

### Weight indicators MiNexx<sup>®</sup> M and MiNexx<sup>®</sup> L

State-of-the-art weighing technology



#### (!) Benefits

- Intuitive operation with Blue HMI
- Seamless integration and wide range of communication options
- Worldwide approvals ensure quality and reliability around the globe
- Quick and easy commissioning thanks to pre-installed workflows and processes

The new face of industrial weighing technology at Minebea Intec: the weight indicator MiNexx<sup>®</sup>! Thanks to its new user interface, the scale boasts easy, clearly structured and intuitive operation. Supported by the latest technologies, such as Ethernet, USB, an integrated OPC-UA server and webserver. All this combined with the trusted and reliable weighing precision and product quality you expect, providing maximum safety and performance for your production operations.

- ① **User interface:** An intuitive and user-friendly HMI for all MiNexx<sup>®</sup> electronics!
- ① Versatile connection options: Supports network, USB, fieldbuses and more for flexible integration.
- ① OPC UA integration: Integrated OPC UA in accordance with Companion Specification for easy integration with Industry 4.0 systems.
- ① Hygienic design: NSF certification in accordance with NSF/ANSI/3-A 14159-1 and NSF/ANSI 169 for all products in the MiNexx® family.

#### Technical specifications

#### Weight indicator MiNexx® M/L

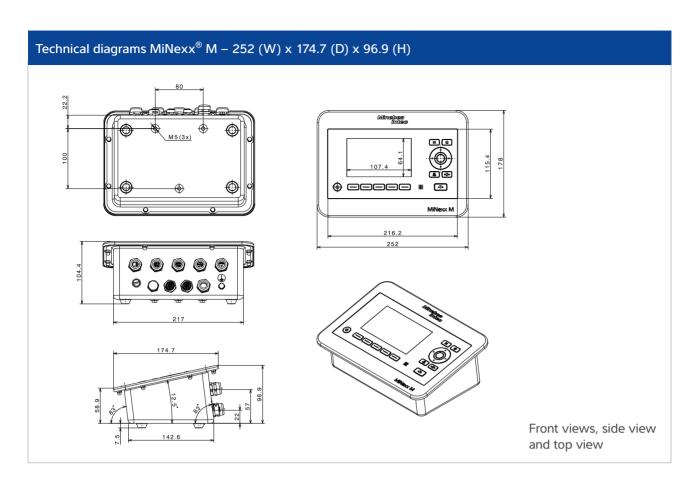
Parameters		М	L	
Housing	Туре	Stainless steel table-top housing	Stainless steel table-top housing	
	IP protection grade	IP67, IP69, Nema 4X indoor	IP67, IP69, Nema 4X indoor	
Material	Material, housing	1.4201 / AISI 304	1.4201 / AISI 304	
	Seal	EPDM	EPDM	
	Membrane keypad			
	Rubber feet	EPDM	EPDM	
Dimensions	Front panel	252 × 178 mm	290 × 178 mm	
	Housing	252 × 174.7 × 96.9 mm	290 × 174.7 × 96.9 mm	
Weight	Gross (net)	3.8 kg (2.3 kg)	3.8 kg (2.3 kg)	
100 – 240 V <sub>AC</sub>	Supply voltage	100-240 V <sub>AC</sub> (-15%/+10%), 50 - 60 Hz	100-240 V <sub>AC</sub> (-15%/+10%), 50 - 60 Hz	
power supply unit	Connection	Connected network cable (cable gland) with optional country-specific plug	Connected network cable (cable gland) with optional country-specific plug	
	Max. power consumption	30 VA	30 VA	
24 V <sub>DC</sub>	Supply voltage	24 V <sub>DC</sub> SELV/PELV (±10%)	24 V <sub>DC</sub> SELV/PELV (±10%)	
power supply unit	Connection	Connected network cable (cable gland) with open cable ends	Connected network cable (cable gland) with open cable ends	
	Max. power consumption	20 W	20 W	
Display	Туре	TFT colour graphic display	TFT colour graphic display	
	Resolution	5" (16:9) with 800×480 pixels	5" (16:9) with 800×480 pixels	
	Weight value	7-digit weight display	7-digit weight display	
	Adjustment units	mg, g, kg, t, lb and oz	mg, g, kg, t, lb and oz	
	Additional units	ct, ozt, grn, dwt, mom, lb:oz	ct, ozt, grn, dwt, mom, lb:oz	
	Status LED	One status LED shows the 'shutdown' status, flashes during the resume process and lights up when the screensaver is active.	One status LED shows the 'shutdown' status, flashes during the resume process and lights up when the screensaver is active.	
Keypad		16 keys (membrane keypad)	28 keys (membrane keypad)	
Languages	Integrated languages	German, English, French, Italian, Spanish and other system languages	German, English, French, Italian, Spanish and other system languages	
	Character sets	ASCII, Latin 1, Latin-ext A, Cyrillic, Hiragana, Katakana, CJK (simplified Chinese only)	ASCII, Latin 1, Latin-ext A, Cyrillic, Hiragana, Katakana, CJK (simplified Chinese only)	
Standard interfaces		М		
USB	Version	USB 2.0	USB 2.0	
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants	
	Recommended max. current	200 mA	200 mA	
	Function	Printer, barcode reader, keyboard, storage medium or signal tower (host) or PC (device)	Printer, barcode reader, keyboard, storage medium and signal tower (host) or PC (device)	
Ethernet	Connection	Optional: with M12 or different cable variants as option	Optional: with M12 or different cable variants as option	
	Protocols and functions	TCP (HTTP/HTTPS) and UDP, Modbus TCP/UDP, OPC-UA, SBI, XBPI, SMA, PR-Net, webserver, network printer, network drives, VNC server, remote display protocol (PR5110)	TCP (HTTP/HTTPS) and UDP, Modbus TCP/UDF OPC-UA, SBI, XBPI, SMA, PR-Net, webserver, network printer, network drives, VNC server, remote display protocol (PR5110)	
SD card (internal)	Features	Operating data, backup, manuals	Operating data, backup, manuals	

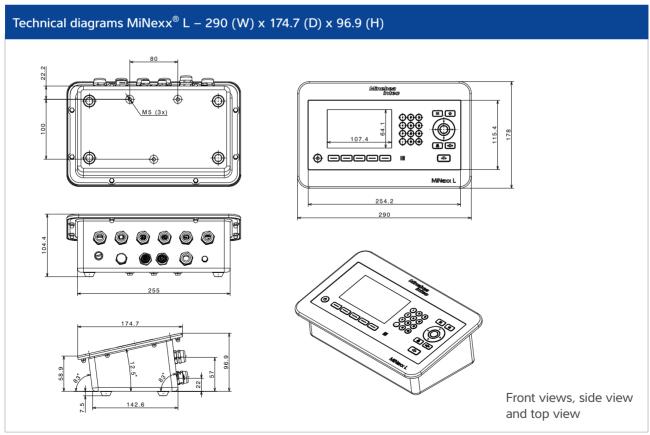
#### Weight indicator MiNexx® M/L

Scale connection		M	L
Number of scales		1 scale, analogue or digital	Up to 3 scales, analogue or digital
Analogue scale connection	Load cells	All strain gauge load cells; 6 or 4-wire connection is possible	All strain gauge load cells; 6 or 4-wire connection is possible
"Performance"	Supply voltage	10 $V_{DC}$ (±5 $V_{DC}$ ), short-circuit proof, external load cell supply possible	10 V <sub>DC</sub> (±5 V <sub>DC</sub> ), short-circuit proof, external load cell supply possible
	Sensitivity	Internal: 7,5 nV, usable resolution: 0.2 µV/d	Internal: 7,5 nV, usable resolution: 0.2 µV/d
	Resistance	75 $\Omega$ to 1,200 $\Omega$ , e.g. six load cells with 600 $\Omega$ each or four load cells with 350 $\Omega$ each (for 37.5 $\Omega$ – optional 5 V version of the A/D converter available)	75 Ω to 1,200 Ω, e.g. six load cells with 600 Ω each or four load cells with 350 Ω each (for 37.5 Ω – optional 5 V version of the A/D converter available)
	Measurement times	Min. 20 ms – max. 160 ms	Min. 20 ms – max. 160 ms
	Cable length to cable cross-section	≤1,000 m/mm²	≤1,000 m/mm²
	Input signal	Input signal 0 to 30 mV (for 100% maximum capacity)	Input signal 0 to 30 mV (for 100% maximum capacity)
	Linearity	< 0.002%	< 0.002%
	Temperature effect	Zero point: Tk0m < 0.02 μV/K RTI, measuring range TKspan < ±2 ppm/K	Zero point: Tk0m < 0.02 $\mu$ V/K RTI, measuring range TKspan < $\pm$ 2 ppm/K
	Digital filter	4th order (low pass), Bessel, aperiodic or Butterworth	4th order (low pass), Bessel, aperiodic or Butterworth
	Connection	Internal 6-pin terminal block, cable gland, optional separable connection	Internal 6-pin terminal block, cable gland, optional separable connection
	Metrological approval	10,000 e, non-automatic weighing instrument (NAWI) according to OIML R76	10,000 e, non-automatic weighing instrument (NAWI) according to OIML R76
	Smallest verifiable input signal	0.5 μV/e	0.5 μV/e
Analogue scale connection	Load cells	All strain gauge load cells; 6 or 4-wire connection is possible	All strain gauge load cells; 6 or 4-wire connection is possible
"Efficiency"	Supply voltage	5 V <sub>DC</sub> short-circuit proof external load cell supply possible	5 V <sub>DC</sub> short-circuit proof external load cell supply possible
	Sensitivity	Internal: 7,5 nV, usable resolution: 0.2 µV/d	Internal: 7,5 nV, usable resolution: 0.2 µV/d
	Resistance	75 $\Omega$ to 1,200 $\Omega$ , e.g. six load cells with 600 $\Omega$ each or four load cells with 350 $\Omega$ each	75 Ω to 1,200 Ω, e.g. six load cells with 600 Ω each or four load cells with 350 Ω each
	Measurement times	Min. 20 ms – max. 160 ms	Min. 20 ms – max. 160 ms
	Cable length to cable cross-section	≤110 m/mm²	≤110 m/mm²
	Input signal	Input signal 0 to 30 mV (for 100% maximum capacity)	Input signal 0 to 30 mV (for 100% maximum capacity)
	Linearity	< 0.002%	< 0.002%
	Temperature effect	Zero point: Tk0m < 0.02 μV/K RTI, measuring range TKspan <±2 ppm/K	Zero point: Tk0m < 0.02 µV/K RTI, measuring range TKspan < ±2 ppm/K
	Digital filter	4th order (low pass), Bessel, aperiodic or Butterworth	4th order (low pass), Bessel, aperiodic or Butterworth
	Connection	Internal 6-pin terminal block, cable gland, optional separable connection	Internal 6-pin terminal block, cable gland, optional separable connection
	Metrological approval	10,000 e, non-automatic weighing instrument (NAWI) according to OIML R76	10,000 e, non-automatic weighing instrument (NAWI) according to OIML R76
	Smallest verifiable input signal	0.44 μV/e	0.44 μV/e
Digital scale connection	Protocols	XBPI via RS232 or RS485	XBPI via RS232 or RS485
	Products to be connected	e.g. IS platforms, Signum, Combics, Pendeo LCs	e.g. IS platforms, Signum, Combics, Pendeo LCs
	Integrated supply voltage	15 V and 24 V	15 V and 24 V
	Connection	Internal 15-pin terminal block, cable gland, optional separable connection	Internal 15-pin terminal block, cable gland, optional separable connection
Ambient temperature	Operation	-10+40 °C	-10+40 °C
	Storage	-20°C to +60°C	-20°C to +60°C

#### Weight indicator MiNexx® M/L

Other optional interfaces		М	L
		2 slots for max. 2 interface cards	Max. 3 slots or interface cards
Serial interface	Communication	RS232 and RS485, full duplex (4-wire), half duplex (2-wire)	RS232 and RS485, full duplex (4-wire), half duplex (2-wire)
	Protocol, connectable peripherals	Printer, Modbus RTU, remote display, xBPI, SBI, SMA, barcode scanner (application-specific)	Printer, Modbus RTU, remote display, xBPI, SB SMA, barcode scanner (application-specific)
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants
Analogue I/O	Inputs	1 x current input and 1 x voltage input	1 x current input and 1 x voltage input
	Outputs	1 x current output or 1 x voltage output	1 x current output or 1 x voltage output
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants
Digital I/O relay	Inputs	2 optocouplers, isolated input, active or passive, max. 28 $\rm V_{\rm DC}$	2 optocouplers, isolated input, active or passive max. 28 $\rm V_{\rm DC}$
	Features	Set zero, tare etc.	Set zero, tare etc.
	Outputs	4 relays, isolated, max. 30 V <sub>DC/AC</sub> , max. 0.5 A	4 relays, isolated, max. 30 V <sub>DC/AC</sub> , max. 0.5 A
	Features	Limits, weight status etc.	Limits, weight status etc.
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants
Digital I/O opto-isolated	Inputs	4 optocouplers, isolated input, passive, max. 28 $\rm V_{DC}$	4 optocouplers, isolated input, passive, max. 28 $\rm V_{\rm DC}$
	Features	Set zero, tare etc.	Set zero, tare etc.
	Outputs	6 octocouplers, isolated output, passive, max. 24 V, 30 mA	6 octocouplers, isolated output, passive, max. 24 V, 30 mA
	Features	Limits, weight status etc.	Limits, weight status etc.
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants
Fieldbus interface			
1 slot			
Profibus DP	Туре	Profibus DP according to IEC 61158.12, 12 Mbit/s	Profibus DP according to IEC 61158.12, 12 Mbit/s
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants
Profinet	Туре	ProfiNet I/O, 10 and 100 MBit/s	ProfiNet I/O, 10 and 100 MBit/s
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants
Ethernet IP	Туре	Ethernet IP, 10 and 100 MBit/s	Ethernet IP, 10 and 100 MBit/s
	Connection	Optional: with M12 or different cable variants	Optional: with M12 or different cable variants





#### Ordering information

## Product name Description Order code Weight indicator MiNexx® M NICM Weight indicator MiNexx® L NICL

#### **Options**

Due to the wide range of options available, the weight indicators in the MiNexx<sup>®</sup> family can be adapted to the user's specific application. If the option code is specified when ordering, the device is supplied with the specified options.

Electrical supply	
Description	Ordering option
100 – 240 V <sub>AC</sub> supply voltage	L1*
24 V <sub>DC</sub> supply voltage	L2

Cable – power supply	
Description	Ordering option
Cable without plug connector, 100–240 V	L10
Cable without plug connector, 24 V	L20
Euro safety plug CEE7	EU
GB, plug connector: Type 360	GB
US, plug connector: Type LAP 31	US
CH, plug connector: Type 370	СН
CN, plug connector: Type GB1002	CN
DK, plug connector: DK2-1 a/1992	DK
AU, plug connector: AS 3112	AU
IL, plug connector: SI 32	IL
IN, plug connector: Type BS 546	IN
IT, plug connector: Type 310	IT
South Afr.,plug connector: Type BS 546	ZA
Japan, plug connector: LT 832, PSE	JP

Scale connection – Slot 1 (MiNexx® M/L)	
Description	Ordering option
Analogue scale connection, "Efficiency", 10,000e	WAE1
Analogue scale connection, "Performance", 10,000e (10 V, 75 OHM)	WAP1
Analogue scale connection, "Performance", 6,000e (5 V, 37.5 OHM)	WAT1
Digital scale connection (e.g. IS)	WDI1

<sup>\*</sup> Built into device as standard

#### Scale connection cable – Slot 1 (MiNexx® M/L)

Cable options	WAE1, WAP1, WAT1	WDI1
M12 (plug connector, female) – RS232/RS485	-	WDI11
Cable gland, 12-pin round socket (0.2 m)	WA11	-
Cable gland, 12-pin round socket – RS232/RS485 (0.2 m)	-	WDI14
Cable gland, 12-pin round socket – RS232/RS485 (3 m)	-	WDI15
Cable gland M16	WA12	-
Cable gland M20	WA13	-

#### Scale connection – Slot 2 (only for MiNexx<sup>®</sup> L)

Description	Ordering option
Analogue scale connection, "Efficiency", 10,000e	WAE2
Analogue scale connection, "Performance", 10,000e (10 V, 75 OHM)	WAP2
Analogue scale connection, "Performance", 6,000e (5 V, 37.5 OHM)	WAT2
Digital scale connection (e.g. IS)	WDI2

#### Scale connection cable – Slot 2 (only for MiNexx<sup>®</sup> L)

Cable options	WAE2, WAP2, WAT2	WDI2
M12 (plug connector, female) – RS232/RS485	-	WDI21
Cable gland, 12-pin round socket (0.2 m)	WA21	-
Cable gland, 12-pin round socket – RS232/RS485 (0.2 m)	-	WDI24
Cable gland, 12-pin round socket – RS232/RS485 (3 m)	-	WDI25
Cable gland M16	WA22	-
Cable gland M20	WA23	-

#### Scale connection – Slot 3 (only for MiNexx<sup>®</sup> L)

Description	Ordering option
Digital scale connection (e.g. IS)	WDI3

#### Scale connection cable – Slot 3 (only for MiNexx<sup>®</sup> L)

Cable options	WDI3
M12 (plug connector, female) – RS232/RS485	WDI31
Cable gland, 12-pin round socket – RS232/RS485 (0.2 m)	WDI34
Cable gland, 12-pin round socket – RS232/RS485 (3 m)	WDI35

#### Other interfaces – Slot 2 (MiNexx® M/L)

Description	Ordering option
	Slot 2
Interface card, serial – RS232 C2 C3 RS485 (without terminating resistor)	DA2
Interface card, serial – RS232 C2 C3 RS485 (with internal terminating resistor)	DB2
Interface card, analogue 1× input / 1× output (0/4 – 20 mA and 0 – 10 V)	E2
Interface card, digital 2 × input (active) / 4 × output (relay, NO)	FA2
Interface card, digital 2 × input (passive) / 4 × output (relay, NO)	FB2
Interface card, digital 2 × input (active) / 4 × output (relay, NC)	FC2
Interface card, digital 2 × input (passive) / 4 × output (relay, NC)	FD2
Interface card digital 4× input (passive) / 6× output (opto)	G2

#### Other interfaces, connection cable – Slot 2 (only for MiNexx® M/L)

Cable options	C2	DA2, DB2	E2	FA2, FB2, FC2, FD2	G2
M12	C20	D20	E20	F20	G20
Cable gland for 9-pin D-SUB plug connector	C21	D21	-	-	-
Cable gland for 9-pin D-SUB plug connector, female	C22	D22	-	-	-
Cable gland for open cable ends	C23	D23	E21	F21	G21

#### Other interfaces – Slot 3 (MiNexx M/L)

Description	Ordering option
	Slot 3
Interface card, serial – RS232 C2 C3 RS485 (without terminating resistor)	DA3
Interface card, serial – RS232 C2 C3 RS485 (with internal terminating resistor)	DB3
Interface card, analogue 1× input / 1× output (0/4 – 20 mA and 0 – 10 V)	E3
Interface card, digital 2 × input (active) / 4 × output (relay, NO)	FA3
Interface card, digital 2 × input (passive) / 4 × output (relay, NO)	FB3
Interface card, digital 2 × input (active) / 4 × output (relay, NC)	FC3
Interface card, digital 2 × input (passive) / 4 × output (relay, NC)	FD3
Interface card digital 4× input (passive) / 6× output (opto)	G3

#### Other interfaces, connection cable – Slot 3 (MiNexx M/L)

Cable options	C3	DA3, DB3	E3	FA3, FB3, FC3, FD3	G3
M12	C30	D30	E30	F30	G30
Cable gland for 9-pin D-SUB plug connector	C31	D31	-	-	-
Cable gland for 9-pin D-SUB plug connector, female	C32	D32	-	-	-
Cable gland for open cable ends	C33	D33	E31	F31	G31

#### Other interfaces – Slot 4 (only for MiNexx L)

Description	Ordering option	
	Slot 4	
Interface card, serial – RS232 C2 C3 RS485 (without terminating resistor)	CA4	
Interface card, serial – RS232 C2 C3 RS485 (with internal terminating resistor)	CB4	
Interface card, analogue 1× input / 1× output (0/4 – 20 mA and 0 – 10 V)	E4	
Interface card, digital 2 × input (active) / 4 × output (relay, NO)	FA4	
Interface card, digital 2 × input (passive) / 4 × output (relay, NO)	FB4	
Interface card, digital 2 × input (active) / 4 × output (relay, NC)	FC4	
Interface card, digital 2 × input (passive) / 4 × output (relay, NC)	FD4	
Interface card digital 4× input (passive) / 6× output (opto)	G4	

#### Other interfaces, connection cable – Slot 4 (only for MiNexx L)

Cable options	C4	DA4, DB4	E4	FA4, FB4, FC4, FD4	G4
M12	C40	D40	E40	F40	G40
Cable gland for 9-pin D-SUB plug connector	C41	D41	-	-	-
Cable gland for 9-pin D-SUB plug connector, female	C42	D42	-	-	-
Cable gland for open cable ends	C43	D43	E41	F41	G41

#### Ethernet

Description	Ordering option
Ethernet TCP/IP including web server and modbus UDP/TCP (RJ45)	B1*

<sup>\*</sup> Built into device as standard

#### Ethernet – Ethernet connection cable

Description	Ordering option
M12	B10
Cable gland for RJ45 plug connector	B11
Cable gland on open cable ends	B12

#### USB

Description	Ordering option
USB host	U1H
USB device	U1D
2 × USB host	U2H

#### **USB** cable options

Cable options	USB host U1H	USB device – U1D	2 x USB host – U2H
M12 (plug connector, female)	U10	U10	U20
Cable gland, USB-A plug connector, female. IP65, 2-meter	U11	-	U21

# Fieldbus interfaces – Slot FB Description Profibus DP Profinet Ethernet IP Ordering option HDP HPN HPN HIP

Fieldbus connection cable			
	Profibus DP – HDP	ProfiNet – HPN	Ethernet IP – HIP
M12	HDP01*	HPN01*	HIP01*
Open cable ends with M12 plug connector	HDP02	-	-
Open cable ends with RJ45 plug connector	-	HPN02	HIP02

<sup>\*</sup> Built into device as standard

Mechanical options	
Description	Ordering option
Rotated front plate	M1

Software licences	
Description	Ordering option
Alibi memory	S1
OPC-UA	S2
Project Application	S3

Applications	
Description	Ordering option
Basic	A1*
Package Application	A2

<sup>\*</sup> Included as standard

#### **Printed certificates**

Description	Ordering option
Conformity declaration (CE)	K4*
NSF certificate	K6

<sup>\*</sup> Included as standard

#### Accessories

In addition to the wide variety of options, various options can also be ordered as accessories. If the order reference is specified when ordering, the device is supplied with the relevant accessories.

Power supply		
Description	Cable length in meters	Order reference
24 V, cable gland for open cable ends	3	ACC01-POW-OG24V
100 – 240 V, cable gland for open cable ends	3	ACC01-POW-OG230V
100 – 240 V, cable gland for AU plug connector AS3112	3	ACC01-POW-AU
100 – 240 V, cable gland for CH plug connector 370	3	ACC01-POW-CH
100 – 240 V, cable gland for CN plug GB1002	3	ACC01-POW-CN
100 – 240 V, cable gland for DK plug DK2–1a	3	ACC01-POW-DK
100 – 240 V, cable gland for EU plug CEE7	3	ACC01-POW-EU
100 – 240 V, cable gland for GB plug 360	3	ACC01-POW-GB
100 – 240 V, cable gland for IL plug SI 32	3	ACC01-POW-IL
100 – 240 V, cable gland for IN plug BS 546	3	ACC01-POW-IN
100 – 240 V, cable gland for IT plug 310	3	ACC01-POW-IT
100 – 240 V, cable gland for JP plug LT 832 PSE	3	ACC01-POW-JP
100 – 240 V, cable gland for US plug LAP 31	3	ACC01-POW-US
100 – 240 V, cable gland for ZA plug BS 546	3	ACC01-POW-ZA

USB cable		
Description	Cable length in meters	Order reference
Data cable for USB connection, M12 plug connector to USB-A plug connector, female	3	ACC01-USB-MAF3
Data cable for USB connection, M12 plug connector to USB-A plug connector, female, including IP65 sealing	3	ACC01-USB-MAF3C
Data cable for USB connection, M12 plug connector to USB-A plug connector	3	ACC01-USB-MAM3
Data cable for USB connection, M12 plug connector to USB-B plug connector	3	ACC01-USB-MBM3
Data cable for USB connection, cable gland for USB-A plug connector, female	3	ACC01-USB-GAF3
Data cable for USB connection, cable gland for USB-A plug connector	3	ACC01-USB-GAM3
Data cable for USB connection, cable gland for USB-B plug connector	3	ACC01-USB-GBM3
Data cable for USB connection, internal cable harness with M12 built-in socket		ACC01-USB-M12

Ethernet cable		
Description	Cable length in meters	Order reference
M12 plug connector to RJ45 plug connector, female	5	ACC01-ETH-M45M5
Cable gland for RJ45 plug connector, female	5	ACC01-ETH-G45M5
Internal cable harness with M12 built-in socket		ACC01-ETH-M12

Scale connection	
Description	Order reference
Performance 10 V – 10,000e	AWP01-ML-P-10
Performance 5 V – 6,000e	AWP01-ML-P-5
Efficiency 5 V – 10,000e	AWP01-ML-E-5
Digital – RS232/485	AWP01-ML-D232485
Digital – RS232/485	AWP01-C-D232485

#### Scale connection cable (digital weighing point)

Description	Cable length in meters	Order reference
M12 plug connector, 12-pin round socket	0.2	ACC01-DWP-M12RF0
M12 plug connector, 12-pin round socket	3	ACC01-DWP-M12RF3
M12 plug connector, 12-pin round socket	3	ACC01-DWP-M12RM3
M12 plug connector, 25-pin RS232 D-SUB plug connector	3	ACC01-DWP-MD25M3
Internal cable harness with M12 built-in socket	3	ACC01-DWP-M12
Cable gland for 12-pin round socket	0.2	ACC01-DWP-G12RF0
Cable gland for 12-pin round socket	3	ACC01-DWP-G12RF3
Cable gland for 25-pin RS232 D-SUB plug connector	3	ACC01-DWP-GD25M3
Cable gland for 12-pin round socket	3	ACC01-DWP-G12RM3

#### Scale connection cable (analogue weighing point)

Description	Cable length in meters	Order reference
Cable gland for separable connection, round-pin plug connector, including mating connector	0.2	ACC01-AWP-G12RF0
Cable gland for separable connection, round-pin plug connector, including mating connector	6	ACC01-AWP-G12RF6

#### Serial interface cards

Description	Order reference
RS232/485	AIC01-ML-232485

#### Serial connection cable

Description	Cable length in meters	Order reference
RS232, M12 plug connector for 9-pin D-SUB plug connector, female	5	ACC01-232-MD09F5
RS232, M12 plug connector for 9-pin D-SUB plug connector	5	ACC01-232-MD09M5
RS485, M12 plug connector for 9-pin D-SUB plug connector, female	5	ACC01-485-MD09F5
RS485, M12 plug connector for 9-pin D-SUB plug connector	5	ACC01-485-MD09M5
Internal cable harness with M12 built-in socket		ACC01-SER-M12
M12 plug connector for open cable ends	5	ACC01-SER-MO5
Cable gland for open cable ends	6	ACC01-SER-GO5

#### Digital interface cards

Description	Order reference
Digital 2 × IN, relay 4 × OUT	AIC01-ML-DR-I204
Digital opto 4 × IN, 6 × OUT	AIC01-ML-DO-I406

#### Digital IO – connection cable

Description	Cable length in meters	Order reference
M12 plug connector for open cable ends (8-pin)	5	ACC01-DIO-MOE5
Cable gland for open cable ends (8-pin)	6	ACC01-DIO-GOE6
Internal cable harness with M12 built-in socket		ACC01-DIO-M12

## Analogue interface cards Description Order reference Analogue 2 × IN, 1 × OUT AIC01-ML-A-2l10

Analogue IO – connection cable		
Description	Cable length in meters	Order reference
M12 plug connector for open cable ends (8-pin)	5	ACC01-AIO-MOE5
Cable gland for open cable ends (8-pin)	6	ACC01-AIO-GOE6
Internal cable harness with M12 built-in socket		ACC01-AIO-M12

Fieldbus – interface cards		
Description	Order reference	
Profibus DP	AIC01-ML-HDP	
Ethernet IP	AIC01-ML-HIP	
Profinet	AIC01-ML-HPN	

Fieldbus – cable/cable harness				
Description	Cable length in meters	Order reference		
Profibus-DP – M12 plug connector for M12 built-in socket	5	ACC01-HDP-MM12M5		
Profibus-DP – Internal cable harness with M12 plug connector		ACC01-HDP-M12M		
Profibus DP – Internal cable harness with M12 built-in socket		ACC01-HDP-M12F		
Profinet – cable gland for RJ45 plug connector	6	ACC01-HPN-G45M5		
Profinet – Internal cable harness with M12 built-in socket		ACC01-HPN-M12		
Ethernet IP – cable gland for RJ45 connector	6	ACC01-HIP-G45M5		
Ethernet IP – Internal cable harness with M12 built-in socket		ACC01-HIP-M12		

Software licences	
Description	Order reference
Alibi memory	ASL01-CML-S1
OPC UA	ASL01-CML-S2
Basic Application	ASL01-CML-A1
Package Application	ASL01-CML-A2
Project Application	ASL01-CML-S3

The products and solutions presented in this data sheet make major contributions in the following sectors:



The technical data given serves as a product description only and should not be understood as guaranteed properties in the legal sense.