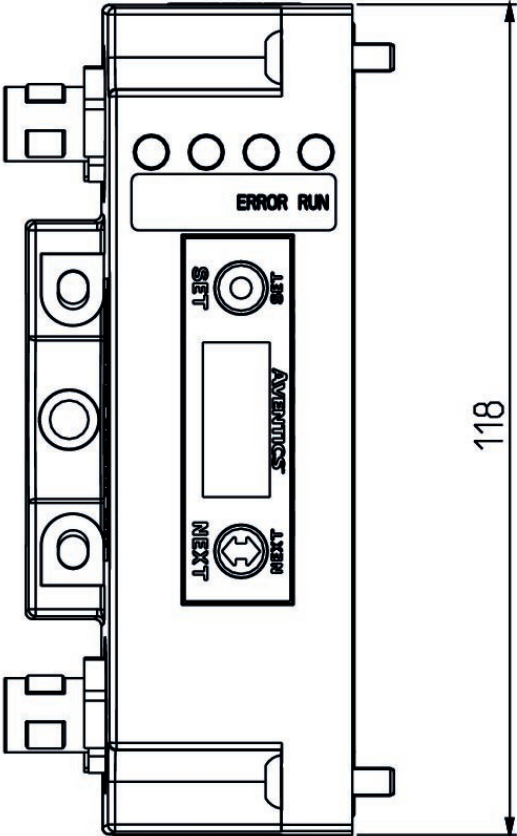
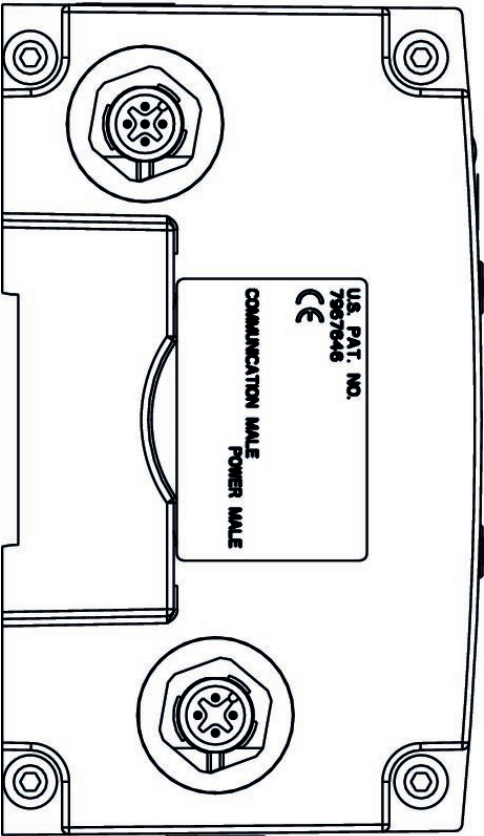
Number of inputs	E/A capable	Number of I/O connections	Part No.
8	connection with I/O	8 inputs	240-326



Bus coupler, Series 580



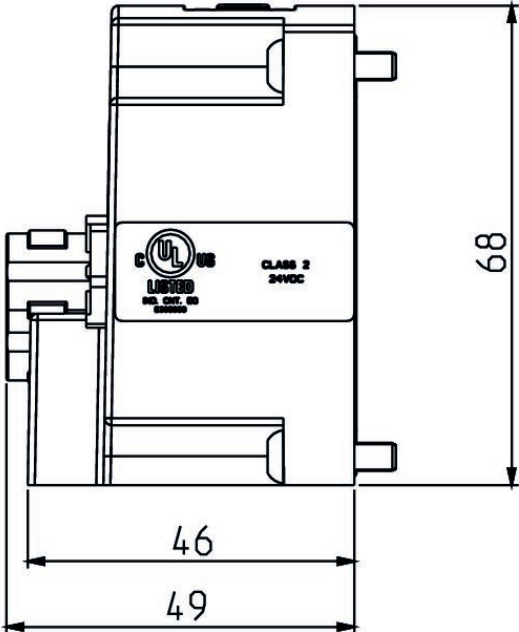
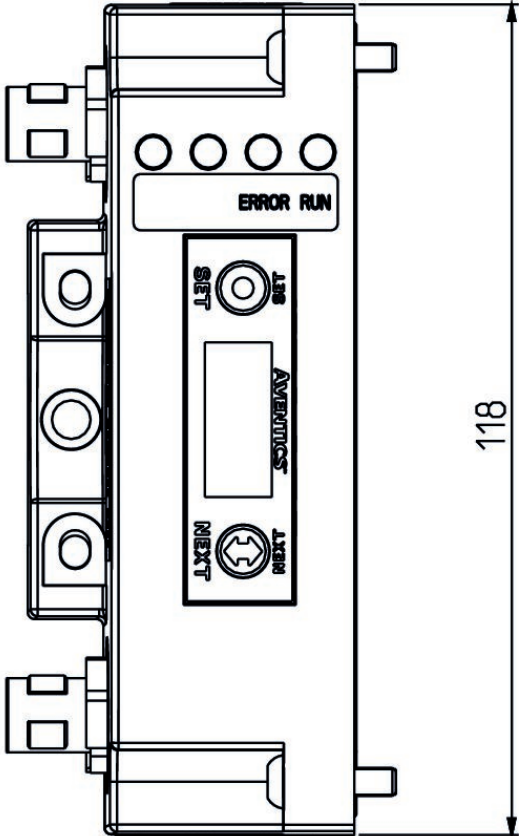
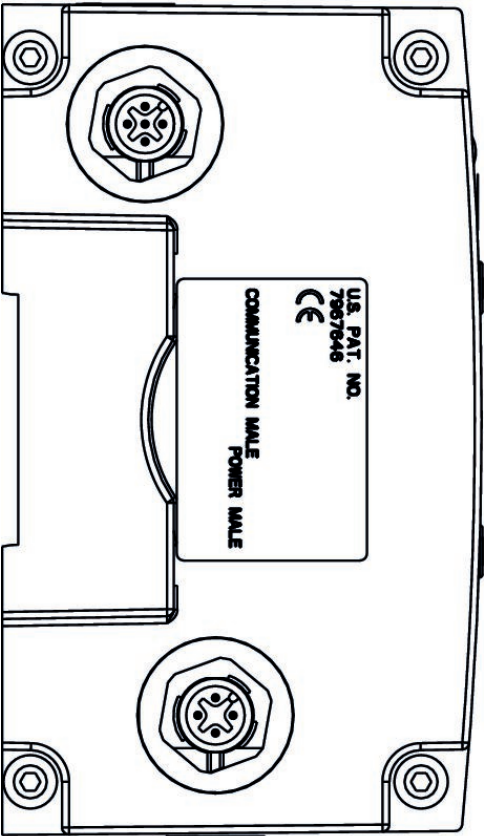
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
CANopen	4-pin	24 V DC	-10% / +10%	P580AE- CO1010A00



Series 580



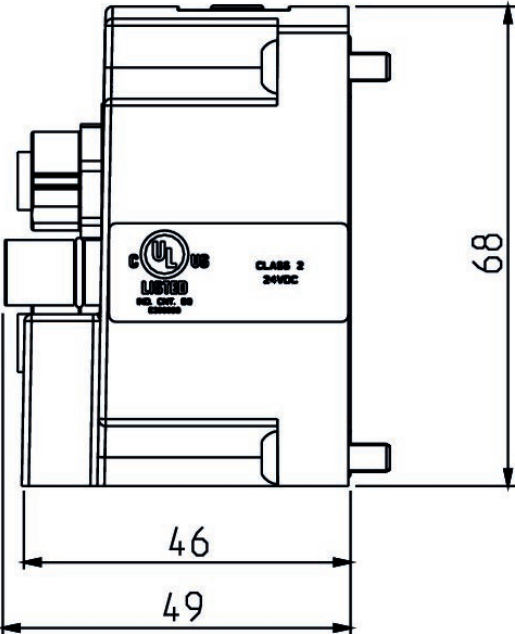
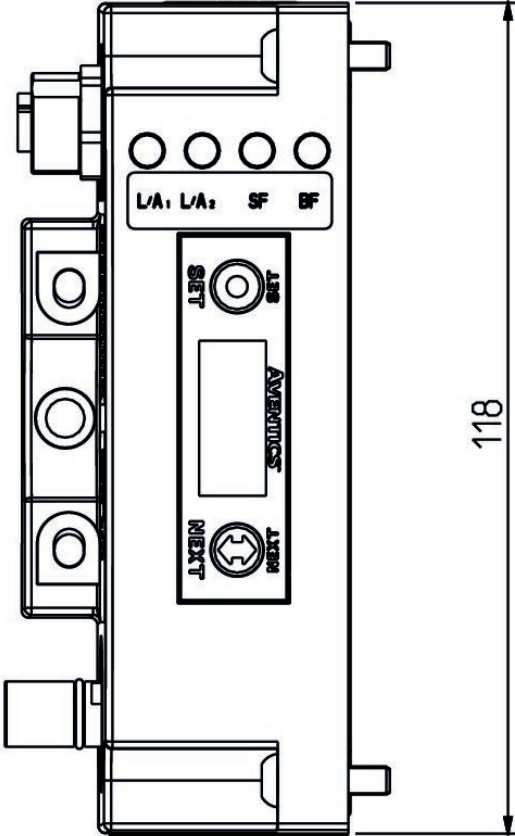
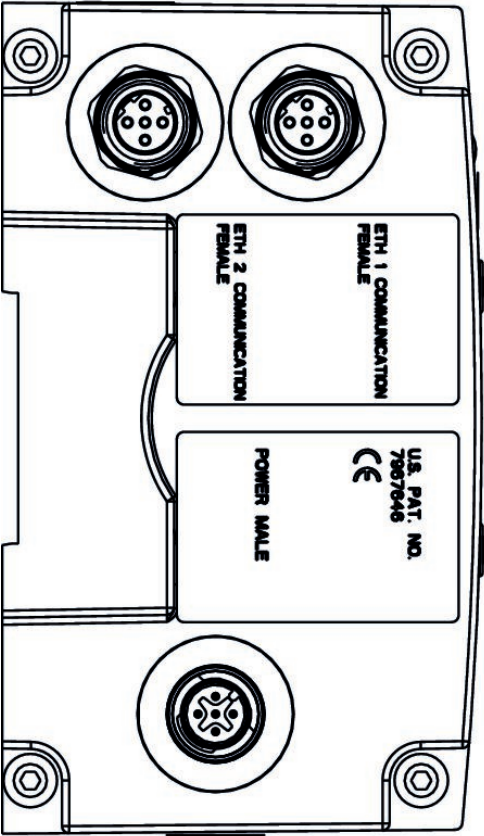
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
DeviceNet	4-pin	24 V DC	-10% / +10%	P580AEDN1010A00



Series 580



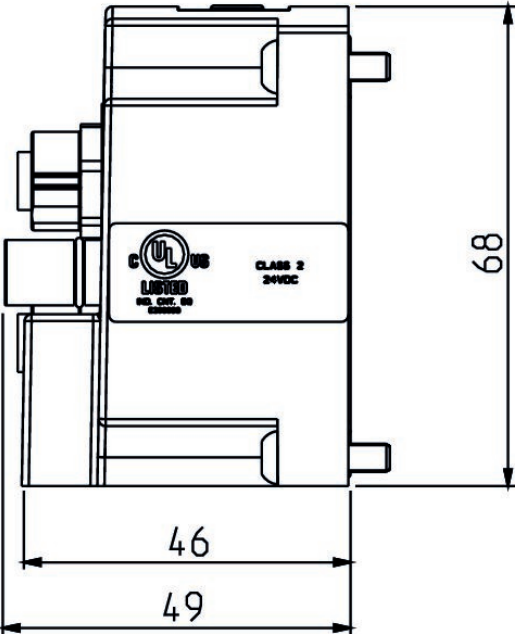
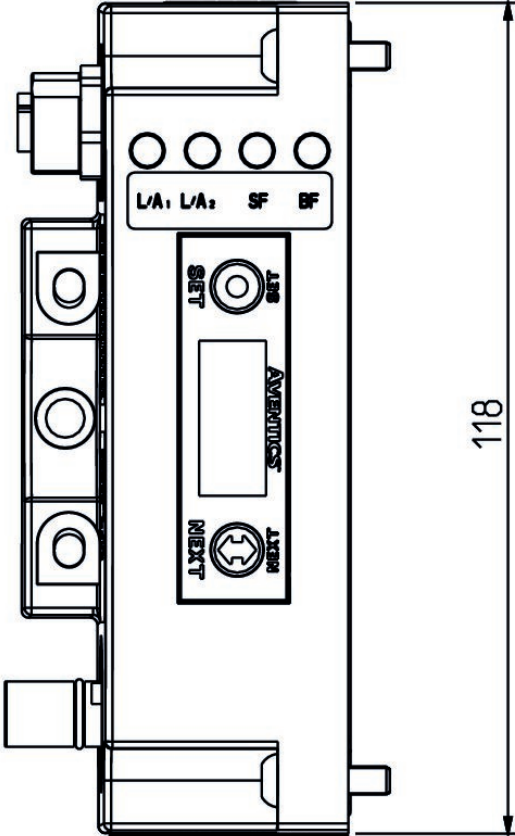
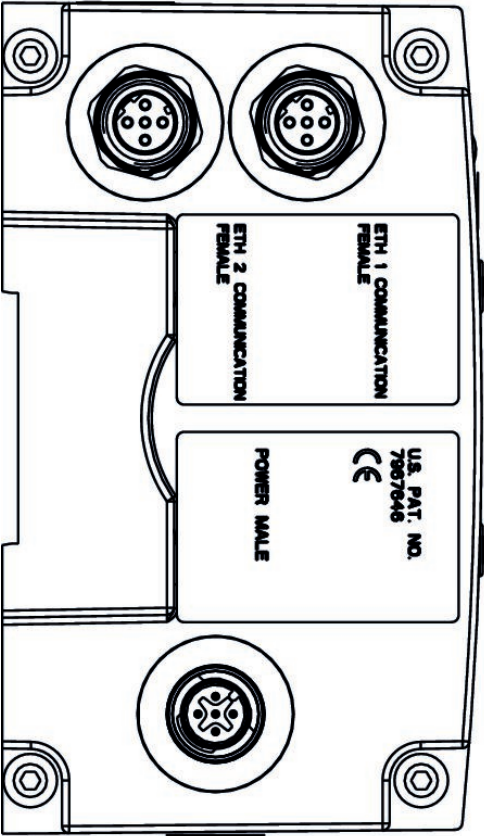
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
EtherCAT	5-pin	24 V DC	-10% / +10%	P580AEEC1010A00



Series 580



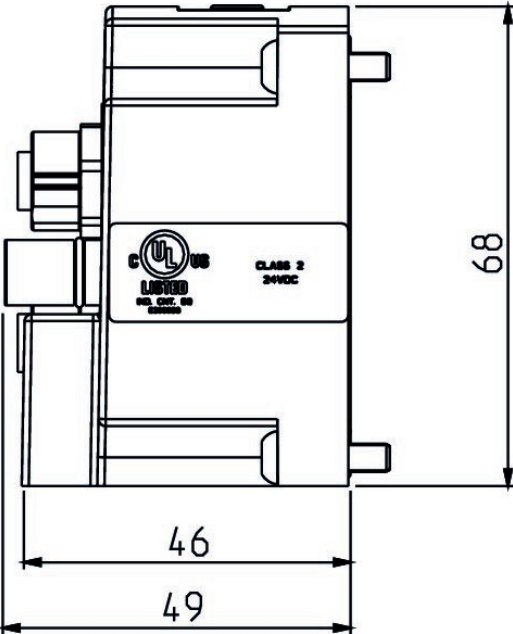
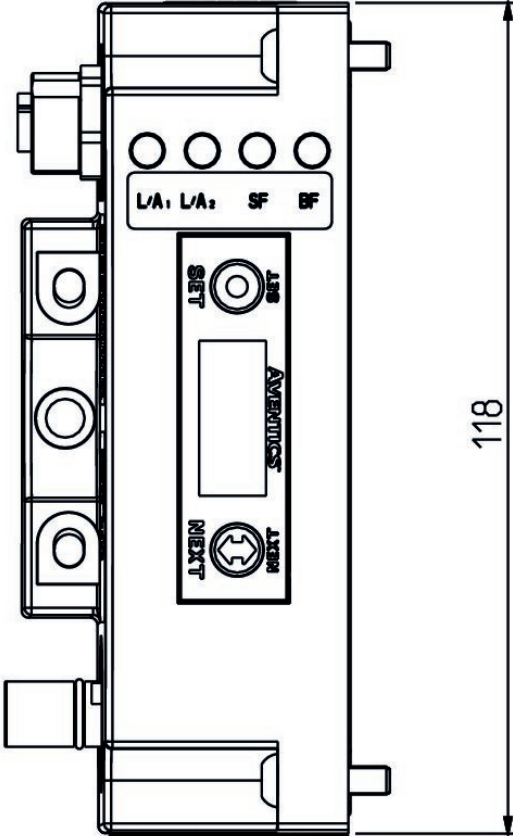
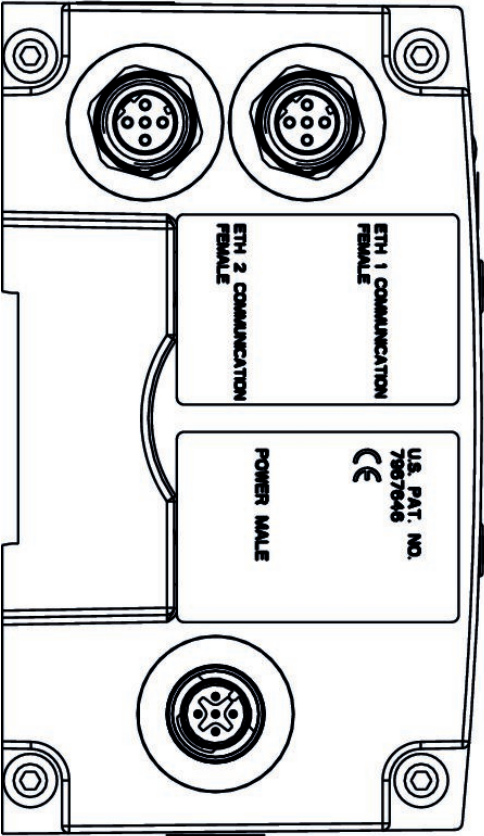
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
EtherNet/IP	4-pin	24 V DC	-10% / +10%	P580AEED1010A00



Series 580



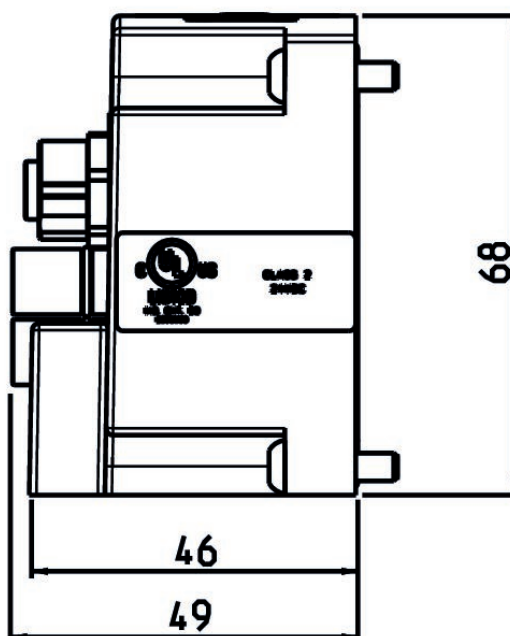
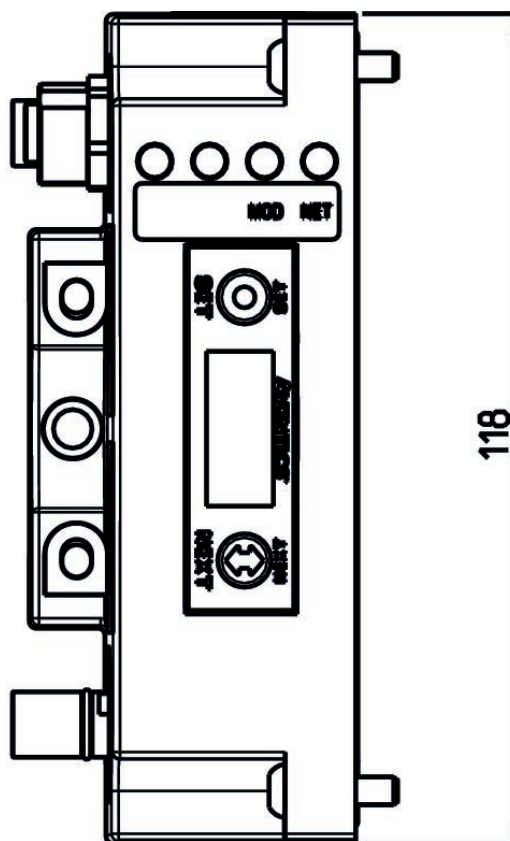
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
POWERLINK	4-pin	24 V DC	-10% / +10%	P580AEPL1010A00



Series 580



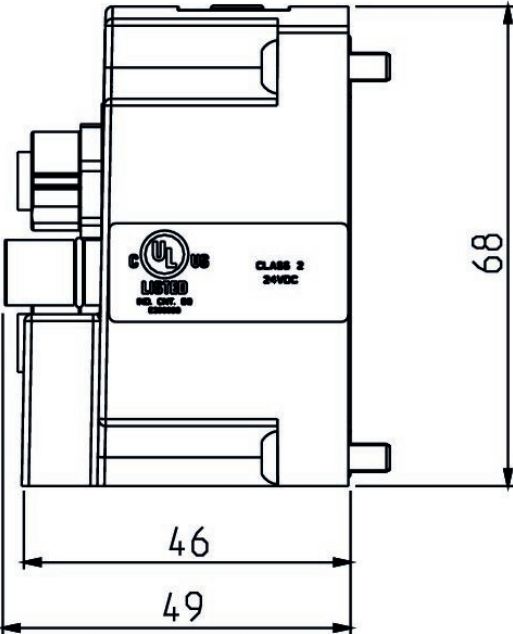
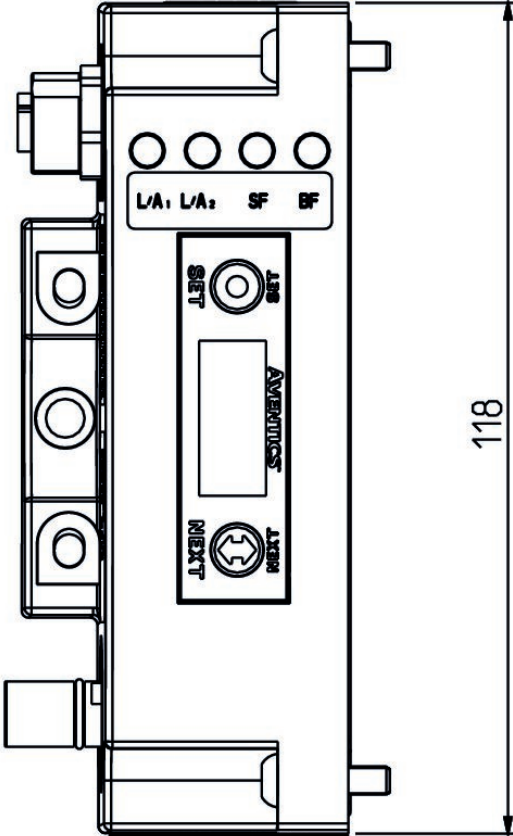
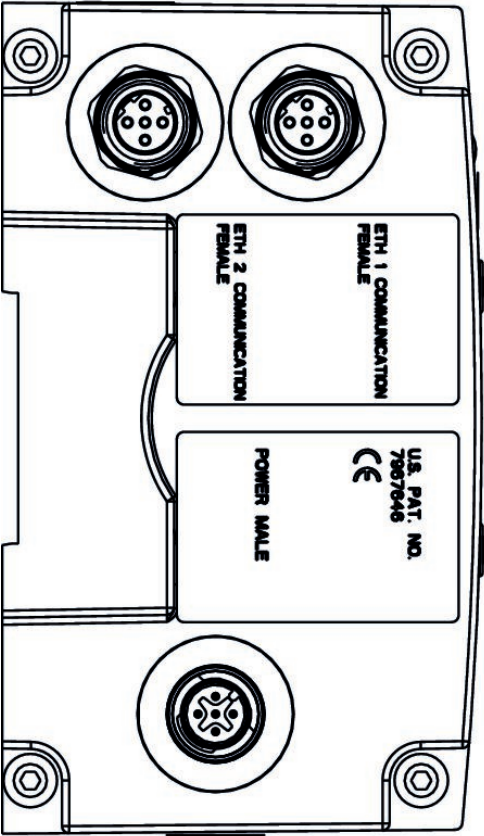
Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
PROFIBUS DP	5-pin	24 V DC	-10% / +10%	P580AEPT1010A00



Series 580



Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
Profinet	5-pin	24 V DC	-10% / +10%	P580AEPN1010A00

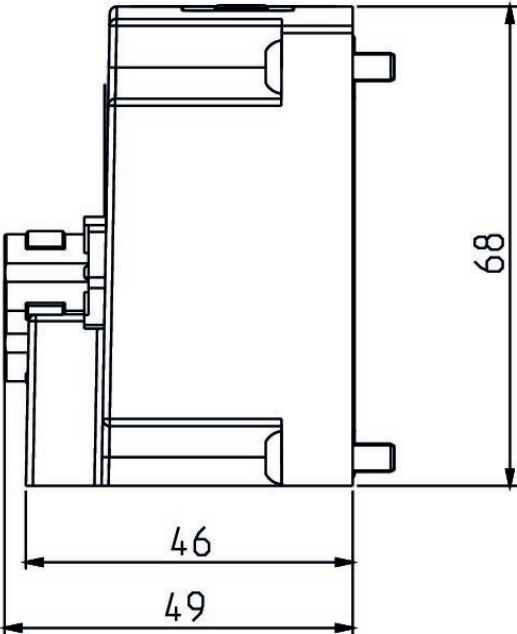
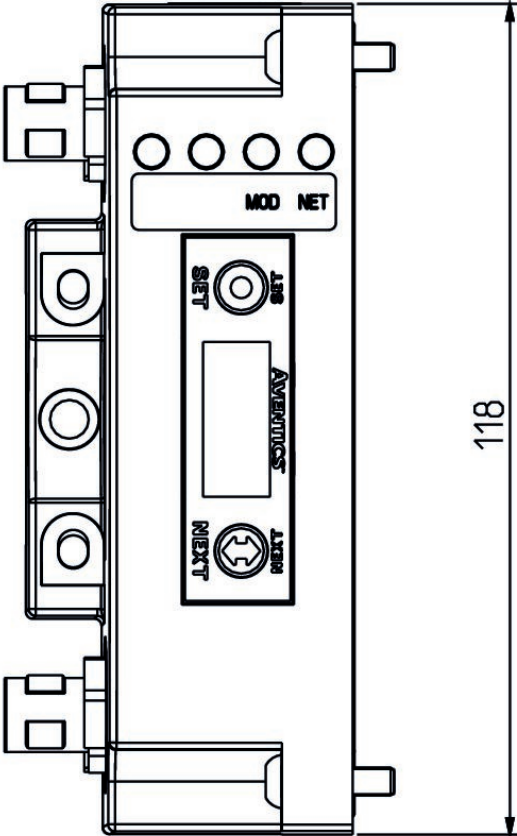
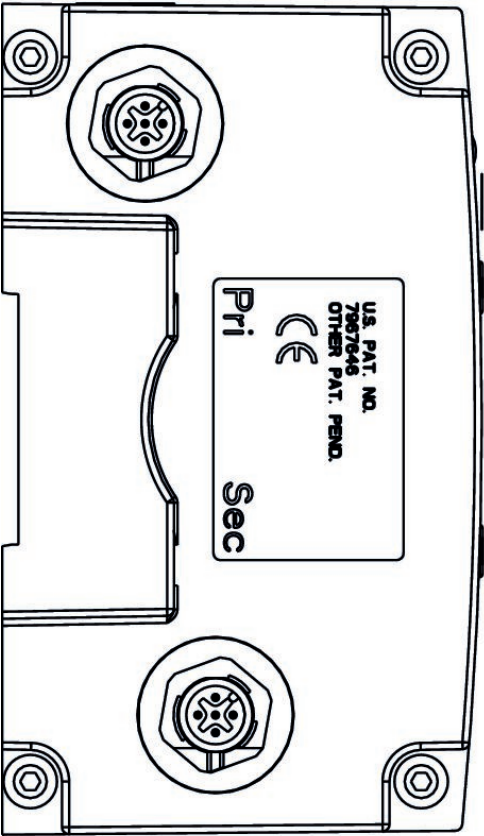


Bus coupler, Series 580

Plug
M12x1



Fieldbus protocol	Number of poles	Operational volt- age electronics	Operational volt- age electronics	Part No.
DeltaV	5-pin	24 V DC	-10% / +10%	P580AECH2010A00

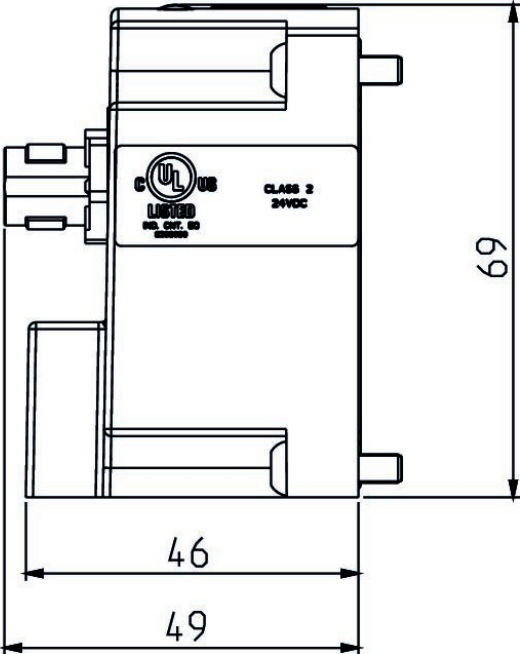
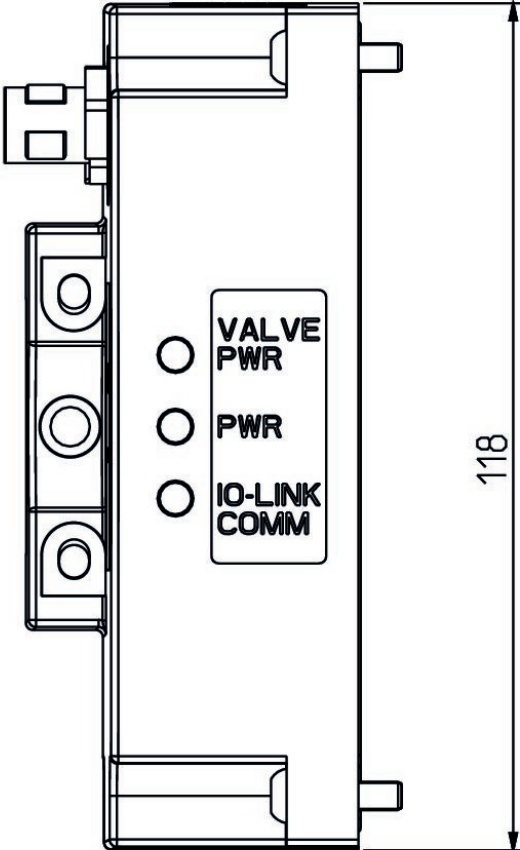
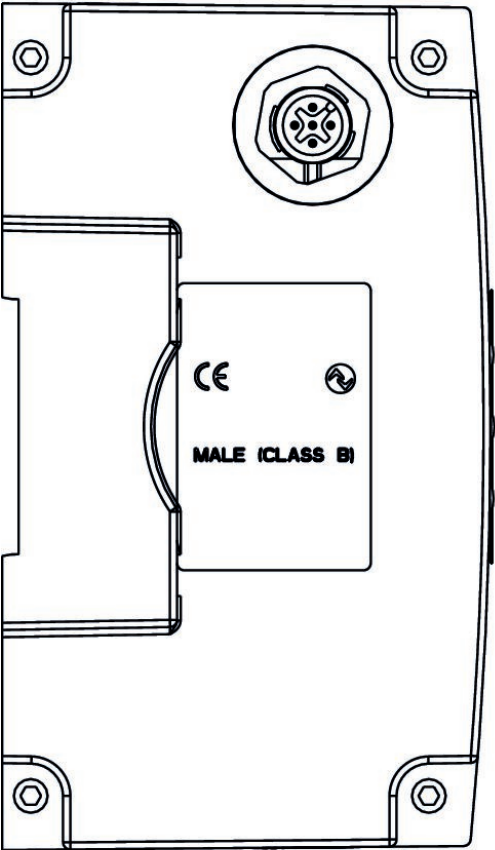


Series 580



Fieldbus protocol	Operational voltage electronics	Operational voltage electronics	Part No.
IO-Link	24 V DC	-10% / +10%	P580AELM1010A00
IO-Link	24 V DC	-10% / +10%	P580AELM2010A00

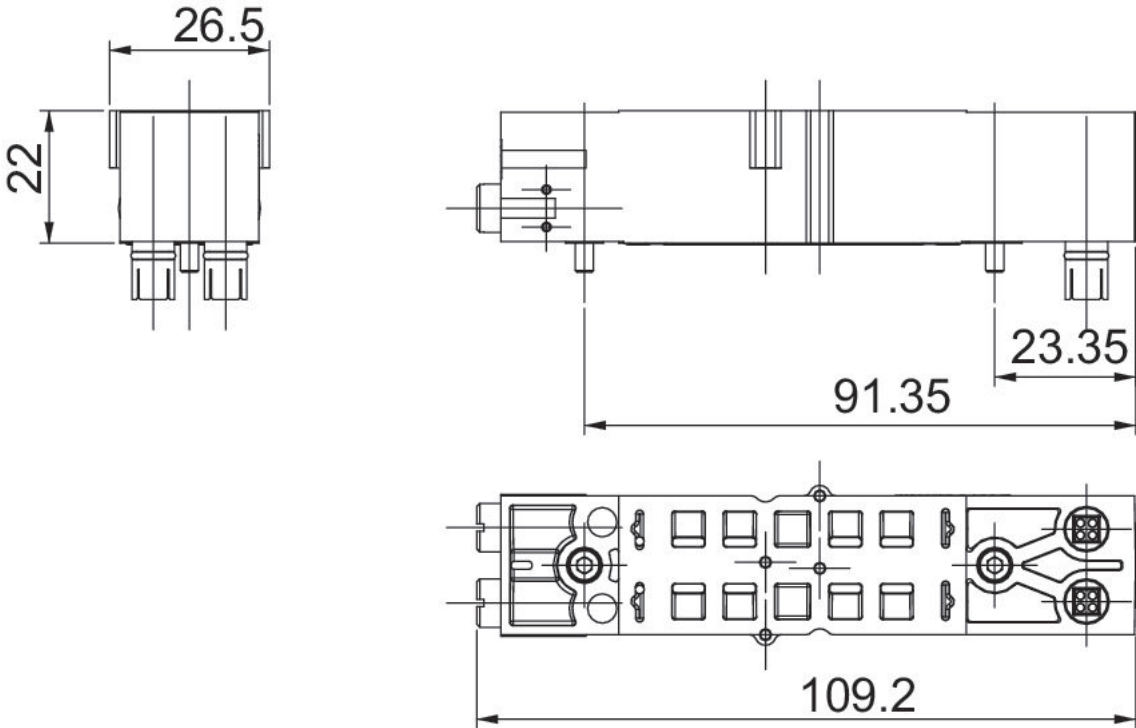
Dimensions



Shut-off sandwich plate accessories



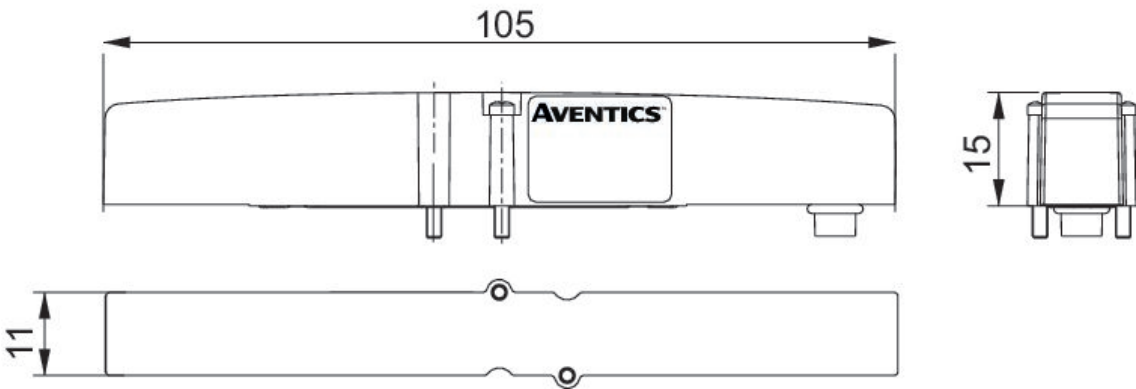
Scope of delivery	Part No.
Shut-off sandwich plate, sealing kit, mounting screws	R501AY428501001



Blanking plate, series 501



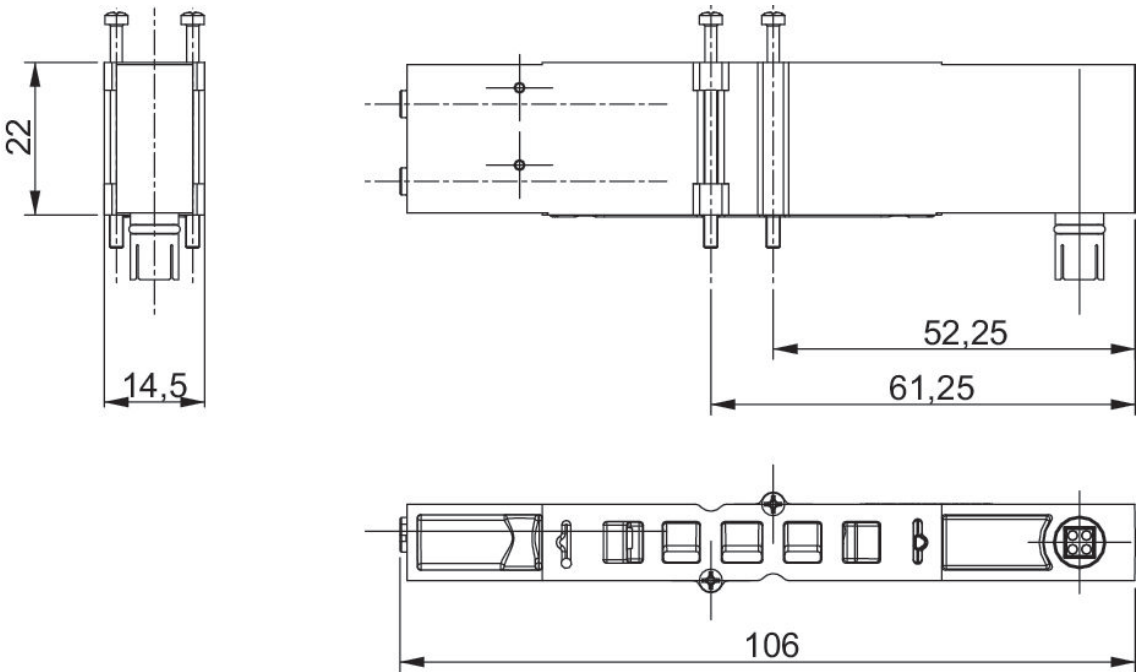
Scope of delivery	Part No.
Blanking plate, sealing kit, mounting screws	P501AB429685001



Throttle sandwich plate accessories, series 501



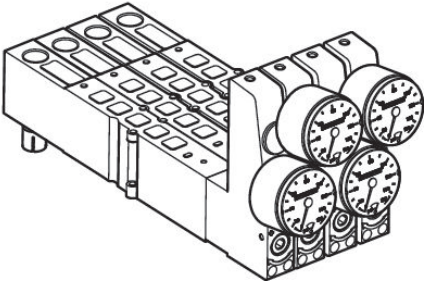
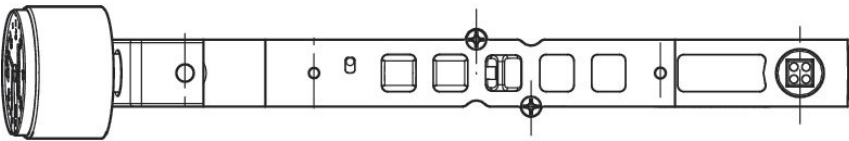
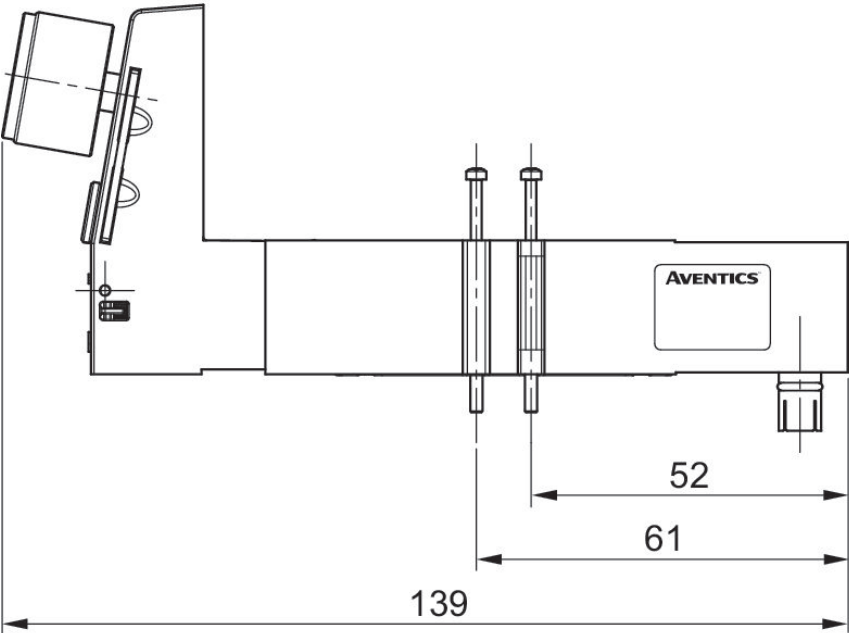
Scope of delivery	Part No.
Throttle sandwich plate, sealing kit, mounting screws	R501AS428500001



Sandwich plate pressure regulator, series 501



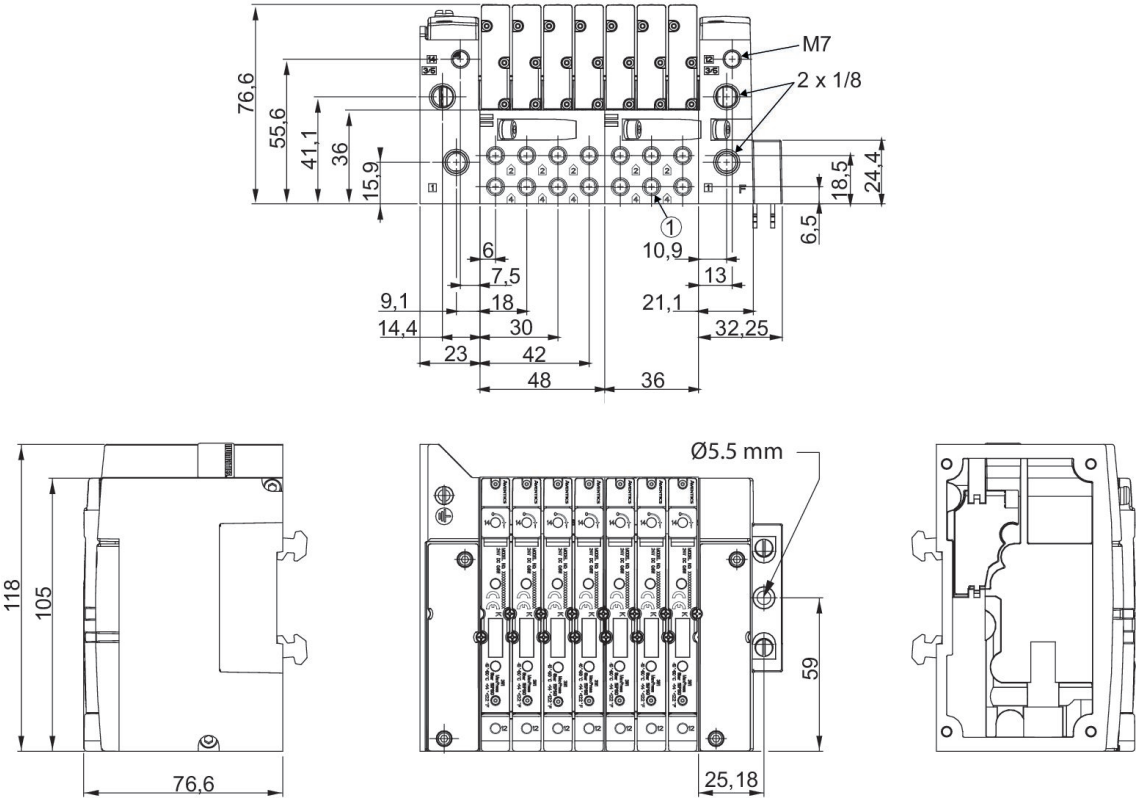
Scope of delivery	Part No.
Sandwich plate, sealing kit, mounting screws, Pressure gauge	R501ARS52JA0010



End plate, series 501



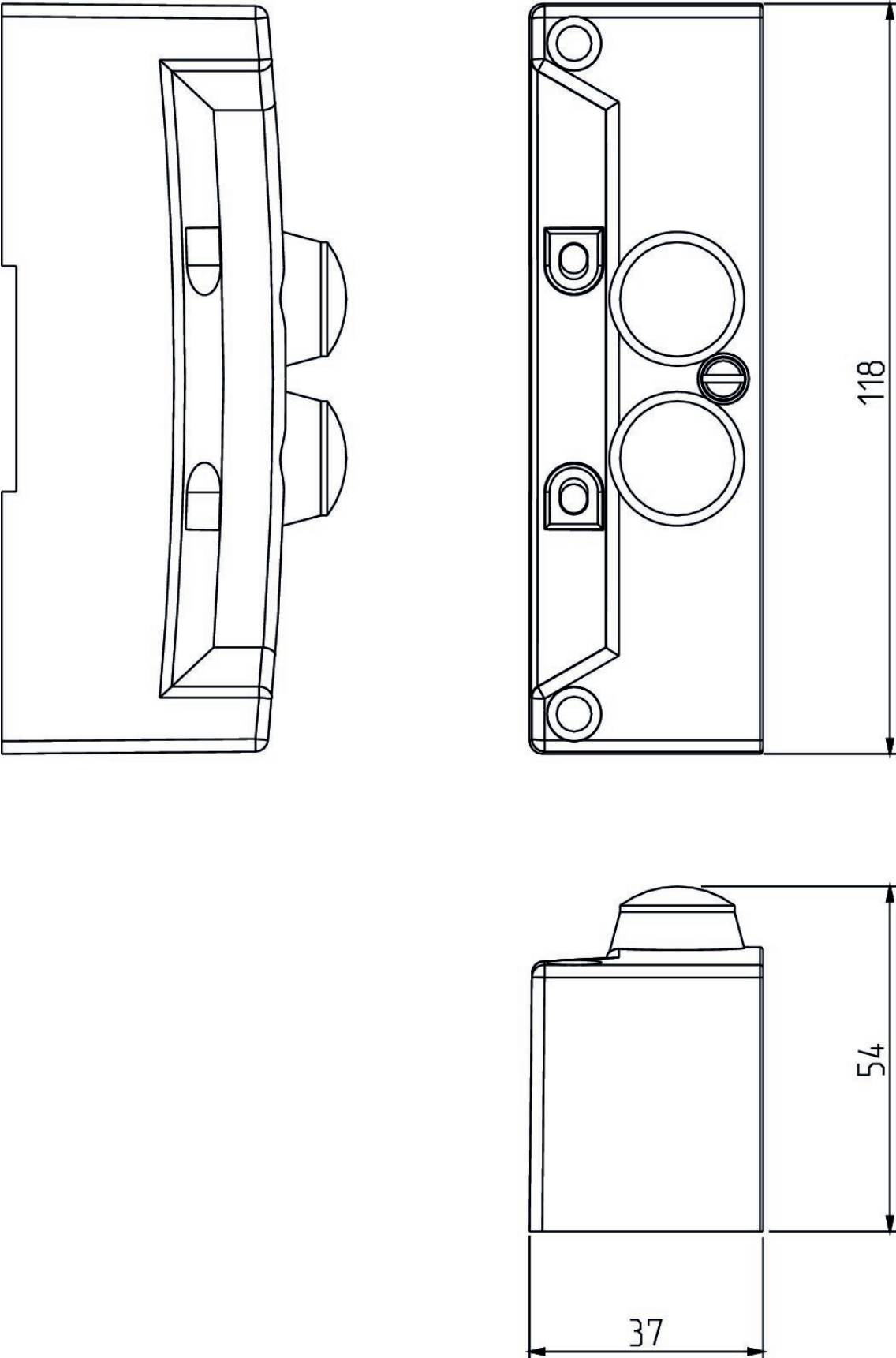
Scope of delivery	Part No.
Left and right end plate, sealing kit, mounting screws	G501AK429465009



Right end plate for G3 Standalone

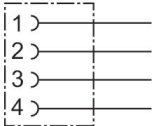


Operational voltage electronics	Operational voltage electronics	Part No.
24 V DC	-10% / +10%	240-255



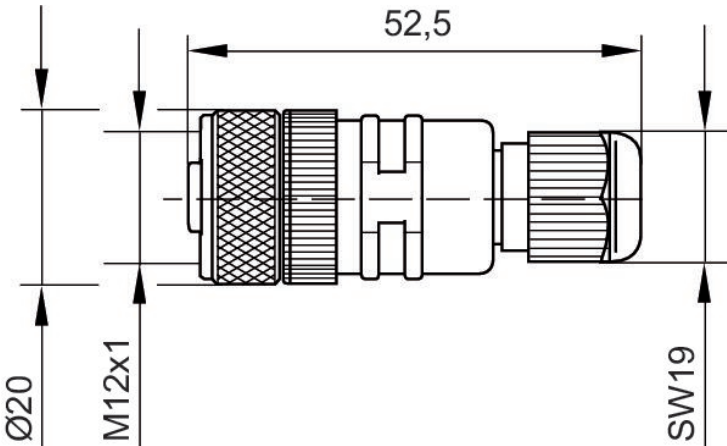
Round plug connector, Series CON-RD

Socket
M12x1
4-pin



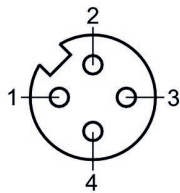
Operational voltage	Contact assignment	Coding	Shielding	Connec- tion type	Max. current [A]	min. suit- able ca- ble Ø [mm]	Min. am- bient tem- perature [°C]	Max. am- bient tem- perature [°C]	Part No.
48 V AC/DC	4-pin	A-coded	unshielded	Screws	4	4	-25	90	8941054324

Dimensions



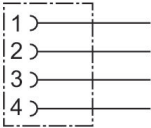
8941054324

Pin assignment, socket



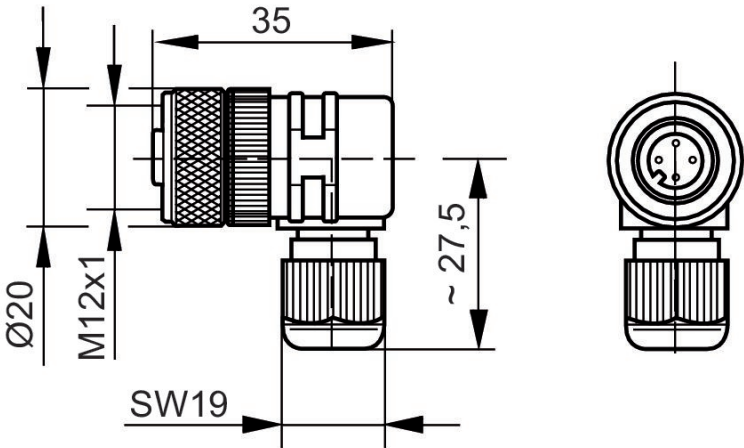
Round plug connector, Series CON-RD

Socket
M12x1
4-pin



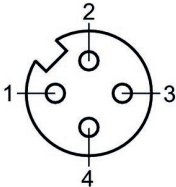
Operational voltage	Contact assignment	Coding	Shielding	Connec- tion type	Max. current [A]	min. suit- able ca- ble Ø [mm]	Min. am- bient tem- perature [°C]	Max. am- bient tem- perature [°C]	Part No.
48 V AC/DC	4-pin	A-coded	unshielded	Screws	4	4	-25	90	8941054424

Dimensions



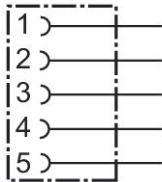
8941054424

Pin assignment, socket



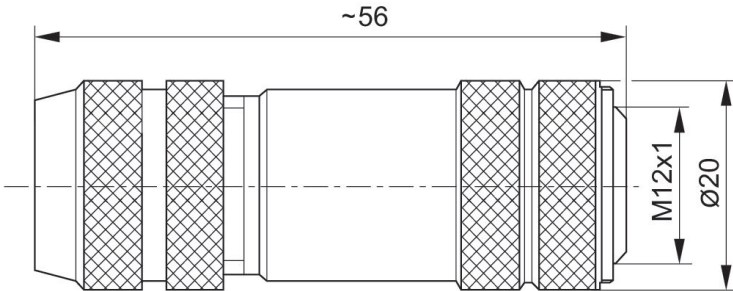
Round plug connector, Series CON-RD

Socket
M12x1
5-pin



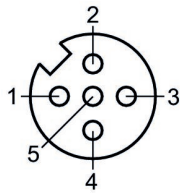
Opera- tional voltage	Contact assign- ment	Coding	Shielding	Protocol	Connec- tion type	Max. current [A]	min. suit- able ca- ble Ø [mm]	Min. am- bient tem- perature [°C]	Max. am- bient tem- perature [°C]	Part No.
48 V AC/ DC	5-pin	A-coded	shielded	CANopen, DeviceNet	Screws	4	6	-40	85	8942051602

Dimensions



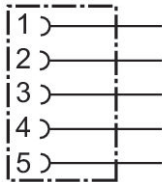
8942051602

Pin assignment, socket



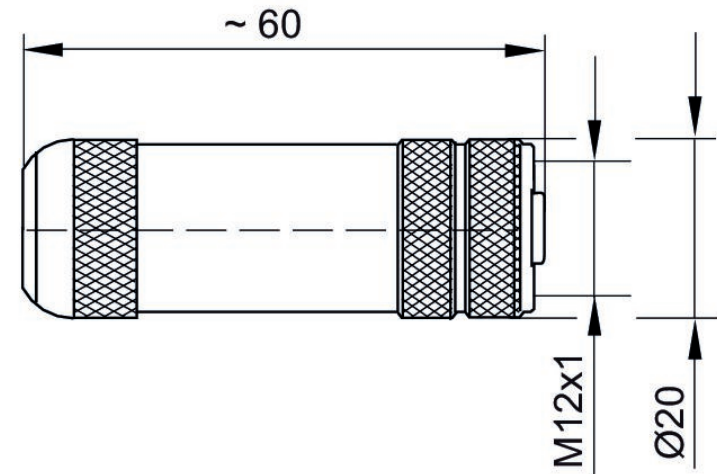
Round plug connector, Series CON-RD

Socket
M12x1
5-pin



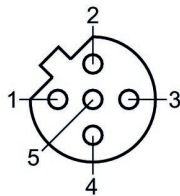
Opera-tional voltage	Contact assign-ment	Coding	Shield-ing	Protocol	Connec-tion type	Max. current [A]	min. suitable cable Ø [mm]	max. suitable cable Ø [mm]	Min. am-bient temper-ature [°C]	Max. ambient temper-ature [°C]	Part No.
48 V AC/DC	5-pin	B-coded	shielded	PROFIBUS DP	Screws	4	6	8	-40	85	8941054044

Dimensions



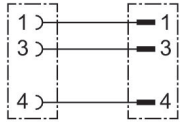
8941054044

Pin assignment, socket



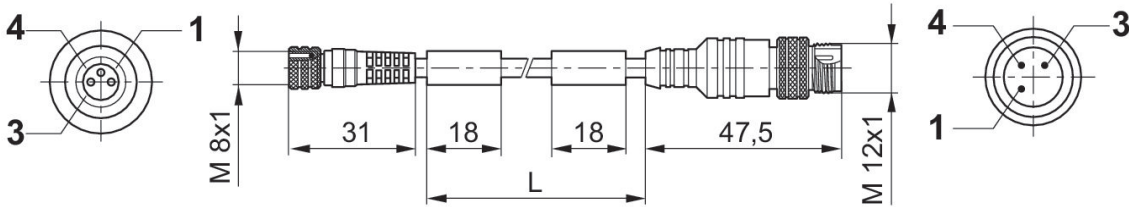
Round plug connector, Series CON-RD

Plug
Socket
M12x1
M8x1
3-pin



Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Part No.
4	unshielded	Socket	M8x1	A-coded	Plug	M12x1	A-coded	2	8946203462

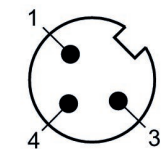
Dimensions



L = length

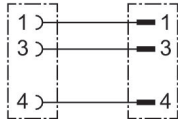
8946203462

Plug pin assignment



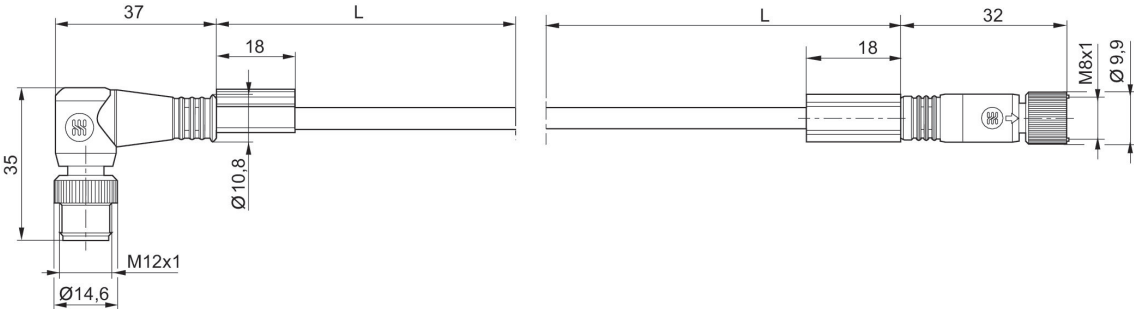
Round plug connector, Series CON-RD

Plug
Socket
M12x1
M8x1
3-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Socket	M8x1	A-coded	Plug	M12x1	A-coded	2	4.1	0.25	-25	80	R412021696
48 V AC/DC	4	unshielded	Socket	M8x1	A-coded	Plug	M12x1	A-coded	5	4.1	0.25	-20	80	R412021697

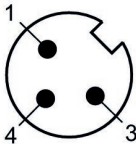
Dimensions



L = length

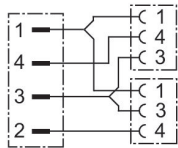
R412021696, R412021697

Plug pin assignment



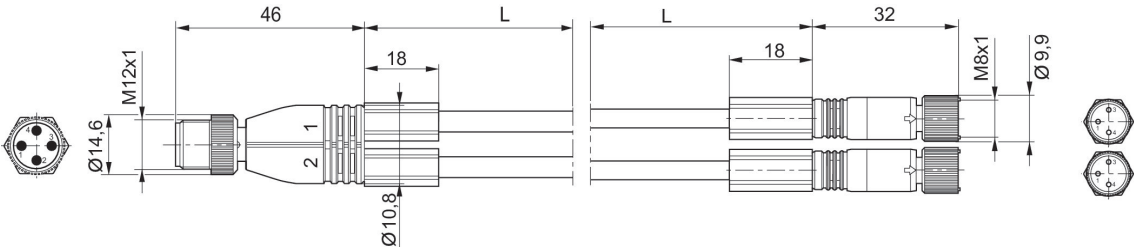
Y-Plug connector, series CON-RD

Plug
Socket
M12x1
M8x1
4-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Plug	M12x1	A-coded	Socket	M8x1	A-coded	0.6	4.1	0.25	-25	80	R412021685
48 V AC/DC			Plug	M12x1	A-coded	Socket	M8x1	A-coded	1.5	4.1	0.25	-25	80	R412021686
48 V AC/DC	4	unshielded	Plug	M12x1	A-coded	Socket	M8x1	A-coded	3	4.1	0.25	-25	80	R412021687

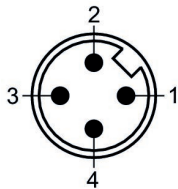
Dimensions



L = length

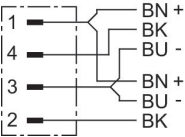
R412021685, R412021686, R412021687

Plug pin assignment



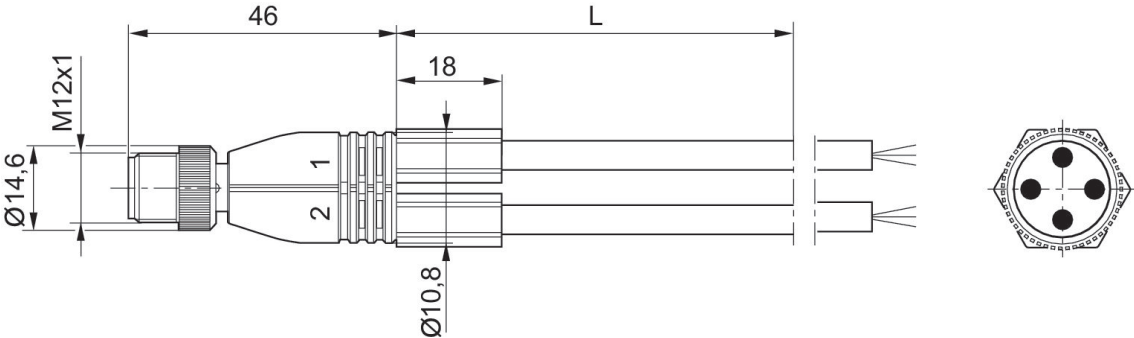
Y-Plug connector, series CON-RD

Plug
2 x open cable ends
M12x1
4-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Plug	M12x1	A-coded	2 x open cable ends	2	4.3	0.34	-40	80	R412021688

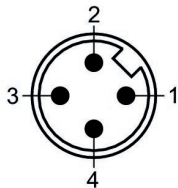
Dimensions



L = length

R412021688

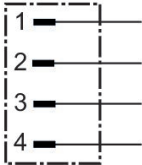
Plug pin assignment



Line 1: (1) BN = brown, (3) BU =blue, (4) BK = black
Line 2: (1) BN = brown, (3) BU =blue, (2) BK = black

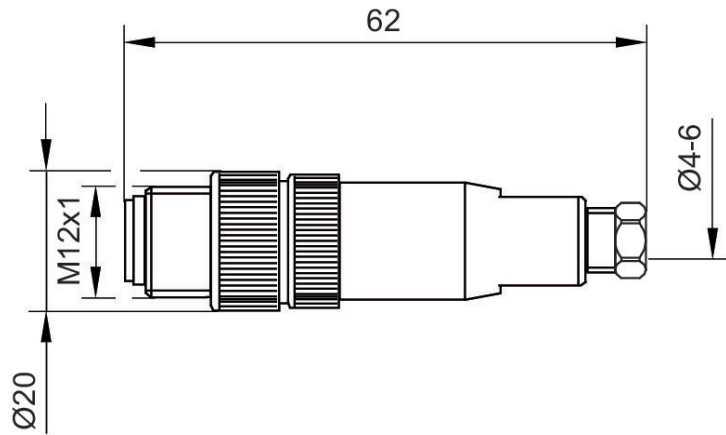
Round plug connector, Series CON-RD

Plug
M12x1
4-pin



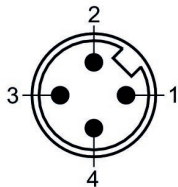
Opera-tional voltage	Contact assign-ment	Coding	Shielding	Connec-tion type	Max. current [A]	min. suit-able ca-ble Ø [mm]	max. suit-able ca-ble Ø [mm]	Min. am-bient tem-perature [°C]	Max. am-bient tem-perature [°C]	Part No.
48 V AC/DC	4-pin	A-coded	unshielded	Screws	4	4	6	-40	85	1834484222

Dimensions



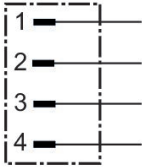
1834484222

Plug pin assignment



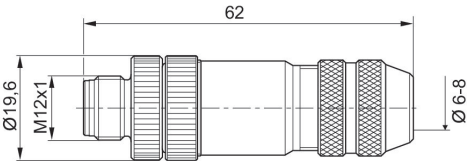
Round plug connector, Series CON-RD

Plug
M12x1
4-pin



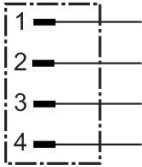
Operational voltage	Contact assignment	Coding	Shielding	Protocol	Connection type	Max. current [A]	min. suitable cable Ø [mm]	max. suitable cable Ø [mm]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4-pin	D-coded	shielded	Ethernet, EtherNet/IP, EtherCAT, POWERLINK, sercos III	Thread cutting	4	6	8	-40	85	R419801401

Dimensions



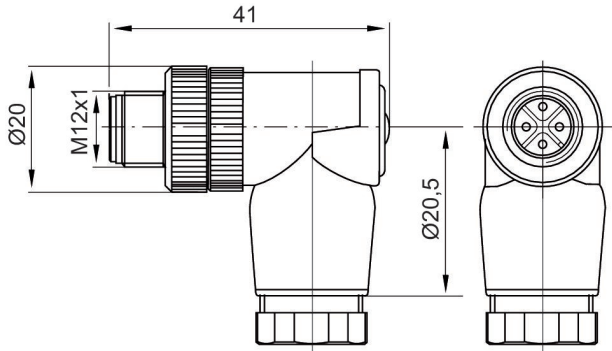
Round plug connector, Series CON-RD

Plug
M12x1
4-pin

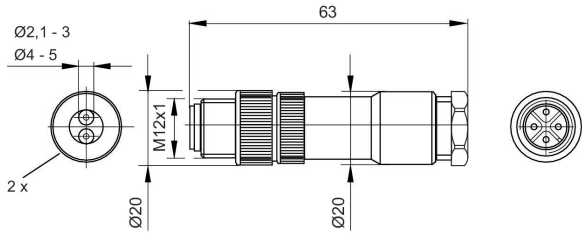


Opera-tional voltage	Contact assign-ment	Coding	Shielding	Connec-tion type	Max. current [A]	min. suit-able ca-ble Ø [mm]	max. suit-able ca-ble Ø [mm]	Min. am-bient tem-perature [°C]	Max. am-bient tem-perature [°C]	Part No.
48 V AC/DC	4-pin	A-coded	unshielded	Screws	4	4	6	-40	85	1834484223
48 V AC/DC	4-pin	A-coded	unshielded	Screws	4	2.1	3	-40	85	1834484246

1834484223



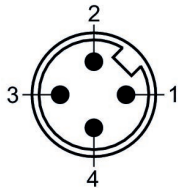
1834484246



duo plug

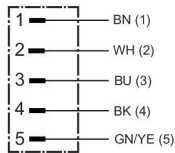
1834484223, 1834484246

Plug pin assignment



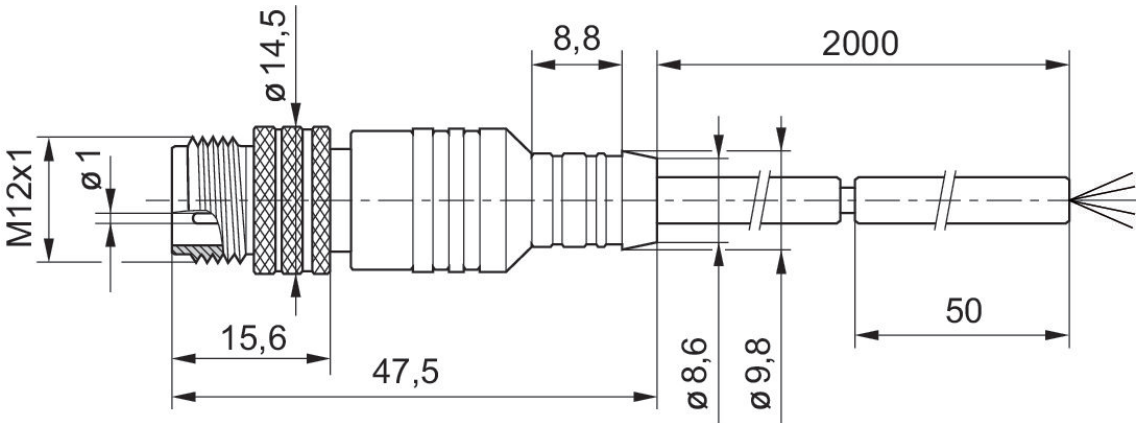
Round plug connector, Series CON-RD

Plug
M12x1
5-pin



Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Cable length [m]	Part No.
unshielded	Plug	M12x1	A-coded	open cable ends	2	8946203432
unshielded	Plug	M12x1	A-coded	open cable ends	5	8946203442

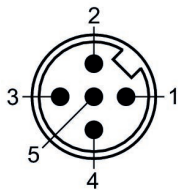
Dimensions



L = length

8946203432, 8946203442

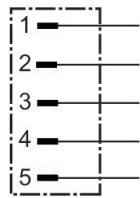
Plug pin assignment



(1) BN=brown (2) WH=white (3) BU=blue (4) BK=black (5) GY=green-yellow

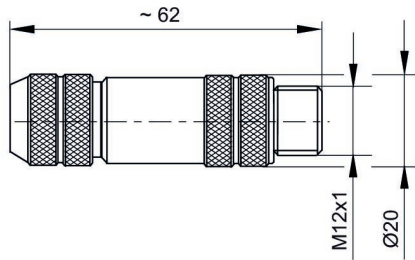
Round plug connector, Series CON-RD

Plug
M12x1
5-pin



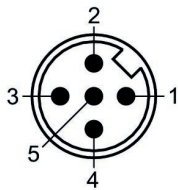
Operational voltage	Contact assignment	Coding	Shielding	Protocol	Connection type	Max. current [A]	min. suitable cable Ø [mm]	max. suitable cable Ø [mm]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	5-pin	A-coded	shielded	CANopen, DeviceNet	Screws	4	6	8	-40	85	8942051612

Dimensions



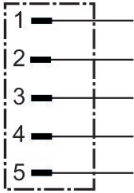
8942051612

Plug pin assignment



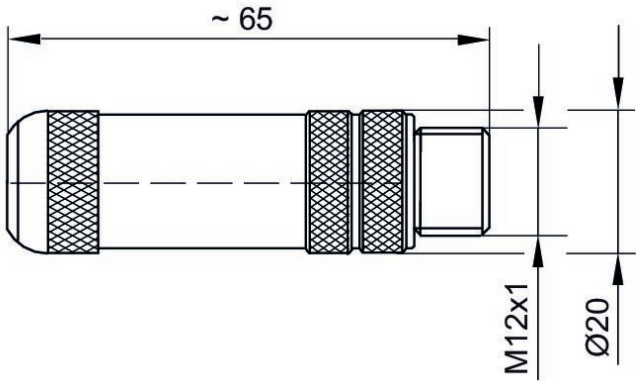
Round plug connector, Series CON-RD

Plug
M12x1
5-pin



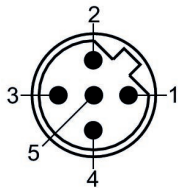
Operational voltage	Contact assignment	Coding	Shielding	Protocol	Connection type	Max. current [A]	min. suitable cable Ø [mm]	max. suitable cable Ø [mm]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	5-pin	B-coded	shielded	PROFIBUS DP	Screws	4	4	9	-25	85	8941054054

Dimensions



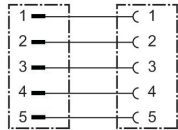
8941054054

Plug pin assignment



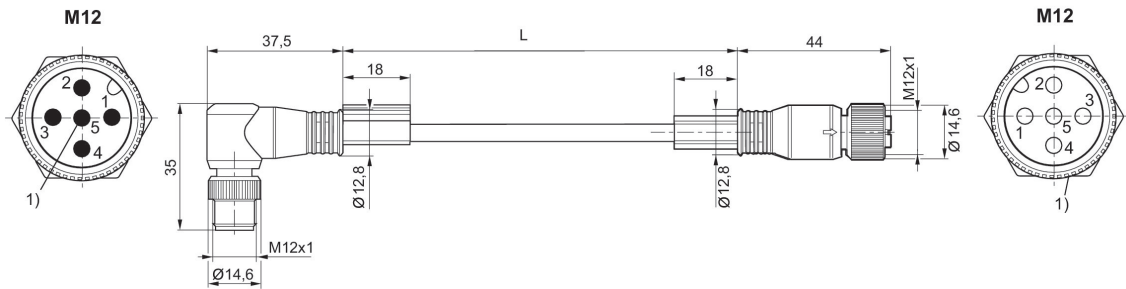
Round plug connector, Series CON-RD

Plug
Socket
M12x1
M12x1
5-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	shielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	2	5.4	0.34	-20	85	R412022193

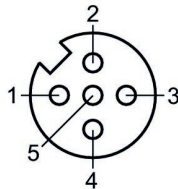
Dimensions



L = length
PIN assignment 1:1
1) Shield is connected to pin 5 of the plug and the knurled screw of the socket.

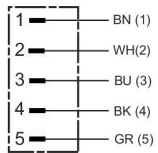
R412022193

Pin assignment, socket



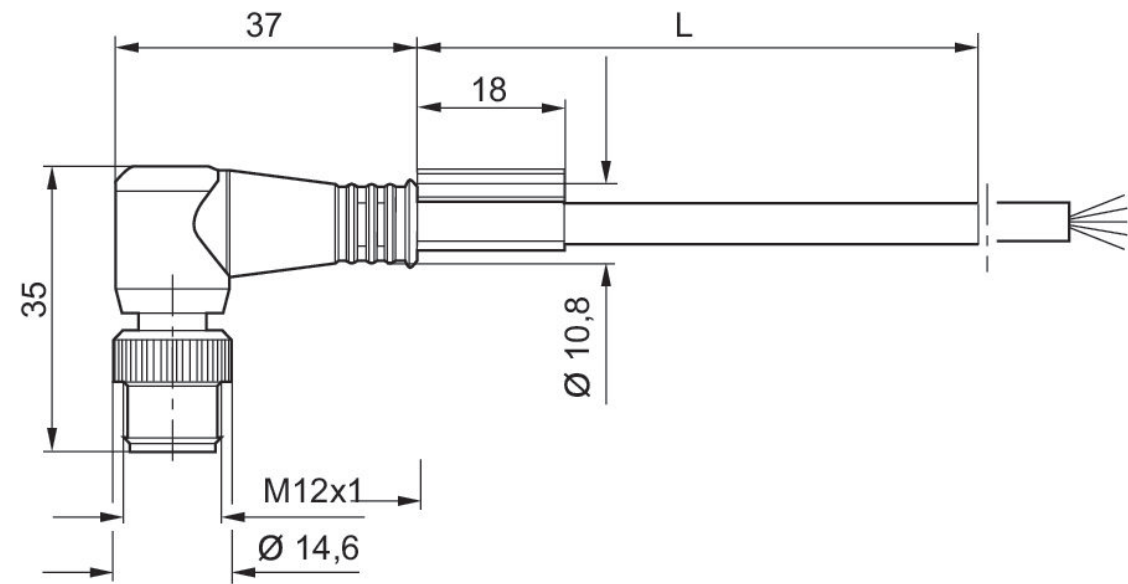
Round plug connector, Series CON-RD

Plug
open cable ends
M12x1
5-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Plug	M12x1	A-coded	open cable ends	2	5	0.34	-40	85	R412021691
48 V AC/DC	4	unshielded	Plug	M12x1	A-coded	open cable ends	5	5	0.34	-40	85	R412021692
48 V AC/DC	4	unshielded	Plug	M12x1	A-coded	open cable ends	10	5	0.34	-25	85	R412021693

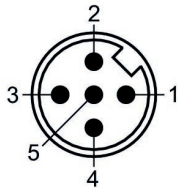
Dimensions



L = length

R412021691, R412021692, R412021693

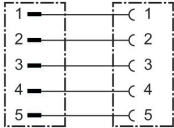
Plug pin assignment



(1) BN=brown (2) WH=white (3) BU=blue (4) BK=black (5) GY=grey

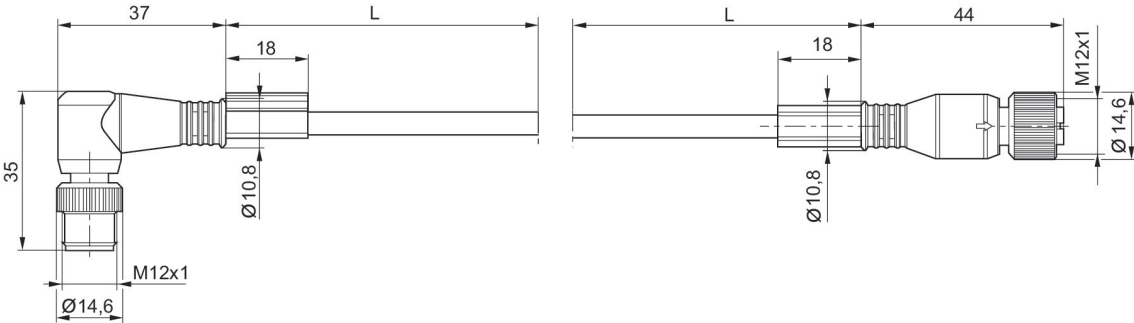
Round plug connector, Series CON-RD

Plug
Socket
M12x1
M12x1
5-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	2	5	0.34	-25	85	R412021694
48 V AC/DC	4	unshielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	5	5	0.34	-25	85	R412021695

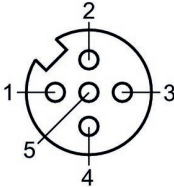
Dimensions



L = length

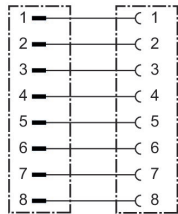
R412021694, R412021695

Pin assignment, socket



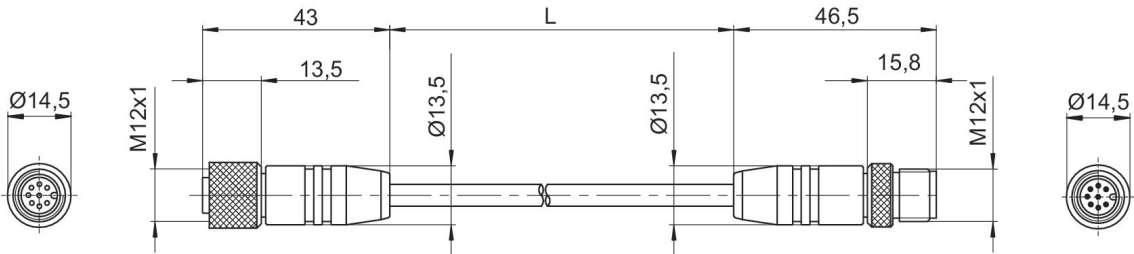
Round plug connector, Series CON-RD

Plug
Socket
M12x1
M12x1
8-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
36 V DC / 30 V AC	1.5	shielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	0.5	6.6	0.25	-25	80	8946202802
36 V DC / 30 V AC	1.5	shielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	1	6.6	0.25	-25	80	8946202812
36 V DC / 30 V AC	1.5	shielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	2	6.6	0.25	-25	80	8946202822
36 V DC / 30 V AC	1.5	shielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	5	6.6	0.25	-25	80	8946202832
36 V DC / 30 V AC	1.5	shielded	Socket	M12x1	A-coded	Plug	M12x1	A-coded	10	6.6	0.25	-25	80	8946202842

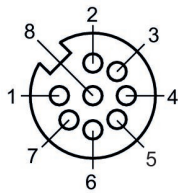
Dimensions



L = length

8946202802, 8946202812, 8946202822, 8946202832, 8946202842

Pin assignment, socket



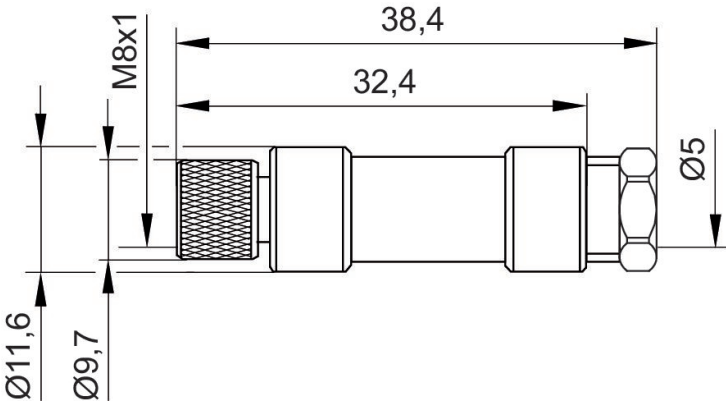
Round plug connector, Series CON-RD

Plug
M8x1
3-pin



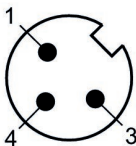
Opera-tional voltage	Contact assign-ment	Coding	Shielding	Conne-cion type	Max. current [A]	min. suit-able ca-ble Ø [mm]	max. suit-able ca-ble Ø [mm]	Min. am-bient tem-perature [°C]	Max. am-bient tem-perature [°C]	Part No.
48 V AC/DC	3-pin	A-coded	unshielded	Screws	4	3.5	5	-40	85	R412021676

Dimensions



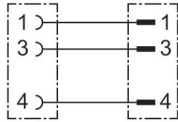
R412021676

Plug pin assignment



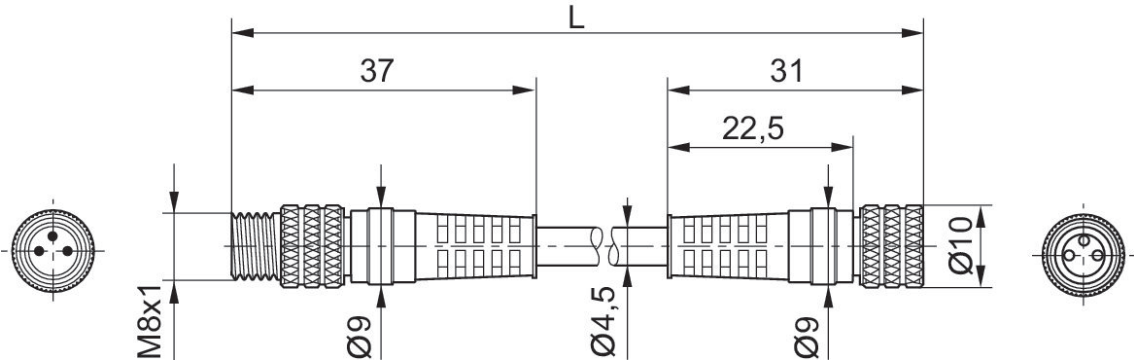
Round plug connector, Series CON-RD

Plug
M8x1
3-pin



Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Part No.
unshielded	Socket	M8x1	A-coded	Plug	M8x1	A-coded	1	4.5	8946203702
unshielded	Socket	M8x1	A-coded	Plug	M8x1	A-coded	2	4.5	8946203712
unshielded	Socket	M8x1	A-coded	Plug	M8x1	A-coded	5	4.5	8946203722

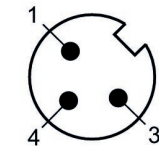
Dimensions



L = length

8946203702, 8946203712, 8946203722

Plug pin assignment



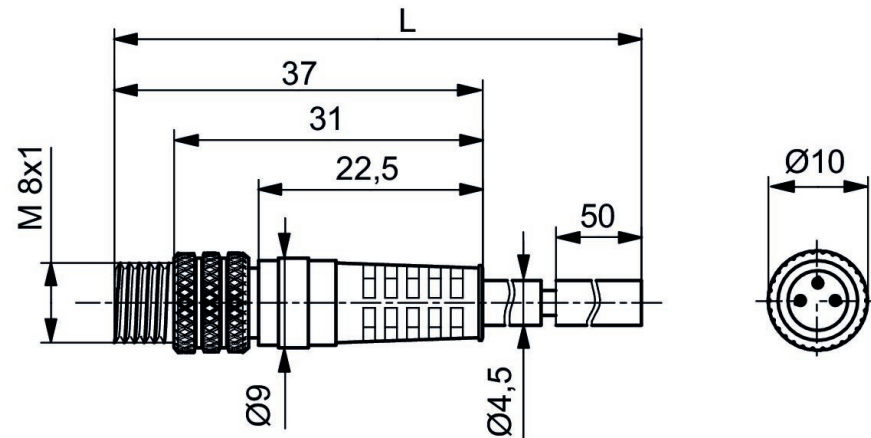
Round plug connector, Series CON-RD

Plug
M8x1
3-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
30 V AC/DC	3	unshielded	Plug	M8x1	A-coded	open cable ends	3	4.5	0.25	-25	80	8946203602
30 V AC/DC	3	unshielded	Plug	M8x1	A-coded	open cable ends	5	4.5	0.25	-25	80	8946203612
30 V AC/DC	3	unshielded	Plug	M8x1	A-coded	open cable ends	10	4.5	0.25	-25	80	8946203622

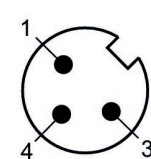
Dimensions



L = length

8946203602, 8946203612, 8946203622

Plug pin assignment



(1) BN=brown (3) BU=blue (4) BK=black

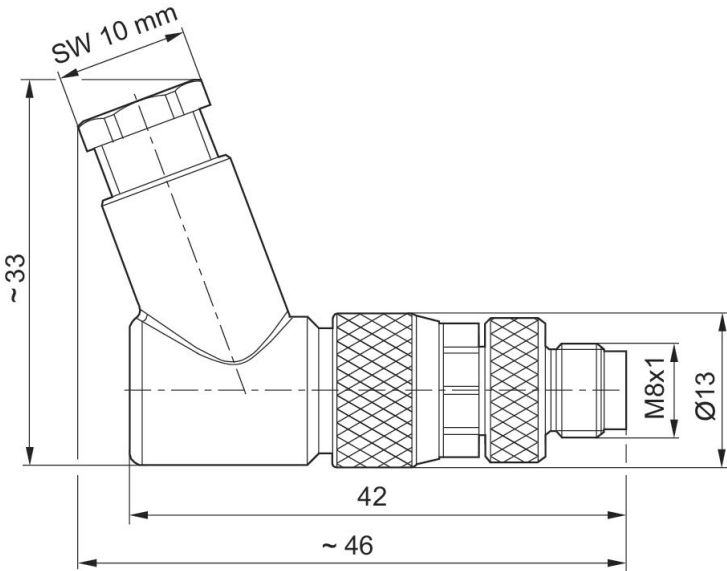
Round plug connector, Series CON-RD

Plug
M8x1
3-pin



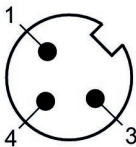
Opera- tional voltage	Contact assign- ment	Coding	Shielding	Conne- ction type	Max. current [A]	min. suit- able ca- ble Ø [mm]	max. suit- able ca- ble Ø [mm]	Min. am- bient tem- perature [°C]	Max. am- bient tem- perature [°C]	Part No.
48 V AC/ DC	3-pin	A-coded	unshielded	Screws	4	3.5	6	-25	85	R412021677

Dimensions



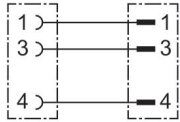
R412021677

Plug pin assignment



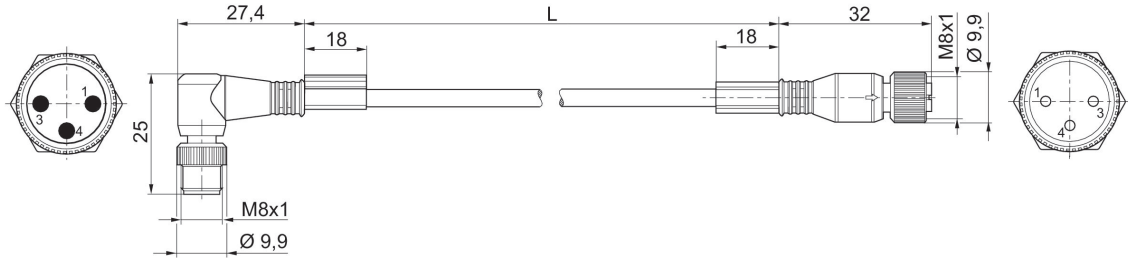
Round plug connector, Series CON-RD

Plug
Socket
M8x1
M8x1
3-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Electrical connection 2, thread size	Electrical connection 2, coding	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Socket	M8x1	A-coded	Plug	M8x1	A-coded	1	4.1	0.25	-25	80	R412021681
48 V AC/DC	4	unshielded	Socket	M8x1	A-coded	Plug	M8x1	A-coded	2	4.1	0.25	-25	80	R412021682
48 V AC/DC	4	unshielded	Socket	M8x1	A-coded	Plug	M8x1	A-coded	5	4.1	0.25	-25	80	R412021683

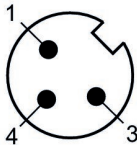
Dimensions



L = length

R412021681, R412021682, R412021683

Plug pin assignment



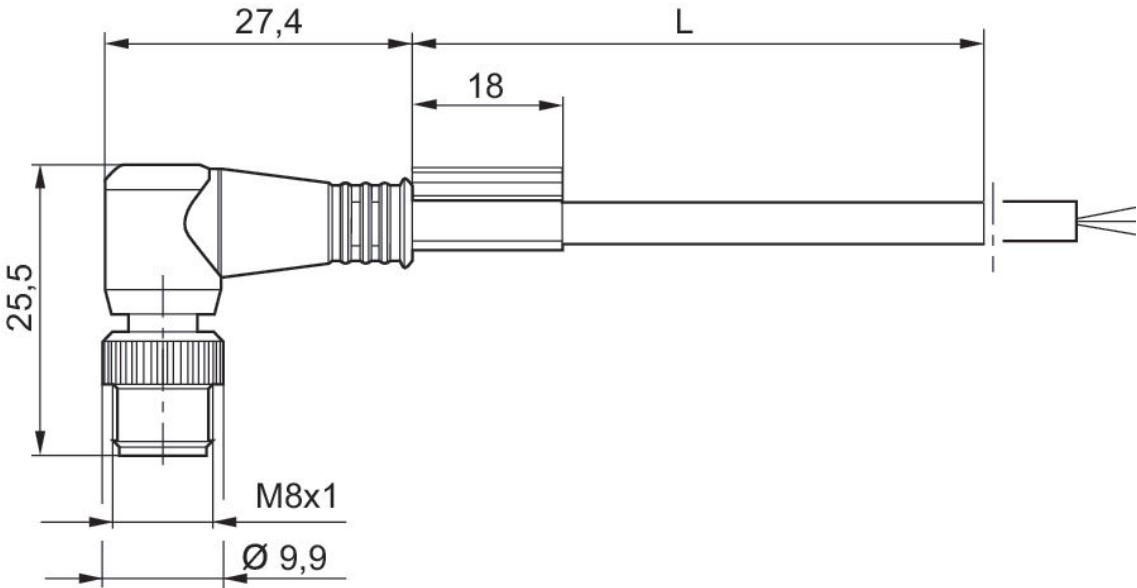
Round plug connector, Series CON-RD

Plug
M8x1
3-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 1, coding	Electrical connection 2, type	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
48 V AC/DC	4	unshielded	Plug	M8x1	A-coded	open cable ends	2	4.1	0.25	-25	80	R412021678
48 V AC/DC	4	unshielded	Plug	M8x1	A-coded	open cable ends	5	4.1	0.25	-25	80	R412021679
48 V AC/DC	4	unshielded	Plug	M8x1	A-coded	open cable ends	10	4.1	0.25	-25	80	R412021680

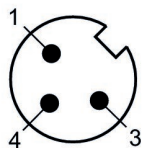
Dimensions



L = length

R412021678, R412021679, R412021680

Plug pin assignment



(1) BN=brown (3) BU=blue (4) BK=black

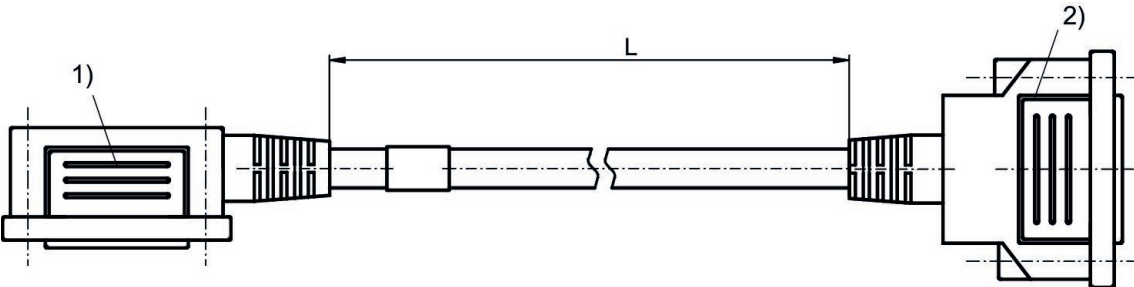
Multipole plug, series CON-MP

Plug
D-Sub
25-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 2, type	Electrical connection 2, thread size	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	0.5	8.5	0.2	-20	80	R412020635
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	1	8.5	0.2	-20	80	R412020636
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	2	8.5	0.2	-20	80	R412020637
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	5	8.5	0.2	-20	80	R412020638
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	10	8.5	0.2	-20	80	R412020639

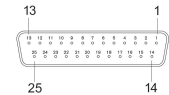
Dimensions



- 1) Port 1 (Plug)
- 2) Port 2 (Socket)

R412020635, R412020636, R412020637, R412020638, R412020639

PIN assignment and cable colors



Socket

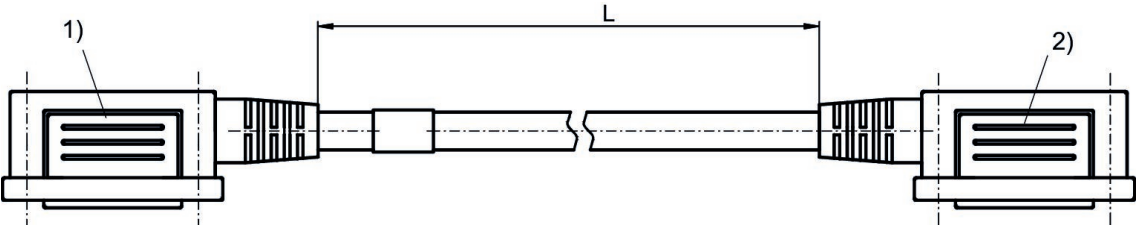
Multipole plug, series CON-MP

Plug
D-Sub
25-pin



Operational voltage	Current [A]	Shielding	Electrical connection 1, type	Electrical connection 1, thread size	Electrical connection 2, type	Electrical connection 2, thread size	Cable length [m]	Cable-Ø [mm]	Wire cross-section [mm²]	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	0.5	8.5	0.2	-20	80	R412020630
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	1	8.5	0.2	-20	80	R412020631
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	2	8.5	0.2	-20	80	R412020632
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	5	8.5	0.2	-20	80	R412020633
24 V DC	3	unshielded	Plug	D-Sub	Socket	D-Sub	10	8.5	0.2	-20	80	R412020634

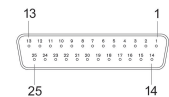
Dimensions



- 1) Port 1 (Plug)
- 2) Port 2 (Socket)

R412020630, R412020631, R412020632, R412020633, R412020634

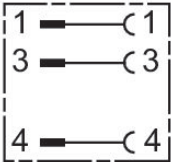
PIN assignment and cable colors



Socket

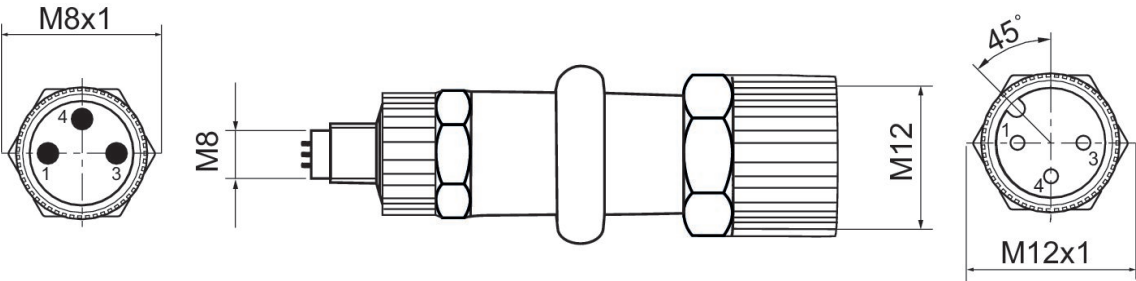
Adapter, Series CON-AP

Plug
Socket
M8x1
M12x1
3-pin



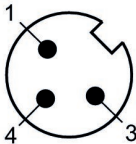
Max. current [A]	Part No.
4	R412021684

Dimensions



R412021684

Plug pin assignment



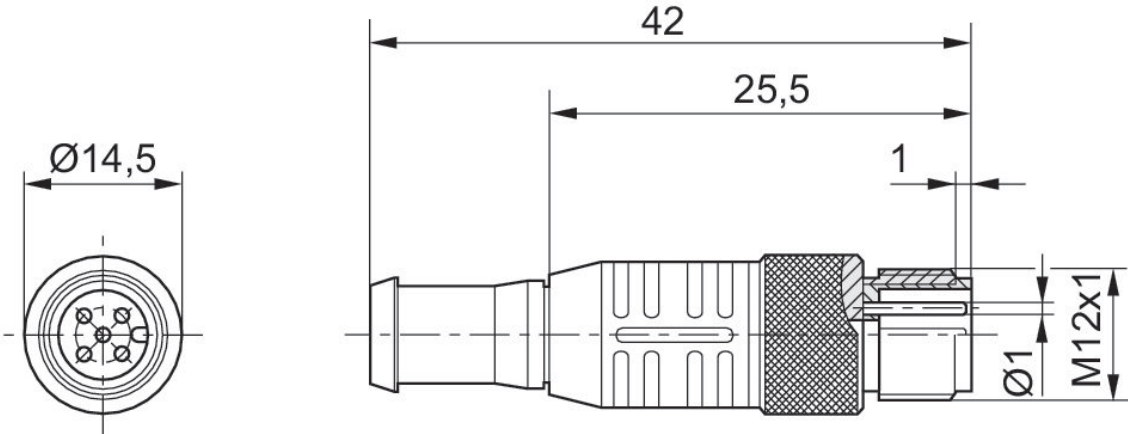
Data final plug, Series CON-RD

Plug
M12x1
4-pin



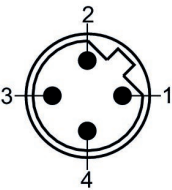
Contact assignment	Coding	Protocol	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
4-pin	B-coded	PROFIBUS DP	-25	80	8941054064

Dimensions



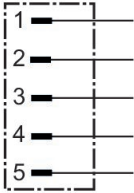
8941054064

Plug pin assignment



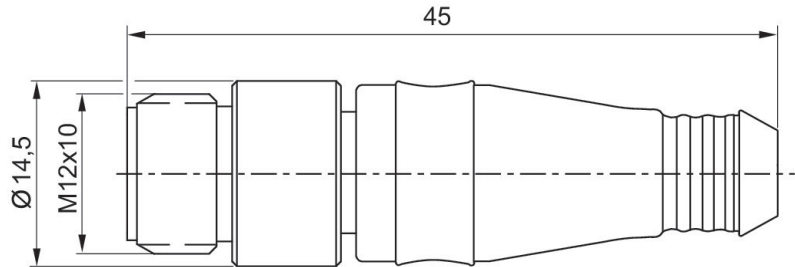
Data final plug, Series CON-RD

Plug
M12x1
5-pin



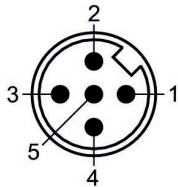
Contact assignment	Coding	Protocol	Min. ambient temperature [°C]	Max. ambient temperature [°C]	Part No.
5-pin	A-coded	CANopen, DeviceNet	0	60	8941054264

Dimensions



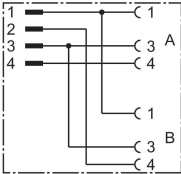
8941054264

Plug pin assignment



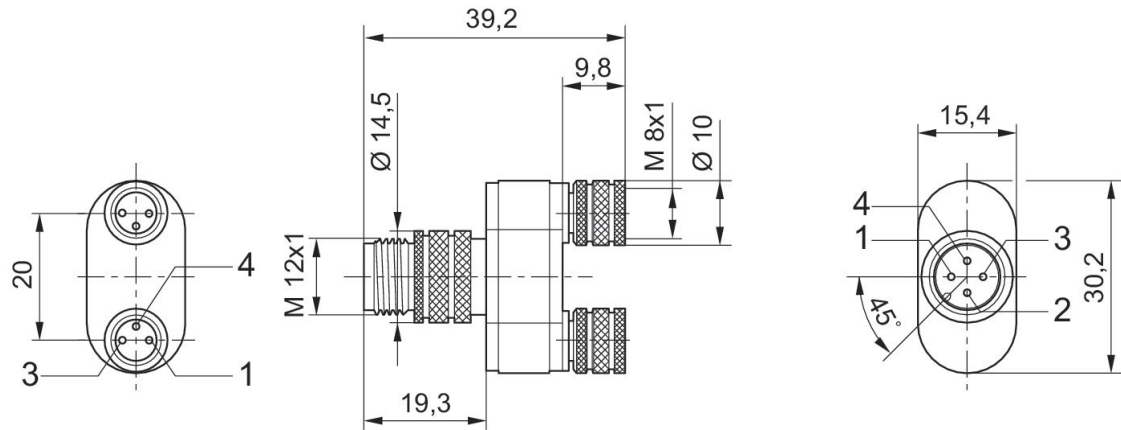
Y-Plug connector, series CON-AP

Socket
M8x1
3-pin



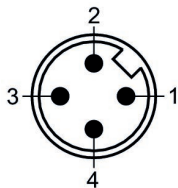
Max. current [A]	Part No.
4	8941002382

Dimensions

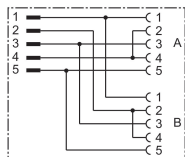


8941002382

Plug pin assignment



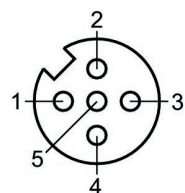
Plug
Socket
M12x1
M12x1
5-pin



Max. current [A]	Part No.
4	8941002392

Sockets: Pin 2 and 4 bridged.

Pin assignment, socket



Efficient pneumatic solutions, our program:
cylinders and drives, valves and valve systems,
air supply management



Visit us: [Emerson.com/Aventics](https://www.emerson.com/aventics)

Your local contact: [Emerson.com/contactus](https://www.emerson.com/contactus)



[Emerson.com](https://www.emerson.com)



[Facebook.com/EmersonAutomationSolutions](https://www.facebook.com/EmersonAutomationSolutions)



[LinkedIn.com/company/Emerson-Automation-Solutions](https://www.linkedin.com/company/Emerson-Automation-Solutions)



[Twitter.com/EMR_Automation](https://twitter.com/EMR_Automation)

An example configuration is depicted on the title page. The delivered product may thus vary from that in the illustration. Subject to change. This Document, as well as the data, specifications and other information set forth in it, are the exclusive property of AVENTICS GmbH. It may not be reproduced or given to third parties without its consent. Only use the AVENTICS products shown in industrial applications. Read the product documentation completely and carefully before using the product. Observe the applicable regulations and laws of the respective country. When integrating the product into applications, note the system manufacturer's specifications for safe use of the product. The data specified only serve to describe the product. No statements concerning a certain condition or suitability for a certain application can be derived from our information. The information given does not release the user from the obligation of own judgment and verification. It must be remembered that the products are subject to a natural process of wear and aging.

The Emerson logo is a trademark and service mark of Emerson Electric Co. Brand logotype are registered trademarks of one of the Emerson family of companies. All other marks are the property of their respective owners. © 2019 Emerson Electric Co. All rights reserved.



CONSIDER IT SOLVED™